

## School Libraries and Future-Ready Skills Development: Bridging the Gap in 21st Century Learning

<sup>1</sup>Olatubosun Akole; <sup>2</sup>Ndako Shuaibu

<sup>1</sup>Bamidele Olumilua University of Education, Science and Technology, Ikere-Ekiti, Ekiti State, Nigeria

<sup>2</sup>Department of Library and Information Science, Federal Polytechnic Bida, Niger State

### Abstract

*This paper explores the importance of school libraries in preparing students for future challenges through the development of critical, digital, and information literacy skills. Future-ready skills are now very important for the sustainability of national development as individuals with future-ready skills can contribute to the national GDP through creative employment which the government of the nation might not be able to provide. School libraries are crucial for the acquisition, development and promotion of these skills, this the school library does through; building digital literacy, encouraging collaboration and teamwork, enhancing critical thinking and problem-solving skills, promoting creativity and innovation, and facilitating lifelong learning. Suggestions on policy and curriculum recommendations were made and the way forward proffered.*

**Keywords:** *School Libraries, Future-Ready Skills, 21st Century Skills, Digital Literacy, Information Literacy, Critical Thinking, Emerging Technologies*

### Introduction

The need for pupils to adjust to a world that is becoming more complex and linked is becoming more pronounced since globalisation, and technology advancements are all driving changes in the 21st-century educational landscape. Consequently, schools are now required to provide children with a variety of "future-ready" abilities, or competencies that will enable them to excel in the future workplace environment, rather than just the traditional academic disciplines. These abilities, according to Trilling and Fadel (2009), go beyond simple memory and emphasise critical thinking, creativity, teamwork, and digital literacy, among other things. Within this framework, school libraries are becoming essential places for students to acquire these skills. From serving as a storehouse of books, the school library now serves as a vibrant learning environment that encourages inquiry, discovery, and the growth of critical thinking abilities. In the past, libraries were thought of as peaceful places reserved for reading and storing information, but in the present day, they are knowledge hubs where students interact with digital tools, engage with a variety of media, and work together on educational projects. According to Omeluzor, Bamidele, Ukangwa and Amadi (2013), school libraries now serve as innovation hubs, giving students access to the materials, tools, and assistance they need to acquire critical 21st-century skills.

As societies become more reliant on technology, students must acquire skills that will prepare them for the future, hence a change in how schools prepare children for life outside the classroom is required, according to the World Economic Forum (2016), as professions of the future will require a combination of digital competencies, creative problem-solving, and interpersonal communication. In addition to facilitating cooperation, granting access to digital technology, and

encouraging lifelong learning skills, the library's traditional role in supporting academic learning has grown. By using these strategies, school libraries can significantly contribute to students' readiness for problems in the future. Though their significance is becoming more widely acknowledged, school libraries still have some obstacles in carrying out their functions. Many school libraries find it difficult to keep up with the demands of modern education due to lack of qualified librarians who understand how to promote future-ready skills as well as restricted financing and access to digital resources. According to Todd (2012), strong infrastructure, forward-thinking policies, and continual professional development for library staff are necessary for school libraries to be successful in preparing children for the future.

In this paper, we explore the role of school libraries in developing future-ready skills among students. By examining the core competencies required for future success which include critical thinking, creativity, collaboration, and digital literacy, the study also aims to highlight how school libraries can serve as key platforms for skill development. Furthermore, It also talks about how new technology may be incorporated into libraries to better prepare students for the problems of the future. The article ends with suggestions for how school libraries may play a bigger role in helping students develop skills that will be needed in the future for legislators, educators, and library workers.

### **Understanding Future-Ready Skills**

The range of abilities needed to prosper in a world driven by technology and constantly changing is referred to as "future-ready skills." These competencies integrate traditional academic knowledge with contemporary problem-solving and technological competence. They span the cognitive, technical, and interpersonal domains. The Partnership for 21st Century Learning (P21, 2015) states that the "Four Cs," of critical thinking, communication, collaboration, and creativity, are the four essential categories into which future-ready talents fall. Furthermore, as students are ready for a labour market that is uncertain and changing quickly, digital literacy, information literacy, and adaptability are becoming just as important. According to Trilling and Fadel (2009), the focus on creativity and adaptation sets future-ready capabilities apart from traditional academic abilities. The modern economy needs people who can evaluate complicated problems, interact across cultural and disciplinary borders, and adapt to continuous technology advances. Traditional educational paradigms placed an emphasis on memorization and repetitive work. In their work, Trilling and Fadel emphasize the need of transitioning away from content-heavy curriculum toward approaches that encourage experience learning and skill building.

Moreover, stakeholders in education across the globe have firmly embraced the future-ready skills framework. In order to develop autonomous thinkers who can adjust to a world that is changing quickly, the Organisation for Economic Co-operation and Development (OECD, 2018) encourages the inclusion of critical thinking and problem-solving in curricula. The emphasis in education has shifted from knowledge consumption to knowledge creation, highlighting the significance of acquiring skills that will be needed in the future through a variety of channels, including school libraries.

### **Importance of Future-Ready Skills in Education**

Future-ready skills are crucial because they can help students to succeed academically as well as be actively involved in society and the workforce Foo and Chua (2023). The World Economic Forum (2016) projects that 65 per cent of today's elementary school-age youngsters will eventually work in jobs that do not yet exist. This forecast emphasizes how important it is that educational systems give students skills that apply to more than only the labour market of today. In this context, critical thinking, technological adaptation, varied team collaboration, and effective communication are considered essential skills (Deschenes, 2024). The COVID-19 pandemic also highlighted the need for education to focus on developing future-ready skills. Students who possessed high digital literacy and self-management abilities were better equipped to adjust to new learning settings when educational institutions across the globe transitioned to remote learning. Proficiency in online platform navigation, time management, and virtual collaboration has become critical, underscoring the fact that future-ready abilities are pertinent to both present educational requirements and future work opportunities (Li (2022).

School libraries provide a distinct ability to facilitate the advancement of these proficiencies. Libraries are frequently more adaptable than classrooms when it comes to providing access to digital resources and encouraging self-directed learning, as noted by Kumar, Saravanakumar, Antoniraj, Rajkumar, Jayanthi, Senthilkumar and Mirdula (2024). Libraries can make a big difference in students' capacity to deal with the complexity of the future by offering resources that promote inquiry, creativity, and problem-solving.

### **Connection to Global Trends**

Global trends in education are more closely matched with the need to develop skills that will be necessary in the future. Initiatives that highlight the significance of acquiring skills that support employment and lifelong learning, such as UNESCO's Sustainable Development Goal 4, which centres on high-quality education, are in place. Furthermore, to address global issues like inequality, climate change, and digital disruption, future-ready skills are essential, as highlighted by the OECD's Future of Education and Skills 2030 project (OECD, 2018). The importance of integrating technology and adaptability into education is being highlighted by these worldwide trends, which makes school libraries even more vital in helping students have access to the experiences and materials they need to develop these skills.

School libraries play a vital role in fostering digital literacy, which is essential for developing future-ready abilities in a digital age. According to Umar and Yusuf (2023), digital literacy encompasses not just proficiency with technology but also the ability to evaluate digital content critically, maintain digital identities, and engage in responsible online communities. Because of the proliferation of false information and digital manipulation, children must acquire strong digital literacy abilities. School libraries, with their wide range of media and resources, are in a prime position to support this literacy.

### **The Role of Digital Literacy and Information Literacy**

Information and digital literacy are vital abilities that will prepare students for the future. Digital literacy includes the abilities needed to interact and traverse digital settings, whereas information literacy refers to the capacity to find, assess, and

use information efficiently. When combined, these literacies provide students with the skills they need to prosper in a world where digital tools and content are becoming more and more prevalent Mokhtari (2023). The school library has evolved from being viewed as a repository for knowledge to one that is as vital for fostering digital literacy.

Studies by Ternenge and Agipu (2019) highlight how important it is for libraries to support students when they search for information by assisting them in locating sources and evaluating the reliability and applicability of those sources. The ability to efficiently sort through large amounts of information, determine what is reliable, and synthesize that knowledge is essential in the digital age. School librarians are in a good position to assist students in acquiring these competencies because of their knowledge of information management.

### **The Impact of Emerging Technologies on Skill Development**

New technologies are becoming more and more integrated into education. Examples include coding courses, virtual reality (VR), and artificial intelligence (AI). As mentioned by Abid, Mohd, Mohd and Rajiv (2022), incorporating these technologies into school libraries can significantly improve students' abilities to be prepared for the future. For instance, although VR tools can encourage creativity and provide immersive learning experiences, coding classes can help students improve computational thinking and problem-solving abilities. Libraries that adopt these technologies provide places for students to explore, invent, and gain knowledge through practical applications.

But for technology to be successfully incorporated into libraries, careful planning and sufficient funding are needed. To successfully incorporate these tools into their classroom, Dede (2014) contends that professional development is a necessity for educators and librarians. To guarantee fair access to digital resources, schools also need to solve infrastructure deficiencies. Without these tools in place, the potential of school libraries to create future-ready skills may remain unmet. To sum up, students need to have future-ready abilities in order to navigate an unpredictable future that is being shaped by societal and technological changes. School libraries are vital in equipping students for the problems of the future because they provide access to digital resources, encourage inquiry-based learning, and promote teamwork. School libraries may continue to be essential places for students to learn the skills they need to succeed in the twenty-first century by embracing modern technologies and coordinating their offerings with international educational trends.

### **Role of School Libraries in Skill Development**

School libraries are now vibrant spaces that are becoming more and more crucial to the development of skills that will prepare students for the future. As the world continues to embrace the digital age, the role of school libraries has extended beyond the conventional functions of storing books and supplying reading materials to pupils. Libraries of today are dynamic learning environments where students acquire essential skills to meet the needs of both higher education and the workforce. These competencies, which are essential for success in the future, include digital literacy, problem-solving, teamwork, and creativity.

Todd (2012) asserts that school libraries are dynamic environments where students interact with the material, apply it to real-world issues, and develop their intellectual abilities. Particularly well-suited for skill development are school libraries' adaptable layouts and the advice offered by its librarians. How important school libraries are in helping students develop the abilities they will need to succeed in the twenty-first century are hereby highlighted:

### **Building Digital Literacy**

Cultivating digital literacy is one of school libraries' main functions in skill development. Proficiency in digital tool navigation and utilization is a need for success in today's environment, both in academic and professional contexts. According to Anthonysamy (2019), digital literacy encompasses more than just gadget operation; it also involves the abilities needed to manage online interactions, assess digital content critically, and negotiate the moral dilemmas presented by the digital age. School libraries act as hubs for digital literacy education by allowing access to digital materials and providing teaching on how to use these technologies effectively Inamdar (2021). When it comes to educating students on how to find, evaluate, and use digital information, librarians are essential. They assist pupils in learning how to discern between reliable and questionable sources of information as well as responsible digital identity management Inamdar (2021).

In addition, a lot of school libraries provide classes and initiatives that enhance students' technical abilities in areas like data analysis, multimedia content development, and coding Mohammed, ALI and Abdullahi (2020). With these assertions, very unfortunate that most of the public secondary schools in Nigeria are without functional school libraries. School libraries offer a place where students can practice and improve their digital abilities in addition to receiving official instruction. By using library resources, students can become skilled in digital environments, whether they are working on group projects, conducting online research, or experimenting with new technology. The need for digital literacy will only increase as technology develops more, making school libraries crucial to prepare children for the future.

### **Encouraging Collaboration and Teamwork**

Another important ability that is taught in the school library is collaboration. It is becoming more widely acknowledged that teamwork skills are essential in the educational and in business environments. In addition to coordinating activities with others, collaboration, according to Reich and Hershcovis (2011) entails fostering interpersonal relationships, resolving problems, and working toward a common objective. The perfect environment for encouraging teamwork is found in school libraries Olubiyo and Olubiyo (2023). Libraries encourage students to participate in cooperative problem-solving and knowledge exchange because they have adaptable locations that can allow group work. Students work together on group assignments, presentations, and research projects in libraries all the time. Through these partnerships, students can work on their communication skills, settle disputes, and gain insight from one another's viewpoints.

Moreover, incorporating technology into school libraries increases the opportunity for cooperation Johnston (2012). Students can work together in real-time and across geography thanks to digital tools like cloud-based platforms,

which allow for task coordination and real-time communication. These resources are frequently made available to students through school libraries, enabling them to collaborate more effectively and creatively. Students get the ability to negotiate the challenges of teamwork through these experiences, which is a talent that is becoming more and more important in today's workforce.

### **Enhancing Critical Thinking and Problem-Solving Skills**

The development of critical thinking and problem-solving skills is an essential function of school libraries, as these are fundamental competencies for future success. As per Todd's (2008) assertion, the inquiry-based learning approach frequently utilized in school libraries fosters students' deep engagement with the material, prompts them to pose significant queries, and looks into various approaches to difficulties Olajide and Zinn (2021). Students are encouraged to work on individual research projects in school libraries that require them to think critically about the material they come across. They learn how to assess the reliability of sources, make connections between disparate bits of data, and create new concepts by combining pre-existing knowledge. Through this process, they enhance their capacity for analytical and creative problem-solving, which is a necessary skill for creativity and leadership.

Additionally, school librarians frequently assist students in conducting research by offering guidance and advice on how to organize questions, uncover pertinent sources, and apply results. Students benefit from this mentorship by learning how to think critically about the information they consume in addition to improving their research skills. Through these inquiry-based activities, students develop their ability to think critically, weigh different points of view, and come up with well-reasoned solutions (Kotsis 2024).

### **Promoting Creativity and Innovation**

Innovation and creativity are becoming more widely acknowledged as essential elements of a well-rounded education. According to OpenStax (2024) creativity is vital to all fields because it generates novel concepts, fresh perspectives, and original fixes for pre-existing issues. School libraries are in a unique position to encourage creativity because of their extensive collection of resources and adaptable learning environments. In school libraries, makerspaces are becoming more and more common. They provide students with the chance to try out new technology and make their own projects. These areas are furnished with resources including robotics kits, design software, and 3D printers that let students use their imaginations and participate in experiential learning.

Makerspaces, in the words of Yusuf, Segun-Adeniran, Esse, Izuagbe, Iwu-James, Adebayo, Fagbohun, Olawoyin and Owolabi (2019) inspire kids to take chances, try out novel concepts, and work together to make those concepts a reality. School libraries foster creativity by giving students access to a range of digital platforms that facilitate content creation and sharing, in addition to physical resources. Whether students are generating multimedia presentations, editing videos, or developing apps, the library gives the tools and support they need to bring their creative ambitions to life. Libraries assist students in developing the creative thinking abilities that will be necessary in the quickly evolving, technologically-driven world of the future by promoting experimentation and invention (Onuoha, Unegbu and Ukachi 2013).

## **Facilitating Lifelong Learning**

The encouragement of lifelong learning is arguably one of the most significant functions school libraries play in the development of skills. In a world where businesses and technology are always changing, people must be able to learn new things and adapt throughout their lives. Schleicher (2020) asserts that the ability to learn on one's own, seek out new information, and adjust to changing circumstances are characteristics of lifelong learning Kungu and Machtmes (2009). This kind of thinking is fostered by school libraries, which give students access to a wealth of materials that promote independent study. Pupils are encouraged to work on projects outside the parameters of the conventional curriculum, experiment with new technology, and investigate subjects of personal interest. Librarians assist students in taking charge of their education by providing advice on where to look for and how to use information.

Furthermore, classes and workshops that introduce pupils to new ideas and abilities are frequently held in libraries. These changes give students the chance to learn new things, try out new tools, and keep up with the most recent advancements in information management and technology. School libraries promote a culture of inquiry and discovery, which assists students in forming the mental habits necessary for lifelong learning (Merga, M. 2020). School libraries provide a significant and multifaceted role in the development of skills. School libraries serve as vital hubs for digital literacy, teamwork, creativity, critical thinking, and lifelong learning, making them essential for equipping students for the opportunities and challenges of the future. With the assistance of librarians, a variety of resources, and participation in cutting-edge learning settings, students are given the tools necessary to succeed in a world that is becoming more complex and interconnected by the day.

## **Emerging Technologies in School Libraries**

School libraries are at the vanguard of this shift in education brought about by emerging technology. School libraries, being establishments that facilitate information access and aid in student education, have to constantly adjust to incorporate novel technology that improve academic achievements. Emerging technologies like robots, augmented reality (AR), virtual reality (VR), and artificial intelligence (AI) present intriguing opportunities for enhancing information access, enabling individualized learning, and stimulating creativity and innovation. Kroski (2017) emphasizes that school libraries can provide students with the chance to interact with the digital world in ways that are not possible in regular classrooms by integrating state-of-the-art technologies. These tools improve education while preparing students for the technological demands of the workforce of the future.

### ***Artificial Intelligence (AI) in School Libraries***

One of the most revolutionary technologies being introduced into school libraries today is artificial intelligence (AI). Applications of AI have the power to completely change how librarians and students use and interact with library resources. AI is increasing the effectiveness and student-centeredness of school libraries with chatbots that respond to inquiries from students instantly and machine learning algorithms that suggest tailored reading options. Automating repetitive work is one of the main uses of AI in school libraries. Digital collection management, usage patterns tracking, and book classification can all be

streamlined by AI-powered solutions. Librarians may now concentrate on more strategic responsibilities, like helping students use technology wisely and supporting inquiry-based learning, thanks to this automation.

By making recommendations for resources based on each student's unique learning preferences and academic needs, Kroski (2017) claims that AI also makes it possible for libraries to provide personalized learning experiences. Furthermore, AI tools can help students with their research by offering more advanced search features. Natural language processing is a tool used by AI-powered search engines like Google Scholar to comprehend difficult searches and provide more relevant results. This enhances students' research skills and digital literacy by improving their capacity to locate trustworthy, high-quality material quickly.

### ***Virtual Reality (VR) and Augmented Reality (AR)***

Emerging technologies like augmented reality (AR) and virtual reality (VR) could have a big impact on school libraries. With the help of these immersive technologies, students may now participate more actively with the material, investigate difficult ideas, and have more engaging, interactive learning experiences. Oyelude (2018) claims that by allowing students to experience historical events, investigate scientific phenomena, and travel to far-off places all from the comfort of their local library VR and AR can revolutionize traditional learning environments.

VR and AR are frequently employed in school libraries to facilitate inquiry-based learning (Wen, Wu, He, Ng, Teo, Looi, & Cai, 2023). For instance, history students can virtually visit past civilizations using virtual reality goggles, while biology students can explore the human body in three dimensions. Textbooks and other print materials might benefit from augmented reality (AR) by allowing digital content like movies, interactive tests, and 3D models to be superimposed over real pages. Students gain a deeper comprehension of the material as well as a more interesting learning experience thanks to these experiences. Additionally, libraries are great places to test out VR and AR technology. With the direction of librarians, students can explore these technologies to construct their own virtual and augmented reality projects, such as designing virtual tours, creating interactive 3D models, or developing AR-enhanced presentations Oyelude (2018). In addition to encouraging creativity, this practical experience with cutting-edge technologies develops technical abilities that are becoming more and more valuable in today's workforce.

### ***Robotics and Makerspaces***

Another cutting-edge technology that is becoming more popular in school libraries is robotics. Students can design, construct, and program robots through robotics classes, giving them a practical introduction to engineering, coding, and problem-solving. As students collaborate to tackle challenging problems, robotics activities foster critical thinking, creativity, and teamwork, according to Rapti and Sapounidis (2024). Makerspaces, which offer robotics kits and other resources for experiential learning, have been established in several school libraries Okuonghae (2019). These makerspaces act as hotspots for creativity where students may work on group projects, try out new technology, and hone their technical abilities. In



addition to robotics, makerspaces frequently include equipment that allows students to realize their ideas, like electronics kits, 3D printers, and laser cutters.

Numerous educational goals are supported when makerspaces and robotics are combined in school libraries. Apart from honing technical abilities, these tasks foster critical thinking, inventive problem-solving, and teamwork in pupils. Additionally, makerspaces promote an innovative and exploratory culture by offering a welcoming setting where students of all skill levels can experiment with new technologies and follow their interests (Soomro, Casakin, Nanjappan, and Gorgiev 2023).

### ***Cloud Computing and Digital Resource Management***

School libraries now require cloud computing as a necessary technology, especially as they move toward digital collections and online services. Without the need for physical storage space, libraries may now store and manage enormous volumes of digital content, such as e-books, scholarly journals, and multimedia resources, thanks to cloud-based platforms. Students can now access digital content from any device with an internet connection, making library resources more accessible. Kroski (2017) asserts that cloud computing also makes it easier for instructors and students to collaborate and share knowledge. Research materials may be shared, group projects can be worked on, and students can co-create digital content in real time with cloud-based technologies like Google Drive and Microsoft OneDrive. These resources help students work more effectively and efficiently since they are frequently included into library services.

Furthermore, librarians may more efficiently manage digital collections thanks to cloud-based library management systems. By automating processes like cataloguing, monitoring usage trends, and overseeing digital database subscriptions, these solutions provide librarians more time to dedicate to meeting the educational requirements of their patrons. Because cloud computing allows libraries to readily grow their digital collections and add new online services as needed, it also makes library services more scalable.

### ***Gamification and Learning Analytics***

The integration of game design aspects outside of games, or gamification, is another rising technology that is finding its way into school libraries. By creating an interactive, game-like environment for learning activities, gamification can increase student motivation and engagement. For example, libraries can utilize digital badges, leaderboards, and challenges to motivate students to accomplish reading goals, explore new topics, or engage in library programs. Another significant technology being used in school libraries is learning analytics, which uses data to evaluate and enhance learning results. Learning analytics systems can monitor how students interact with digital resources and provide valuable information into their learning preferences and habits (Johnson et al., 2015). With the use of this information, librarians may better fulfil the requirements of their patrons by customizing services and materials, resulting in more engaging and successful learning experiences. School libraries are becoming tech-savvy, dynamic learning spaces that meet a variety of educational goals thanks to emerging technologies. These innovations, which range from robotics programs and cloud-based collaboration platforms to AI-powered research tools and immersive VR experiences, are improving the manner in which students access

information, interact with content, and acquire the skills they will need in the future. School libraries will be essential in helping kids get ready for the needs of a world that is changing quickly as technology advances.

### **Policy and Curriculum Recommendations**

Introducing new technologies into school libraries is essential to helping students acquire skills that will prepare them for the future. To guarantee that these technologies are used effectively and that school libraries are prepared to assist students in gaining digital literacy, critical thinking, and collaborative skills, policies and curricula must be updated. The curriculum frameworks and important policy proposals that can assist schools in converting their libraries into vibrant centres for skill development are as outlined.

#### ***1. Ensuring Equitable Access to Technology***

The digital gap is one of the biggest problems school libraries are facing. While some schools could have access to the newest technology, others might not have the infrastructure needed to support it Rajiv, B. (2016). It is imperative for policymakers to guarantee that every student, irrespective of their financial status, has access to the necessary technology and resources to cultivate talents that will be marketable in the future. In this vein, these recommendations were made:

1. Funding from the government should be set aside to assist with the procurement of cutting-edge technology equipment for school libraries, including computers, robotics kits, virtual reality (VR) headsets, and 3D printers.
2. For schools in underfunded areas to have access to the same technical infrastructure as schools in richer areas, partnerships with private groups can help provide grants, donations, or sponsorships.

By offering assistive technology and adaptable learning platforms, schools should be encouraged to create digital literacy programmes that are accessible to all students, including those with disabilities.

#### ***2. Training and Professional Development for Librarians***

To effectively integrate modern technology into school libraries, librarians must possess the necessary knowledge and abilities to oversee, instruct, and administer these resources. Librarians need to change to become technology facilitators who help students use digital resources and technologies Hamad, Al-Fadel, and Fakhouri (2020). To make sure librarians are ready for these new tasks, policymakers and education authorities must give professional development for librarians top priority. The following recommendations will assist in this direction. It would be beneficial to create regular training sessions to assist librarians in keeping abreast of the most recent developments in technology. This might be accomplished by forming alliances with academic institutions, professional associations, and tech businesses.

Librarians should be encouraged to participate in conferences, workshops, and online courses that focus on the use of emerging technology in education.

To educate school librarians for their changing duties, certification programs should include instructional design, digital literacy, and technology integration.

#### ***3. Integration of Technology into the Curriculum***

Schools need to include technology and digital literacy into their curricula to guarantee that pupils are sufficiently prepared for the future. This involves a full examination of existing curricula and the development of new instructional

frameworks that embrace the use of technology to promote learning Johnson, Jacovina, Russell and Soto (2016). Suggestions made here are as follows:

- i. Courses and modules on digital literacy, coding, robotics, and information management should be added to school curricula so that they are included in the core curriculum for all grade levels.
- ii. Project-based learning that is collaborative and allows students to use technology in groups to address real-world problems should be prioritized.
- iii. Educators ought to collaborate closely with school libraries to integrate cutting-edge technology like virtual reality, augmented reality, and gamification into classes and homework assignments.
- iv. The curriculum ought to promote interdisciplinary learning, in which pupils use technology to combine knowledge from several subject areas (e.g., studying science, math, and engineering topics through robots).

#### ***4. Creating a Supportive Policy Framework for Digital Citizenship***

Policies that encourage responsible digital citizenship are becoming more and more necessary as students depend more and more on digital technologies and online resources for their education Bocar and Ancheta (2023). In order to preserve their privacy and engage in critical evaluation of online content, students need to learn how to operate in the digital world in a morally and safely manner. Recommendations made are as follows:

- i. Digital citizenship initiatives that educate children about online safety, privacy, and responsible technology usage should be implemented in schools.
- ii. Policies need to be put in place to safeguard student information and guarantee that privacy regulations are properly followed while employing cloud-based services or other digital resources in the library.
- iii. It is important to create guidelines that will assist librarians and educators in evaluating the reliability of internet sources and in teaching students how to choose trustworthy sources for their research.

#### ***5. Encouraging Collaboration between Stakeholders***

Collaboration between a wide range of stakeholders, including governmental agencies, commercial companies, educational institutions, and the community, is necessary for the successful integration of technology in school libraries Jhurree (2005). Working together can make it easier to obtain money, supply materials, and exchange best practices. On this, the following recommendations were made:

- i. Education officials ought to collaborate with IT firms to establish public-private alliances that facilitate the transfer of gear, software, and resources for professional development to educational institutions.
- ii. To provide kids more chances to experiment with new technologies and hone their skills through extracurricular activities, schools should work with nearby libraries, colleges, and technology hubs.
- iii. To make sure that parents and community people are informed of the advantages and difficulties of integrating technology into education, parent-teacher associations (PTAs) and community groups should be involved in talks concerning technology use in school libraries.

#### ***The Way Forward***

Given how quickly technology is advancing and how it affects education, school libraries are essential for ensuring that students are ready for the future. In order

to accomplish this, school libraries must transform into dynamic learning spaces that support the growth of digital skills and critical thinking in addition to offering information access. This can be achievable when stakeholders embrace; vision for the future, redesigning school libraries as collaborative learning hubs, continuous professional development for librarians and teachers, promoting digital equity, fostering partnerships with industry and higher education and assessing the impact of technology on learning

**Embracing a Vision for the Future:** The future of school libraries lies on adopting a progressive vision that is in line with the changing requirements of society and students. School libraries need to change from being only places to store knowledge to becoming hubs for collaboration, creativity, and innovation Lance (2002). As a result, educational leaders and legislators ought to embrace a strategic vision for libraries' future that places an emphasis on integrating cutting-edge technology, creating adaptable learning environments, and providing chances for teachers and students to collaborate.

**Continuous Professional Development for Librarians and Teachers:** Teachers and librarians must continue their professional development as the educational landscape continues to change Moonasar (2024). Teachers need to be prepared with the information and abilities necessary to successfully incorporate digital technologies into their lessons, and librarians need to be given the authority to oversee technology-driven projects. Therefore schools ought to set up a structure for ongoing professional development that guarantees teachers and librarians stay up to date on the latest developments in technology. Access to online resources and training platforms, cooperative learning groups, and mentorship programs should all be part of this framework.

**Redesigning School Libraries as Collaborative Learning Hubs:** The physical design of school libraries must also develop to support new forms of learning. Conventional study tables and book stacks should make way for adaptable, multipurpose areas that promote teamwork, creativity, and experiential learning Holland (2015). Schools should spend money repurposing their library areas to incorporate makerspaces, digital media laboratories, and cooperative workstations where students may work in groups, explore emerging technologies, and participate in project-based learning. Modular furniture and equipment enable simple reconfiguration to accommodate various activities and learning requirements.

**Promoting Digital Equity:** A top focus is making sure all students have access to the tools and resources they need to build abilities that will prepare them for the future. Planning for school libraries should prioritize digital equity, with an emphasis on closing the digital divide and guaranteeing that all students, regardless of background, may engage in technology-enhanced learning Afzal, Khan, Daud, Ahmad and Butt (2023). Policymakers must give schools in underprivileged communities top priority when allocating funds, guaranteeing that every kid has access to top-notch digital resources, devices, and fast internet. Digital inclusion programs that give students access to technology after school hours like loanable devices or extended library hours should be implemented by schools.

**Fostering Partnerships with Industry and Higher Education:** To allow students the chance to investigate cutting-edge technologies and cultivate skills that are marketable to employers, school libraries ought to form alliances with corporate leaders, postsecondary educational institutions, and neighbourhood associations Johnston (2012). These collaborations can aid in bridging the knowledge gap

between academic instruction and practical application. To give students first-hand exposure to developing technologies, schools should cooperate with nearby industries and technology startups to develop mentorship programs, workshops, and internship opportunities. Through collaborations with universities, students can have access to resources, expert knowledge, and cutting-edge research methods that enhance their education beyond the senior secondary school setting. Assessing the Impact of Technology on Learning: It is critical to evaluate the effects of emerging technologies on student learning and skill development as schools continue to invest in them. School libraries will continue to be successful in preparing children for the future if they are subjected to ongoing evaluation.

### Conclusion

School libraries can lead the way in educational reform by integrating cutting-edge technologies and creative teaching methods to foster the development of skills necessary for the future. School libraries may play a critical role in equipping students for the needs of a fast-changing world by implementing progressive policies, encouraging collaboration, and guaranteeing equal access to resources. The solution is to seize these chances and make a commitment to ongoing policy and practice change.

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