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Integration of AI Chatbot into Library's Operations: Opportunities or Threats to Librarians' Role?

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Abstract: *The emergence of AI Chatbot is one that is received with mixed feelings. To some librarians, it poses threats to the roles of librarians hence the fear of losing their jobs. This paper is aimed at conceptualizing the place of AI Chatbot in libraries and its limitations, identifying some unreplaceable responsibilities of librarians as well as clearing some doubts as expressed by librarians by reconciling the impacts of Chatbot and how librarians can leverage the technology to enhance their services in the library. To achieve this, it applied interpretive content and document analysis method through which, a holistic review and synthesizing of collated literature from different databases which include Web of Science and Scopus were carried out. From the reviewed literature, it identified among other things that exploring the role of AI-powered Chatbots with virtual assistants enhances the provision of instant customer support, answering queries and assisting with information retrieval as well as that Chatbot or no Chabot, librarians are expected to perform their traditional and evolving roles in this contemporary global digital ecosystem. The paper, deduced that Chatbot is rather a tool with many opportunities rather than threats as thought by some librarians and that librarians should tap into it and brace up for the technological tsunami that is ravaging the entire global digital ecosystem. The suggestion is that in the face of emerging technologies like Chatbot, librarians should leverage the opportunities it creates and partner it to make the best out of it with a view to enhancing their services and not to see it as a threat.*

Keywords: Chatbot, artificial intelligence, library, librarian, information and communication technology, ChatGPT

INTRODUCTION

Humans from inception are skeptical about changes more so, when they assume and perceive that such a change may affect their comfort zone. So changes are in most cases welcomed with

resistance until such a time, it seems irresistible. In this contemporary global digital ecosystem, man is almost woken up on daily basis with news of one form of technological breakthrough or the other. In the past decades, the trending is information and communication technology (ICT) which is today, ruling the world with it associated information superhighway- the internet. As man was battling to understand to the fullest the nitty-gritty of ICT and the power-house, the computer, the imagination of Alan Turning as far back as 1950 came staring us on the face and that is the birth of AI. A technological breakthrough that was initially perceived as a sci-fi concept, while to some, it was a buzzword and to others a myth but today, the reality is facing everyone on the face not because of it novelty, but because it has come to rule the world and has found its way almost in every field of human endeavor. AI in its real form, is a complex and ever-evolving area of study that is multifaceted that unites computer science, psychology, mathematics, neuroscience, linguistics, logic and other fields. Precisely, AI refers to the simulation of specific human cognitive capabilities in machine. The machines are programmed and manipulated by humans to perform complex tasks (Saylor Academy, 2024). Suffice to say, that AI is a gigantic umbrella concepts housing a lot of fascinating subfield such machine learning (ML), deep learning (DL) and natural language processing (NLP) (This helps the machines understand and interact with human language) under which Chatbot operates. Chatbot on its own, is a computer driven device that is programmed in such a way that it can understand human language and communicate as if to say, two persons are communicating in real life (Oracle, 2025). This rampaging technology that is now ruling the world is assessed as a threat to the traditional duties of librarians who by training are curators, custodians, manager and disseminators of information and knowledge. The assertion to this end is that the rapid advancement of artificial intelligence (AI) has ushered in a new era of automated communication, with AI Chatbots becoming increasingly common across various industries. These sophisticated systems, powered by cutting-edge natural language processing and machine learning algorithms, have demonstrated remarkable proficiency in simulating human-like conversations (Adetayo, 2023). Notable instances include OpenAI's ChatGPT, Anthropic's Claude, Google's Gemini, and Microsoft's Copilot showcase the impressive capabilities of modern AI in understanding context, personalizing interactions, and providing efficient responses to user inquiries.

The high level of acceptance and adoption of AI Chatbots, due to their ability to improve customer service and at the same time, reducing costs of operation, has given rise to a strong debate within the library community and among librarians in Nigeria and beyond. At the epicenter of this debate is a basic interrogation which as has put forward by Paulson (2024), is how these technological wonders will affect the traditional role of librarians. Historically, the role of librarians has demonstrated remarkable adaptability, evolving in tandem with societal needs and technological advancements. The current AI revolution presents both opportunities and challenges for the profession. Proponents argue that AI Chatbots could revolutionize library services by handling routine tasks, thereby freeing librarians to focus on higher-value activities such as specialized instruction, community engagement, and strategic planning. Conversely, skeptics express concern that an overreliance on AI could potentially erode the expertise, empathy, and human connection that have long been hallmarks of quality library services (Choice 360, 2023). It is against the

backdrop that this topic becomes necessary. This topic covers variety of matters concerning the application of Chatbots in libraries by conceptualizing the general application of AI in libraries, Chatbots as an offshoot of AI and its impact in Libraries as well as its limitations and finally, the unreplaceable roles of librarians.

It is against this nuanced judgment that this write-up becomes imperative with a view to setting the record straight as they concern the place of AI Chatbot in the library and the real roles of librarians that no machine can replace. Come to think of it, AI and all its offshoot are products of man. This article is also aimed at closing the existing gap in knowledge in this aspect of emerging technology in this part of the world.
The specific objectives of this article therefore are:

1. To explain what AI Chatbot is all about;
2. To identify the uses and limitations of Chatbot in library operations;
3. To reveal those library roles that are unreplaceable.

METHODOLOGY

Interpretive content and document analysis method was adopted with a view to conducting a holistic review and synthesizing of collated literature from different databases which include Web of Science and Scopus. This approach in literature gathering was adopted to ensure a total and well-grounded assessment of the topic being studied and to throw more light on it. The paper also carefully, perused and interpreted all materials in text under content and document analysis which gave room for a two-sided comprehension of the topic being treated. The reason for the addition of materials from Web of Science and Scopus is to further prove the good quality of the believability and trust of the outcome of this study. The implication is that the approach allowed for a total outlook for all related materials on the subject discussed ranging from articles, books, research works and other publications.

General overview of integration of Artificial Intelligence in Libraries

To discuss integrating AI Chatbot in library operations and services in isolation without vividly looking at the source which is artificial intelligence, may be deduced as chasing shadow in the presence of the substance. The implication is that a proper understanding of the all important roles the integration of AI in libraries play, will give one a better picture of the impact of adopting Chatbot in libraries will have. This is because, understanding the impact, will empower librarians to navigate the rapidly transforming technological landscape as well as help them, contribute meaningfully, to the growth of their libraries and prepares them ahead of the ever changing global digital ecosystem.

Be that as it may, the adopting of AI in library, as information way house that is responsible for curating and managing information needs the desirable contemporary technology to collect and organize bulk of information in a new world ruled by information which has resulted to

information overload. Artificial Intelligence as simulation of human intelligence processed by machines, (Laskowski & Tucci, 2024) is presently transforming industries, improving healthcare with precise diagnosis, optimizing manufacturing supply chain and even helping farmers in developed nations plant with better precision (Saylor Academy, 2024). Ultimately, AI has taken hold of almost every aspect of human activities even in some cases, doing better what the human cannot do. The belief is that AI Chatbot has the potential to change how we live, work and play. It has been effectively used in business to automate tasks done by humans, including customer service work, lead generation, fraud detection and quality control. In a number of areas, AI can perform tasks much better than humans. Particularly when it comes to repetitive, detail-oriented tasks, such as analyzing large numbers of legal documents to ensure relevant fields are filled in properly. AI tools often complete jobs quickly and with relatively few errors (TechTarget, 2024). Libraries are not left out in the phenomenal transformation. The belief among good number of librarians as well as information managers is that the rapid advancements in AI and robotics have brought about transformative changes across various industries and libraries should not be in the exception (Onwubiko, 2025a). Libraries as information hubs fostering learning, research and community engagement, integrating AI into its services therefore has the potential to enhancing user experience and expanding access to information in innovative ways (TechTarget, 2024). This was underscored by American Library Association (2019) as it asserts that for effective collection and organization of information in this millennium by libraries, the adoption of AI is a necessity. The further assertion is that AI is a basic tool for organizing today's smart library. As with it, automated libraries which is the end thing in this cotemporary digital world will be effectively managed and optimally utilized (Sridevi and Shanmugam, 2017). Artificial intelligence is not just an intelligent system or software program, it is a biologically motivated technology used to replicate human ways of perceiving and processing information. Intelligent library automation systems rely on artificial intelligence technologies to provide knowledge-based services to library clientele and staff. Artificial intelligence in libraries should not be misconstrued with library automation. While the later implies the degree of mechanization to routine library operations, the former goes beyond just automating library activities, and create intelligent rational systems that behave and act like librarians and requires little or no human intervention.

As asserted by IFLA (2018), librarians are still central to the library's workflow, and AI with its associated tools is simply designed to complement the librarians' experience and knowledge as a search that is only as good as the search terms put in. In the same vein, Collection HQ (2024) AI can also assist librarians with back-office duties in that computers can now complete regular tasks, such as inventory and catalogue management, holds and reservation management, circulation and check-out and fine notifications and fee collection. It is further stated that the use of virtual assistants and Chatbot has also become more commonplace in libraries, acting as a guide for library services and answering frequently asked questions. Having this round-the-clock assistance reduces pressure on library staff, freeing up time to focus on programming and other value-added activities. Indeed, the potential of AI for selective dissemination of information (SDI) cannot be underestimated, considering the fact that SDI is a technique that is used to filter and distribute relevant information to individuals based on their specific interests or information needs and going

by modus operandi of AI, it remains a veritable tool as it holds significant potential in the selective dissemination of information. It is against this backdrop that Okunlaya, Syed Abdullah and Alias (2022) asserted that in the age of AI, SDI can be greatly enhanced by leveraging AI technologies and algorithms.

The application of AI in libraries as noted will facilitate the creation of a well programmed expert system that will improve quality of reference service, cataloguing, classification, indexing of periodicals and acquisitions as well as Natural Language Processing in Library Services. When apply to the field of library and information science, more specifically, to search databases such as the Online Public Access Catalogue (OPAC), indexing is the basis of document retrieval. The purpose of the index is to improve the precision of retrieving parts of the relevant documents; and to reduce the proportion of recalls and related files retrieved (Vijayakumar and Sheshadri, 2019) Another offshoot of AI that has been found valuable in library services is the machine learning (ML). The application of this aspect of AI in library services, provides an array of possible tools to help libraries generate metadata for digital resources, allowing cataloguing to not only increase the speed of metadata generation but also vastly improve the depth and breadth of subject terms. Intelligent Interfaces to Online Databases ((Library Academy, 2024).

In a study carried on librarians perception of application of AI and robotics in libraries, the study revealed that the librarians agree among other things that AI can be used to develop personalized recommendation systems that suggest relevant materials based on user preference and behavior, promote digital preservation and archiving, enhance information accessibility as AI and robotics will make library services more accessible for both able and disabled individuals, including text-to-speech, sign language interpretation and navigation assistance. Adding that, exploring the role of AI-powered Chatbots and virtual assistants will enhance the provision of instant customer support, answering queries and assisting with information retrieval and that utilizing AI-driven data analytics to assess user trends, preference and demands, thereby informing collection development strategies and that Robots can be used to perform library technical jobs like classification, shelving and selection of information materials among others. (Onwubiko, 2025b) As asserted by Liqin and Feng, (2015), AI covers almost all of the business activities of the Smart Library. Through the case analysis and systematic review of a large number of domestic and foreign literature and practical applications, the three application areas are summarized as: Intelligent resource system, intelligent management (smart warehouse management and intelligent security management), intelligent services (smart application services, intelligent consulting services, intelligent knowledge services.

4. Conceptual overview of AI Chatbot

The evolution AI Chatbot as known today, is traced to the 1950s when Alan Turing had the vision of intelligent machines which gave birth to the famous AI the source of Chatbot. From that period, the development of AI remained a continuum down the contemporary period of super-intelligent supercomputers. The phone tree was indeed, the original Chatbot but it usage was so cumbersome and frustrating as customers could no easily select one option after another to find their way

through automated customer model. However with the tremendous improvement in technology and the emergence of sophisticated AI, ML as well as NLP came the model into pop-up, live onscreen chat (Oracle, 2025).

Basically, a Chatbot is a computer program that simulates and processes human conversation (either written or spoken), allowing humans to interact with digital devices as if they were communicating with a real person. Chatbot can also be seen as rudimentary programs that answer a simple query with a single-line response, or as sophisticated as digital assistants that learn and evolve to deliver increasing levels of personalization as they gather and process information (Oracle, 2025). The technology so-to-speak, is driven by AI, automated rules, natural-language processing (NLP) and machine learning (ML), Chatbot process data to deliver responses to requests of all kinds.

Chatbot as explained is divided into two main types which are, task-oriented and data-driven and predictive Chatbots, While Task-oriented (declarative) Chatbots are single-purpose programs that focus on performing one function and use rules, NLP, and very little ML, to generate automated but conversational responses to user inquiries. Data-driven and predictive (conversational) Chatbots also known as virtual assistants or digital assistants, and they are much more sophisticated, interactive, and personalized than task-oriented Chatbots. These Chatbots are contextually aware and leverage natural-language understanding (NLU), NLP, and ML to learn as they go. They apply predictive intelligence and analytics to enable personalization based on user profiles and past user behavior. Digital assistants can learn a user's preferences over time, provide recommendations, and even anticipate needs. In addition to monitoring data and intent, they can initiate conversations. Apple's Siri and Amazon's Alexa are examples of consumer-oriented, data-driven, predictive Chatbots.

Interactions with these Chatbots are highly specific and structured and are most applicable to support and service functions like; think robust and interactive FAQs. As observed, task-oriented Chatbots can handle common questions, such as queries about hours of business or simple transactions that do not involve a variety of variables. Though they do use NLP so that end users can experience them in a conversational way, but their capabilities are fairly basic. These are currently the most commonly used Chatbots. As not to remain confused, Chatbots are programmed in such a way that advanced digital assistants can connect to several single-purpose Chatbots under one umbrella and pull disparate information from each of them after which, the information is combine to perform a task while still maintaining context (Oracle, 2025).

It imperative to state that with digitalization transforming the societies into mobile-first population, and messaging applications growing in popularity, Chatbots are increasingly playing an important role in this mobility-driven transformation. The emphasis is that, intelligent conversational Chatbots are often interfacing for mobile applications thereby changing the way businesses and customers interact. This may not be far from the prediction of the developers of ChatGPT that within the next ten years, artificial intelligence (AI) systems will exceed expert skill levels in most

domains, and carry out as much productive work as one of today's largest corporations. To establish the high rate at which Chatbots are spreading round the globe, OpenAI on March14, 2023, released the GPT-4 model that succeeded ChatGPT based on GPT-3.5, which generated extensive discussions in the scientific community (Bockting et al. 2023; Owens 2023; Stokel-Walker 2023; Stokel-Walker and Van Noorden 2023). While Microsoft Five months later, heralded that over one billion chats and 750 million images had been generated by users within six months since their release of the new Bing (now Copilot), an artificial intelligence (AI)-enabled Internet search engine (Microsoft 2023).

Impact of Chatbot in Libraries and Observed Limitations

AI Chatbots have been recorded to boost operational efficiency and reduce cost of operations. This was underscored by Oracle (2025) when it did state that AI Chatbots boost operational efficiency and bring cost saving while at the same time, offering inconvenience and added services to both staff and customers. They also allow companies to easily resolve many types of customer queries and issues while reducing the need for human interaction. Panda and Chakravarty (2022) in a study through the utilization of Engati, a versatile AI Chatbot service, to provide an overview of its uses and multitasking features in libraries found that AI Chatbots offer a reliable solution for initiating virtual assistance, augmenting reference services, and promoting a "library without walls" concept.

It has also been discovered that exploring the role of AI-powered Chatbots and virtual assistants enhance the provision of instant customer support, answering queries and assisting with information retrieval. Whereas, utilizing AI-driven data analytics to assess user trends, preference and demands, is a way of informing collection development strategies and apart from the fact that robots can be used to perform library technical jobs like classification, shelving and selection of information materials among others. Chatbots such as ChatGPT, Copilot, Claude, and Gemini connect with users via a conversational interface and can respond to questions, ideate, outline and develop lengthy texts all while maintaining context in the flow of conversation. This is an indication that Chatbots are increasingly being utilized for a broad spectrum of writing tasks, from emails to academic papers (Grammarly, 2024)

Furthermore, AI Chatbots are known to have a recognizable abilities in streamlining library information retrieval and processing. This is because, Chatbots in a very smooth and fast way while capitalizing on natural language processing and machine learning, analyze library users queries within a record hence, promoting accessibility of information and convenience (Chen, 2023). It is also known to have the ability to handle at the same time large amount of queries. It is in this regard that Adetayo, (2023) posited that a major asset of Chatbots is their ability to handle high volumes of inquiries simultaneously without performance declines and to address concurrent patron needs promptly which the librarians cannot as usually, experience tiredness or bandwidth limitations.

Another main benefit of Chatbots is that they can be readily available 24 hours a day and the whole seven days in a week (24/7) with little assistance. On the part of the librarians, they work based on schedules while Chatbots make it possible for users to have all-time access to library services breaking the barrier of location while accommodating diversified needs and schedules. As expressed by Fokina (2024) with Chatbots having automated and digital infrastructure without human barriers, they readily adapt to fluctuations in demand without performance declines and by handling repetitive inquiries, they also reduce librarians' workloads with this, librarians can focus on advanced tasks.

Above all, recent developments in AI technology have brought about profound changes in library operations, extending far beyond simple Chatbot interactions. AI-driven data analytics are now being leveraged to optimize library management, facilitating more informed decision-making in critical areas such as collection development, resource allocation and budget planning. Furthermore, AI-powered platforms are fostering knowledge sharing and interdisciplinary collaboration, connecting researchers and patrons with shared interests across diverse fields of study.

In the same vein, AI Chatbots and virtual assistants powered by natural language processing (NLP) have been of help to students with impairments through improving their communication skills and helping them with a range of activities. The nub of the matter is AI Chatbots employ natural language processing (NLP) to communicate with users in natural language, answering their questions and holding discussions. These Chatbots can provide instant conversational support by being embedded into Augmentative and Alternative Communication (AAC) devices. However, their limitations become so noticeable when faced with complex or ambiguous language that lack clear intent or context. Unlike librarians who can provide needed aids in line with individual needs and contexts, in the case of Chatbots, when faced with this scenarios; may likely struggle as they rely on algorithms rather than qualitative assessment. Furthermore, Chatbots have also been observed to struggle with queries requiring critical thinking or subject matter expertise, like literary critiques or specialized research (Critical Thinking Sectets, 2024).

Gastinger (2023) in his contribution though with no personal experience on the use ChatGPT, in the libraries revealed that up to 35% of her colleagues have integrated such tools into their practices but noted that the tool is error prone as there was an incident where students attempted to borrow non-existent books based on ChatGPT's recommendations. This she added, underscores the importance of verifying information and has placed a question mark on the discussions regarding integrating AI into academics.In the same vein, Munoo (2023), expressed his fear at the high level at which AI ChatGPT is being discussed both the university and professional circles but expresses his fear into its effectiveness, limitations as its impacts on duties remain unclear and emphasized the need for further evaluation of the tool as to understanding its implications.

In an IFLA (2023) organized discussion on rapid emergence and capabilities of ChatGPT in generating content, it was one of mixed feelings as some appreciate its potential as a digital

assistant, others allayed fear over misuse which has already led to bans in some settings. The optimism expressed is that it has the potential to impact on jobs such as; metadata creation and reference questions, and probably in the near future may complement or replace search methods. However, there was the expression of fear over ethical consideration such as privacy and integrity (Cox and Tzoc, 2023).

Contributing, Lo (2023), sees opportunities for ChatGPT to streamline processes like cataloging and research queries. However, he emphasizes the need for AI literacy to navigate ethical considerations. Furthermore, if the associated ethical conundrums would be properly taken care of, Pun (2023) envisaged ChatGPT as a potential tool for learning. These views highlight the opportunities and threats of integrating AI tools into libraries. A situation, that calls for a roundtable discussion. Collectively, these insights showcase ongoing discussions surrounding emerging AI tools in diverse library settings globally. While routine tasks may increasingly be managed by AI, qualitatively assessing information credibility and establishing ethical frameworks appear vital before wider adoption unfolds.

As has been noted, AI is very good at automating ordinary and repetitive processes and when incorporated into a Chatbot for these types of tasks, it usually functions well. However, if a demand is made on a Chatbot that extends beyond its capabilities or makes its task more complicated, it might struggle and that has negative consequences for businesses and customers. Above all, there are questions and issues that it simply may not be able to answer or resolve for such as, complex service issues that have a large number of variables (Oracle, 2025).

As noted, regardless of the fact that AI Chatbot promises efficient, scalable services, the fear is that it can in a calculated and deliberate manner cause deadly biases and lack in transparency thereby ethically posing dangers. Above all, as algorithmic systems built by analyzing patterns in training data, Chatbot reflects an in-built societal biases around race, gender, culture and more (Xue et al., 2023). Suffice to say that without proactive bias detection testing and human oversight of data inputs and decision-making processes, AI Chatbots used in library services could provide discriminatory book suggestions, reinforce stereotypes in answering patron queries or exclude marginalized groups. A case in point, is an initial trials of library Chatbots that demonstrated higher error rates for non-native English speakers (Han et al., 2023) in as much as recent AI Chatbots have improved on it. The proprietary nature of commercial Chatbot software also precludes transparency about how algorithms are trained and how responses are generated based on patron questions (Blackman & Ammanath, 2022). This in ability of the proprietary nature of commercial Chatbot software to preclude the transparency of how algorithms are trained is an indication that biases may persist unabated. Generally, speaking, revealed Oracle (2025), Chatbots do not have a history of being used for hacking purposes as they are summarily, conversational tools that perform routine tasks efficiently. People like them because they help them get through those tasks quickly so they can focus their attention on high-level, strategic and engaging activities that require human capabilities that cannot be replicated by machines.

Unreplaceable Roles of Librarians

At the emergence of intelligent computers, the assumption was that it was a wizard until man came to realize that everything about the computer is garbage-in, garbage-out (GIGO). In the case of the AI and all associated offshoots, the story by all standards have not changed. One cannot assumed that human librarians will be pushed by the side by AI on the ground that AI is about to achieve human-level intelligence and become infallible and bias free. The glaring truth is that AI and all other associates are man-made technologies that cannot think and learn on their own, therefore need human support and control. From the general analysis of the modus operandi of AI and its offshoots, it is imperative to understand that while they might excel at specific tasks, including complex ones, they still lack the general intelligence and capabilities of humans.

On this ground, librarians still have their roles to play as information managers and custodians of knowledge and should not be scared of job lost as the only thing that ought to be done, is to acknowledge that we are in a dynamic world. To this end, the world as it is today, is driven by technology under the umbrella of AI and its branches. In this circumstance, librarians have no option than to look into the seed of time and adjust with the trends, make changes along the way, and keeping it current and up-to-date in tandem with the emerging technologies. In this drive to being irrelevant in the comity of information managers, librarians should therefore have it at the back of their minds that being innovative and being the first mover on promising new trends to leverage first mover advantages were important.

The emphasis is that Chatbot or no Chabot, librarians are expected to perform their traditional and evolving roles in this contemporary global digital ecosystem. From the time of papyrus to the Guttenberg printed paper down to this digital age, librarians are known to be custodians of knowledge (Onwubiko, 2020). One outstanding point is that with the emergence of digital age that has resulted to information explosion e-sources and online services, role of librarians, have increased from the traditional role to that of digital literacy trainer, makerspaces creators for 3D-printers and providing support for researchers in their advanced research data search. (Merga, 2020; Rahaman, 2023).

In the present dispensation, librarians are not only managing information and ensuring that they get to the right users, they are now marketers of library resources creating that cordiality between the library and the users through personalized services This human relationship noted Viros (2019) ensures that all users are given that sense of belonging in their pursuance of knowledge while community impact, brings people together through organizing book clubs, cultural events and more, fostering belonging and social cohesion. In the vein, librarians give support to all users of the library thereby creating a workable rapport between the library and her clientele and making the library a communal spaces. (Wojciechowska, 2020; Figueroa and Shawgo, 2022; Adetayo et al., 2023).

The advent of information and communication technologies spurred by the internet heralded a digital world that sees information growing at geometrical proportion leading to information

overload. This left global information users with volumes of data and not knowing the desirable and needed. In this situation, it remains the sole duty of librarians as professional in information handling to assist users to make the right choice of information. This librarians do by assisting users in their enquiries and directing them to the right research methodology and information evaluation and quality control by careful selection and acquisitions of materials through which reliability, credibility and biasness of a source is ascertain. In this, librarians do not just apply algorithms rather, they apply subjective human judgment (De Paor and Heravi, 2020; Stanford, 2023).

Librarians have from inception, remained custodians and promoters of various cultural heritage through their cross-cultural acquisitions of materials which AI cannot. This implies that librarians promote diversity and cultural engagement by direct community engagement. By so doing, they have become masters in navigating differences and promoting representation in collections/services as they partner cultural groups developing inclusive programs that celebrate heritage and identity (Moran, 2021).

Librarians are famous in upholding intellectual freedom and library users' privacy. In that users are at liberty to use any material available in the library to build up their intellectual capabilities without hindrance and interference and users personal data obtained in the cause of borrowing any information material or during research are kept private. While librarians prioritize security through encryption, anonymity and data retention limits, this cannot be said of AI Chatbot that collect user data for analytics (ALA, 2019; Chen et al., 2021). The position is that some libraries may potentially using ChatGPT as a way to supporting technical service work suit for creating catalog records but in all, it will not replace people doing the work but may only help to facilitate the process (Pun, 2023).

CONCLUSION AND RECOMMENDATIONS

The aversion that the emergence of AI Chatbot is a threat to librarians' roles, is a misnomer. It is not in doubt that Chatbot exhibit her level of expediency and competency in handling day-to-day inquiries, it cannot be deduced that it would take the place of the unreplaceable expertise and skills of librarians and the cordiality that is expressed by librarians to users. The human connection is distinctive and no machine can take the place. Regardless of these technological improvement available evidence reveals that the absence of the human touch in AI connectivity stands as a notable shortcoming of the technology. Any outstanding idea of librarians will depend in their ability to known the side they have chosen or stands for, cultural inclination as well as their individualized aid. These qualities cannot be boost of by even the most advanced AI systems and where they try, they struggle to replicate them. Suffice to say, that from time immemorial, librarians are known to be ubiquitous and do adapt to any desirable transformation and technological trends in tandem with information management and the present dispensation would not be an exception. Librarians have indeed, come a long way and have always be found desirable at any point in time. In this regard, the suggestion are:

1. As libraries continue to evolve in the digital age, there is a compelling opportunity to develop an integrated model that harnesses the strengths of both AI Chatbot and librarians. By leveraging AI to handle repetitive queries and streamline routine processes, librarians can redirect their focus towards delivering high-touch, personalized services that prioritize ethical considerations and community impact (Gecko, 2023).
2. The integration of AI into library services has also catalyzed important discussions regarding AI literacy among library professionals. As AI tools become increasingly central to modern library operations, the ability to effectively use, critically evaluate, and responsibly manage these technologies is rapidly becoming an essential competency for librarians. This shift presents both challenges and opportunities: while AI has the potential to significantly enhance library services, it also necessitates a proactive approach to professional development, ensuring that librarians acquire the skills needed to navigate this new technological landscape without compromising the core humanistic values of librarianship.
3. In all, adopting any AI aided system, presents new challenges in upholding patron rights. Granting Chatbot access to confidential records and personal data raises unprecedented privacy vulnerabilities that libraries must mitigate to prevent exploitation. Algorithms must also be continually audited to ensure impartial recommendations -preventing marginalized perspectives from being automatically filtered out. Through governance upholding transparency and fairness, librarians can lead conscientious AI adoption respecting patron dignity while centering on truth and intellectual freedom.
4. One thing is sure, understanding AI and its impact empowers one to navigate the rapidly transforming technological global digital ecosystem or landscape and also helps one contribute meaningfully in one's place of work and also prepares one for the future of the work. As information managers, it is a must for librarians to leverage the opportunities created by emerging technologies by being first movers.
5. Librarians of today, have become driving access to knowledge that has transcended to digital literacy and data services and encouraging inclusivity which guarantees intellectual freedom and promotes critical thinking in a diversified global digital landscape. Yes, Chatbot should be applauded for excelling in scalable assistance, but one should not forget that it is also faced with the problem of handling complex queries and prone to exhibiting biases if not carefully checked and controlled by the same humans. Be it as it may, the integration of AI-aided future will not deny librarians that responsibility of providing personalized services like CAS and SDI, selecting and preserving worth having collections, encouraging community engagement through extension services as well as championing diversity in information and knowledge acquisitions. The implication is that the creation of smart libraries through library automation and the adoption of AI aided library services cannot take the place of the real librarians. In the face of emerging technologies like Chatbot, librarians should leverage the opportunities it creates and partner it to make the best out of it and enhance their services and not to see it as a threat. After all, the 5IR is all about human inclined technology and this implies that the tomorrow of librarianship depends on the ability of librarians to partner emerging technologies from the human angle

and milk their gains. All said and done, librarians remain the epicenter of the library and with all ethical conundrum well checked and managed, Librarians role as driving access of knowledge will go undisturbed regardless of any technology that is in trend.

6. Developers can work around identified limitations by adding a contingency to their Chatbot application that routes the user to another resource or prompts a customer for a different question or issue. Some Chatbots can move seamlessly through transitions between Chatbot, live agent, and back again. As AI technology and implementation continue to evolve, Chatbots and digital assistants will become more seamlessly integrated into our everyday experience.
7. As social institutions serving heterogeneous patrons, libraries must implement rigorous algorithm audits, staff training in ML ethics, push vendors for transparent AI practices, and continuously monitor Chatbot performance across user groups to uphold equitable, inclusive and ethical services as core values. With librarians overseeing operations guided by social conscience rather than just computational metrics, libraries can thoughtfully navigate risks in pursuing AI advancements.

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