Infopreneurship and Technopreneurship Readiness for Job Creation Among Nigerian Library and Information Science Graduates

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Abstract - It has been established in studies that infopreneurship and technopreneurship are potent avenues for job creation in the 21st century. This study explores infopreneurship and technopreneurship readiness for job creation among Nigerian Library and Information Science (LIS) graduates. It raises three objectives and corresponding questions. This study uses a descriptive survey design. The population of the study consists of 268 LIS graduates who were willing to participate by completing a questionnaire designed using Google Forms, which was distributed through various WhatsApp platforms for librarians. Data obtained were analyzed using tables, frequency counts, percentages, and means (\overline{X}) . Findings revealed that respondents are highly ready to create jobs through research services and current awareness services ($\bar{X} = 3.43$), as well as information repackaging (\overline{X} = 3.36). Similarly, the respondents indicated a high readiness to create jobs through digital publishing (\overline{X} = 3.24), social media management ($\overline{X} = 3.16$), and operating cyber cafés (\bar{X} = 3.00). Barriers to the respondents' readiness include poor internet bandwidth (X = 3.49), the unstable cost of living $(\bar{X} = 3.48)$, inadequate sources of capital $(\bar{X} = 3.46)$, unfavorable government policies ($\overline{X} = 3.40$), and insufficient local technological industries that could be leveraged for technopreneurship (X = 3.37). This study concludes that Nigerian LIS graduates are highly ready to create jobs through infopreneurship and technopreneurship. The study recommends that Nigerian ministries, bodies, and agencies, such as the Ministry of Digital Economy, Information, the Nigerian Information Technology Development Agency (NITDA), and the Librarians Registration Council of Nigeria (LRCN), prioritize training for both practicing and potential

Keywords: Informeurship, Technopreneurship, Job creation, Library and Information Science (LIS), Readiness for Entrepreneurship

info/technopreneurs.

I. INTRODUCTION

Information is one of the most essential components of daily life. The importance of information as a vital tool for decision-making and problem-solving has made it one of the prime commodities that can be exchanged for a fee. Meanwhile, the surge in the creation, management, and dissemination of information has created enormous opportunities for individuals ready to harness these opportunities to create financial, economic, and social value.

Making information valuable to society intersects the boundaries of many professions. One of the professions that has an advantage in exploiting the economic and financial value of information in the 21st century is Library and Information Science (LIS). This is because librarianship in the 21st century offers unique opportunities for librarians to leverage infopreneurship, librapreneurship, and technopreneurship to create jobs. To make this a reality, Adetayo, Suleiman, and Olajire (2022) encouraged 21st-century librarians to continue reimagining and planning through digital infopreneurship to set themselves up for greater revenue, stability, and visibility.

Infopreneurship is derived from two root words - information and entrepreneur. It is the process of making a profit through the sale of information (Taylor, 2020). Khumalo and Nkala (2015) defined infopreneurship as the process of selling information to make a profit, which involves packaging information and delivering it to various users in exchange for money. Infopreneurship refers to a type of enterprise organized to gather and sell information and knowledge as a source of income. It is related to a business venture that maximizes information-related opportunities to create information products and services.

What was applicable to infopreneurship in its formation also applies to technopreneurship. Technopreneurship essentially merges two words from two disciplines: technology from innovation and entrepreneurship from business. Technology entrepreneurship, therefore, integrates technological and entrepreneurial realms (Mashingaidze, 2016). Technopreneurship is becoming vital in the current globalized and liberalized economy, as it provides greater opportunities and enables the effective optimization of resources to attain high profit margins (Mashingaidze, 2016).

Ujoumunna (2021) asserted that librarianship evolves as the world changes. This notion supports the findings of Salman, Ajani, and Sulyman (2023) that the sustainability of LIS is akin to knowledge management and knowledge organization (cataloging and classification) skills. To

remain relevant, librarians should reevaluate and reorganize their employment functions in the provision of library and information services (Horsfall, 2023), tapping into the important, relevant (Ali, 2021), and unlimited opportunities of infopreneurship and technopreneurship as options for employment (Ramugondo & Ocholla, 2022).

Infopreneurship and technopreneurship depend on individuals' passion and areas of specialization. It is a welcome idea for individuals to explore and adopt an entrepreneurial attitude in their areas of interest (Ofodu & Whong, 2024). Adetayo and Hazmat (2021) opined that infopreneurship has the potential to provide income to support salary-based jobs and possibly guarantee financial satisfaction for LIS professionals. It is a capital-intensive practice where information scientists and librarians can support themselves through the services they provide to the labor market without working for any organization, thereby becoming their own employers (Ujoumunna, 2021).

Babalola *et al.*, (2018) argued that infopreneurship and technopreneurship will enable librarians to work independently by engaging in infopreneurial tasks such as publishing, abstracting, indexing, developing databases, managing collections, organizing knowledge, providing current awareness services, hiring and developing staff, conducting research, searching for information using bibliographic and metadata systems, and publishing journals and books, as well as creating ideas.

Obiukwu Onuoha and (2022)stressed that technopreneurship is a key factor in a country's technological progress. Its significance for economic expansion and advancement cannot be overstated. Infopreneurs are librarians and information scientists who take the risk of transforming LIS professional skills into capital ideas to become self-employed (Ujoumunna, 2021). Friday and Sawyer-George (2023) reported that librarians in Nigeria's South-South geopolitical zone are engaging in infopreneurship to supplement their income, save for retirement, manage unforeseen needs, and advance their careers.

According to Ofodu and Whong (2024), infopreneurship involves utilizing information-related skills and knowledge to create innovative services or products. Freelancing in LIS allows professionals to work independently and offer their services to a diverse range of clients. Ujoumunna (2021) urged LIS graduates and postgraduates to adopt the concept and ethos of infopreneurship as it applies to information practices.

Adetayo and Hazmat (2021) reviewed the literature and found that little or no empirical research has been conducted on infopreneurial practices among library professionals in Nigeria. Scholars' responses have led to various studies on infopreneurship, but little attention has been paid to technopreneurship among librarians. This forms the basis for this study, which explores infopreneurship and

technopreneurship readiness for job creation among Nigerian LIS graduates.

A. Statement of the Problem

Infopreneurship and technopreneurship are evolving aspects of entrepreneurship that focus on leveraging the inherent value of information and technology to establish ventures, and create services and products that generate income for infopreneurs and technopreneurs. Literature reports that unemployment is currently on the rise in Nigeria. With librarians among the professionals affected by this trend, it is believed that infopreneurship and technopreneurship can serve as viable solutions for job creation and financial independence (Adetayo & Hazmat, 2021).

Despite the significant opportunities in infopreneurship and technopreneurship, these researchers have observed that Nigerian LIS graduates are complacent and not ready to engage in these fields. Reasons for their lack of readiness include inadequate funds, poor supply, insufficient ICT infrastructure, poor marketing skills, a lack of an infopreneurial mindset, and insufficient infopreneurship skills, among others (Adetayo & Hazmat, 2021; Ali, 2021; Arowosola *et al.*, 2022; John, Nwosu, & Simisaye, 2017; Obiukwu & Onuoha, 2022). This study, therefore, explores the readiness of Nigerian Library and Information Science graduates for job creation through infopreneurship and technopreneurship.

B. Objectives of the Study

The main objective of this study is to explore the readiness for job creation through infopreneurship and technopreneurship among Nigerian Library and Information Science graduates. The specific objectives are to:

- 1. Determine the extent of infopreneurship readiness for job creation among Nigerian Library and Information Science graduates.
- 2. Ascertain the extent of technopreneurship readiness for job creation among Nigerian Library and Information Science graduates.
- 3. Examine the joint barriers to infopreneurship and technopreneurship readiness for job creation among Nigerian Library and Information Science graduates.

C. Research Questions

This study addresses the following questions:

- 1. What is the extent of infopreneurship readiness for job creation among Nigerian Library and Information Science graduates?
- 2. What is the extent of technopreneurship readiness for job creation among Nigerian Library and Information Science graduates?
- 3. What are the joint barriers to infopreneurship and technopreneurship readiness for job creation among Nigerian Library and Information Science graduates?

II. LITERATURE REVIEW

A. Concepts of Info/Technopreneurship

Nweze (2018) claimed that infopreneurship is now a widespread practice involving the development and sale of information products and services, particularly with the advent of the Internet. Infopreneurs use various media, such as websites, social media, blogs, email, wikis, and databases, to create and disseminate the information they package into products and services (Ali, 2021).

According to Aregbesola *et al.*, (2019), an infopreneur is an entrepreneur who, with the intention of making a profit, engages in the collection, creation, development, repackaging, dissemination, and sale of information and related goods and services, typically over the Internet. Similarly, Burton (2022) viewed infopreneurs as individuals who launch companies with the primary goal of obtaining and disseminating knowledge and skills.

Infopreneurs typically operate in narrowly defined niche markets, providing their audiences with specialized information on a given subject or sector. Content produced by infopreneurs can be sold. Most infopreneurs begin as specialists or enthusiasts in their chosen fields. They then transform their expertise into content for e-books, podcasts, video tutorials, online courses, and more. The increasing number of Internet users has led to a surge of infopreneurs using social media platforms such as Facebook, Twitter, Instagram, YouTube, and LinkedIn to exchange ideas, post videos, share pictures, and disseminate information (Rahadi, Farid, Muslih, & Iskak, 2022).

Technology has drastically revolutionized every aspect of librarianship. Its positive impact is not only felt in libraries but has also created pathways for librarians to initiate and execute independent information provision ventures through the use of technology. John, Nwosu, and Simisaye (2017) opined that it is important for LIS graduates to become info/technopreneurs through their service delivery, creating various ways to source income, rather than remaining unemployed. This can earn them extra income (Arowosola et al., 2022). Technopreneurship can be viewed as a branch of entrepreneurship, and it is crucial to remember that technopreneurship involves applying organizational innovation and creativity to solve problems in order to achieve satisfactory economic performance (Fowosire, Idris, & Elijah, 2017).

The significance of technopreneurship in generating wealth for individuals and regions has garnered considerable attention recently. This interest can be partially attributed to the tremendous individual entrepreneurship that gave rise to the internet and personal computer industries in the United States, particularly in Silicon Valley, and the subsequent economic growth these industries brought to their communities (Harlanu & Nugroho, 2015).

B. Empirical Reviews

Ramugondo and Ocholla (2022) conducted a study to determine whether graduates and students studying library and information science (LIS) in KwaZulu-Natal (KZN). South Africa, can find work through infopreneurship. The study primarily examined whether LIS graduates were engaged in infopreneurship, as well as the areas, obstacles, and necessary competencies. Using a case-study design, the study employed a qualitative methodology. Three methods of data collection were utilized: content analysis, interviews, and observations. Purposive and snowball sampling were the two non-probability sampling techniques applied. Interviews with sixty infopreneurs from KZN were conducted. The study's findings showed that infopreneurship is practiced in South Africa, albeit by a very small percentage of LIS graduates. Additionally, the range of infopreneurship activities that infopreneurs might engage in is ever-evolving.

Arowosola *et al.*, (2022) examined the knowledge and applicability of infopreneurship among library and information science students at Prince Abubakar Audu University. The study's population comprised 160 third-year undergraduate LIS students. For this study, which employed total enumeration sampling, 84 students (52% of the sample) returned the questionnaire. The results showed that students are familiar with book vending as a form of infopreneurship. According to a study by Ahmed and Sulyman (2022) on undergraduates in the Faculty of Information and Communication Technology at Kwara State University, Malete, the students are aware of the entrepreneurship initiatives of the Centre for Technical, Vocational, and Entrepreneurship Training.

Ahmed, Yusuf, Mahammuod, and Jimoh (2024) evaluated the entrepreneurship abilities of LIS students at Federal Polytechnic, Offa, Kwara State, Nigeria. A descriptive survey design was adopted for the study. During the 2021-2022 academic year, there were 250 HND I and HND II students enrolled in the Department of Library and Information Science. Since it was assumed that the students had completed their required Industrial Training Program and had access to entrepreneurship education courses for at least five semesters, a purposive sampling strategy was employed.

Out of the 250 surveys distributed, 236 (or 94.4%) were returned and deemed valid. The mean was used to analyze the study's data. All study questions were addressed using the mean, and decision rules were established so that a mean score of 2.50 or higher indicated a positive (agreed) response, while a mean score of less than 2.50 indicated a negative response that was rejected. The results revealed that the LIS students had acquired only four of the sixteen abilities tested; the main obstacles to starting a firm included the large number of students and the lack of funding.

Friday and Sawyer-George (2023) investigated the infopreneurship practices of librarians in South-South Nigerian public university libraries. The population of the study consisted of 175 librarians working in 13 public university libraries in South-South Nigeria. Convenience sampling was used to interview 102 university library librarians engaged in some form of infopreneurship. The results showed that librarians provided internet, book vending, research assistance, reprographic, and information brokerage services. Ultimately, the absence of sufficient funding, inadequate business infrastructure, a lack of technological expertise, and the prevalence of non-professional infopreneurs presented challenges for librarians engaging in infopreneurship.

Adetayo and Hazmat (2021) examined financial happiness and infopreneurship among library staff in higher education institutions in Ede, Osun, Nigeria. The descriptive survey design used included 41 library professionals from three postsecondary institutions. The total enumeration sample technique was employed to study every respondent. The data collection tool was a self-structured questionnaire. Frequency, percentage mean, and Pearson Product Moment Correlation were used to analyze the collected data. The results showed that information creation generates commissions for library professionals in infopreneurship, but not for information trafficking or services. The goals of infopreneurship included gaining leadership experience, improving oneself, practicing teaching and training in libraries, networking with others, and making money. Several advantages include increased self-confidence, learning new things, making a difference in people's lives, feeling fulfilled, and achieving financial independence.

Otamiri and Ogwe (2020) investigated the connection between youth empowerment and technopreneurship in Rivers State, Nigeria. The reachable population consisted of 700 technopreneurs working in five local government areas of the state. Purposeful sampling was employed to obtain a sample size of 400 respondents. A structured questionnaire was utilized to gather primary data, which was subsequently validated. The Pearson Product Moment Correlation Coefficient (PPMC) was used to determine the instrument's reliability, which was found to be 0.75. The study concluded that the foundation of youth empowerment in Rivers State, Nigeria, is technopreneurship activities, such as operating a cybercafé, providing computer and phone maintenance services, and selling computers, phones, and accessories.

Obiukwu and Onuoha (2022) investigated the link between the growth of new tech companies and technopreneurship in Nigeria. For this study, a quasi-experimental research design employing a cross-sectional survey approach was used. The Taro Yamane formula yielded a sample size of 132 from a population of 376. An organized set of questions was utilized to collect data from the participants. Information from 132 respondents was gathered using a straightforward random selection procedure; 110 of the questionnaires were deemed suitable for the study. According to the findings, respondents strongly believe that technopreneurship, through ICT self-efficacy, innovation, and flexibility, boosts the expansion of tech enterprises in Nigeria.

III. METHODOLOGY

This study adopted a descriptive survey design because it provides the researcher with opportunities to explore the respondents' opinions on their readiness to leverage infopreneurship and technopreneurship for job creation. The population of this study consists of graduates of Library and Information Science in Nigeria. A convenience sampling technique was used to select respondents based on their availability and willingness to participate in the study. Ultimately, only 268 LIS graduates completed the questionnaire designed with Google Forms and distributed to various WhatsApp platforms. Data obtained were analyzed using tables, frequency counts, percentages, and means (\overline{X}) . The Decision Rule (DR) used for objectives 1 and 2 is as follows: 1.0 to 1.74 = Not Ready (NR); 1.75 to 2.49 = Partially Ready (PR); 2.50 to 3.24 = Highly Ready (HR); 3.25 to 4.0 = Greatly Ready (GR). For objective 3, the Decision Rule is: 1.0 to 1.74 = Strongly Disagree (SD); 1.75 to 2.49 = Disagree (D); 2.50 to 3.24 = Agree (A); 3.25to 4.0 = Strongly Agree (SA).

IV. DATA ANALYSIS

TABLE I DEMOGRAPHIC DISTRIBUTION OF RESPONDENTS

Options		F	%
Gender	Male	184	68.7
	Female	84	31.3
	Total	268	100
Age range	Below 20	0	0.0
	21-30 years	108	40.3
	31-40 years	80	29.9
	41-50 years	64	23.9
	51 years and above	16	6.0
	Total	268	100
Academic qualification	HND	32	11.9
	BLIS	128	47.8
	MLIS	68	25.4
	PhD	40	14.9
	Total	268	100
Graduation	0-4 years	24	9.0
	5-9 years	52	19.4
	10-14 years	144	53.7
	15-19 years	20	7.5
	20 years and above	28	10.4
	Total	268	100

Source: Researchers' Field Survey, 2024

Table I shows that the majority of the respondents, 184 (68.7%), were male, followed by females at 84 (31.3%). Respondents within the age range of 21-30 years comprised 108 (40.3%), followed by those aged 31-40 years at 80 (29.9%), 41-50 years at 64 (23.9%), and 51 years and above at 16 (6.0%). Furthermore, 128 (47.8%) of the respondents held a Bachelor of Library and Information Science (BLIS), followed by those with a Master of Library and Information Science (MLIS) at 68 (25.4%), a PhD at 40 (14.9%), and a Higher National Diploma (HND) at 32 (14.9%). Finally, 144 (53.7%) of the respondents had 10-14 years of work experience, followed by those with 5-9 years at 52 (19.4%), 20 years and above at 28 (10.4%), 0-4 years at 24 (9.0%), and 15-19 years at 20 (7.5%).

TABLE II EXTENT OF INFOPRENEURSHIP READINESS FOR JOB CREATION AMONG NIGERIAN LIBRARY AND INFORMATION SCIENCE GRADUATES

Options	M	DR
Research services	3.43	GR
Current awareness services (CAS)	3.43	GR
Information repackaging	3.36	GR
Selective dissemination of information (SDI)	3.31	GR
Editing services	3.30	GR
Writing services	3.24	HR
Abstracting services	3.18	HR
Publishing	3.15	HR
Bibliographic compilation and subject analysis	3.15	HR
Document delivery services (DDS)	3.10	HR
Indexing services	3.01	HR
Translation services	3.00	HR
Selling of library facilities	2.96	HR
Selling of books and stationeries	2.87	HR

Decision Rule: If the mean is 1.0 to 1.74, it indicates "Not Ready" (NR); 1.75 to 2.49 indicates "Partially Ready" (PR); 2.50 to 3.24 indicates "Highly Ready" (HR); and 3.25 to 4.0 indicates "Greatly Ready" (GR)

Table II reveals that the respondents are greatly ready to create jobs through research services and current awareness services ($\overline{X} = 3.43$), followed by information repackaging ($\overline{X} = 3.36$), selective dissemination of information ($\overline{X} = 3.31$), and editing services ($\overline{X} = 3.30$). Additionally, the respondents are highly ready to create abstracting services ($\overline{X} = 3.18$), publishing, bibliography compilation, and subject analysis ($\overline{X} = 3.15$), as well as document delivery services ($\overline{X} = 3.10$).

Table III indicates that the respondents are highly ready to create jobs through digital publishing ($\overline{X} = 3.24$), social media management ($\overline{X} = 3.16$), operating cyber cafés ($\overline{X} = 3.00$), graphics design ($\overline{X} = 2.93$), web design ($\overline{X} = 2.90$), managing LMS/ILMS ($\overline{X} = 2.88$), and other activities.

Table IV shows that the respondents strongly agreed that the major barriers to their creation of jobs through infopreneurship and technopreneurship include poor

Internet bandwidth ($\overline{X}=3.49$), unstable cost of living ($\overline{X}=3.48$), inadequate sources of capital ($\overline{X}=3.46$), unfavorable government policies ($\overline{X}=3.40$), insufficient local technological industries to leverage for technopreneurship ($\overline{X}=3.37$), inadequate ICT infrastructure ($\overline{X}=3.34$), inadequate infopreneurship/technopreneurship skills and know-how ($\overline{X}=3.33$), absence of an enabling environment ($\overline{X}=3.33$), bureaucratic bottlenecks in accessing capital ($\overline{X}=3.31$), and inadequate information infrastructure ($\overline{X}=3.28$). The respondents agreed with other options.

TABLE III EXTENT OF TECHNOPRENEURSHIP READINESS FOR JOB CREATION AMONG NIGERIAN LIBRARY AND INFORMATION SCIENCE GRADUATES

Options	M	DR
Digital publishing	3.24	HR
Social media management	3.16	HR
Operating cyber café	3.00	HR
Graphics designing	2.93	HR
Web designing	2.90	HR
Managing LMS/ILMS	2.88	HR
Content creations	2.87	HR
Video editing	2.84	HR
Selling of computers/ICT gadgets	2.78	HR
Programming	2.73	HR

Decision Rule: If the mean is 1.0 to 1.74, then it is classified as Not Ready (NR); 1.75 to 2.49 is classified as Partially Ready (PR); 2.50 to 3.24 is classified as Highly Ready (HR); and 3.25 to 4.0 is classified as Greatly Ready (GR)

TABLE IV JOINT BARRIERS TO INFOPRENEURSHIP AND TECHNOPRENEURSHIP READINESS FOR JOB CREATION AMONG NIGERIAN LIBRARY AND INFORMATION SCIENCE GRADUATES

Options	M	DR
Poor Internet bandwidth	3.49	SA
Unstable cost of living	3.48	SA
Inadequate sources of capital	3.46	SA
Unfavourable government policies	3.40	SA
Insufficient local technological industries to be leveraged for technopreneurship	3.37	SA
Inadequate ICT infrastructure	3.34	SA
Inadequate infopreneurship/ technopreneurship skills/know-how	3.33	SA
Absence of enabling environment	3.33	SA
Bureaucratic bottlenecks in accessing capital	3.31	SA
Inadequate information infrastructure	3.28	SA
High cost of business registration	3.24	A
Poor infopreneurship and technopreneurship mindset	3.24	A
Absence of market for my interested infopreneurship/technopreneurship	3.13	A
Poor marketing skills	3.03	A

Decision Rule: If the mean is 1.0 to 1.74, it corresponds to Strongly Disagree (SD); 1.75 to 2.49 corresponds to Disagree (D); 2.50 to 3.24 corresponds to Agree (A); and 3.25 to 4.0 corresponds to Strongly Agree (SA)

V. DISCUSSION OF FINDINGS

The findings of this study reveal the status of infopreneurship and technopreneurship readiness among Library and Information Science (LIS) graduates in Nigeria. It was discovered that the respondents are greatly ready to create jobs through research services, current awareness services, information repackaging, selective dissemination of information, and editing services. Additionally, the respondents are highly ready to create abstracting services, publishing, bibliography compilation, subject analysis, and document delivery services.

The significance of these findings is that the encouraging level of readiness among respondents affirms the point made by Ramugondo and Ocholla (2022), who noted that the evolution of technopreneurship has led to the continuous development of infopreneurship, offering various activities for infopreneurs. The finding that respondents are greatly ready to create jobs through research services and current awareness services aligns with the reports of Babalola et al. (2018) and Friday and Sawyer-George (2023), who found that librarians in Nigeria engage in research-aid services to achieve financial independence.

Similarly, the respondents' high readiness to create jobs through abstracting services, publishing, bibliography compilation, and subject analysis supports existing studies on infopreneurship among Nigerian librarians. For instance, Babalola et al. (2018) argued that infopreneurial activities such as abstracting, indexing, publishing, and organizing knowledge present robust job creation opportunities for librarians. This notion is corroborated by the study of Salman, Ajani, and Sulyman (2023), which indicates that the sustainability of LIS is closely tied to knowledge management and knowledge organization skills (cataloging and classification). Furthermore, it is noteworthy that respondents are highly ready to create jobs through digital publishing, social media management, operating cyber cafés, graphic design, web design, managing LMS/ILMS, and other activities. While the extent of this readiness may differ from that of infopreneurship, it demonstrates that both infopreneurship and technopreneurship have gained prominence among Nigerian librarians. This contrasts with the situation in South Africa, where Ramugondo and Ocholla (2022) reported minimal infopreneurship practice among LIS graduates.

Literature on awareness and engagement in technopreneurship among Nigerian librarians is scarce, limiting this discussion to existing studies in other disciplines. The respondents' high readiness to create jobs through operating cyber cafés is similar to the findings of Otamiri and Ogwe (2020), who noted that youth in Rivers State were empowered through the cyber café business. Additionally, the respondents' high readiness to create jobs through digital publishing is consistent with their high readiness to create publishing jobs, as revealed in Table II.

Regarding the barriers to the respondents' readiness to create infopreneurship and technopreneurship jobs, findings indicate poor Internet bandwidth, unstable cost of living, inadequate sources of capital, unfavorable government policies, insufficient local technological industries for leveraging technopreneurship, inadequate ICT infrastructure, lack of infopreneurship/technopreneurship skills, absence of an enabling environment, bureaucratic bottlenecks in accessing capital, and inadequate information infrastructure. These barriers validate the findings of previous studies. For instance, Friday and Sawyer-George (2023) found a lack of adequate finance and business infrastructure as hindrances librarians' engagement in infopreneurship technopreneurship, while Ahmed et al., (2024) identified a lack of financial support to start businesses. Comprehensive findings by Adetayo and Hazmat (2021), Ali (2021), Arowosola et al., (2022), John, Nwosu, and Simisaye (2017), and Obiukwu and Onuoha (2022) highlighted a lack of funds, poor supply, inadequate ICT infrastructure, poor marketing skills, an inadequate infopreneurship mindset, and insufficient infopreneurship skills as reasons for librarians' unreadiness to venture into infopreneurship and technopreneurship.

VI. RECOMMENDATIONS

Based on the findings, this study recommends that

- 1. Nigeria's ministries, bodies, and agencies, such as the Ministry of Digital Economy, the Ministry of Information, the Nigerian Information Technology Development Agency (NITDA), and the Librarians Registration Council of Nigeria (LRCN), should prioritize training for both practicing and potential info/technopreneurs.
- 2. Bodies and interest groups, such as the Nigerian Library Association (NLA) and the Association of Nigerian Authors (ANA), should collaborate with the Nigerian government to encourage info/technopreneurs. This collaboration will help address challenges associated with unfavorable government policies, the absence of an enabling environment, bureaucratic bottlenecks in accessing capital, and inadequate information infrastructure.
- 3. The Nigerian Publishers Association should endeavor to create a platform for librarians. This initiative will enable librarians interested in publishing and digital publishing to pursue their interests in publishing and editing services.
- 4. Nigerian Library and Information Science (LIS) schools should design their entrepreneurship courses to be LIS-oriented. This approach will help expose students to the various info/technopreneurship opportunities they can explore and provide them with the necessary skills to succeed as info/technopreneurs.
- 5. Nigerian information technology service providers, including software developers, web designers, and programmers, should identify librarians interested in technopreneurship and collaborate with them to

develop indigenous library-oriented technologies that can be leveraged for library-eneurship.

VII. CONCLUSION

Infopreneurship and technopreneurship are rapidly becoming the bedrocks of the information business in the contemporary world. This study has revealed that Nigerian graduates of Library and Information Science (LIS) are greatly and highly ready to create jobs through infopreneurship and technopreneurship activities, such as research services, current awareness services, publishing, bibliography compilation, subject analysis, publishing, social media management, operating cyber cafés, graphic design, web design, and managing Learning Management Systems/Integrated Library Management Systems (LMS/ILMS). This readiness will enable librarians self-sufficient and become establish info/technopreneurship ventures (Ahmed & Sulyman, 2022), thereby earning extra income for financial independence (Adetayo & Hazmat, 2021), providing for post-retirement needs, meeting unforeseen demands, and fostering personal development (Friday & Sawyer-George, 2023). However, aspirations of Nigerian librarians info/technopreneurship are being challenged by poor Internet bandwidth, unstable costs of living, inadequate sources of capital, unfavorable government policies, insufficient local technological industries to leverage for technopreneurship, inadequate ICT infrastructure, lack of infopreneurship/technopreneurship skills and know-how, absence of an enabling environment, bureaucratic bottlenecks in accessing capital, and inadequate information infrastructure.

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