
Hybrid Library Collections, Librarians' Skills, and Level of Administrative Support for Sustainable Environment in A Higher Education Institutions in Central Luzon

Milagros D. Rodriguez, Remedios M. Dela Rosa, LPT, EdD and Susana Cabria Bautista
Graduate School, University of Perpetual Help System Laguna
rodriguezmdaya@gmail.com, Bautista.susana@uphsl.edu.ph, delarosa.remedios@uphsl.edu.ph
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Abstract- Sustaining a higher education environment relies on effectively managing hybrid collections and continuously developing librarians' skills (Johnson et al., 2022) [1]. As academic libraries evolve, they now curate both physical and digital resources, including e-books, online journals, multimedia, and traditional books, while integrating advanced technologies (Brown, 2021) [2]. Hybrid library collections were rated highly across acquisitions, organization, and services/access. Librarians exhibited very high skill levels particularly in communication, organization, research, information management, and technology. Administrative support for sustainability had a strong rating with budget and ICT and facilities. The goal of this study was to explore the hybrid library collections, librarians' skills, and level of administrative support and examined the predictive ability of the strength of hybrid library collections and librarian skills, taken singly or in combination of the extent of administration support for sustainable environment in a higher education institution in Central Luzon. The findings revealed that hybrid library collections were rated as "Strongly Agree" across acquisitions, organization, and services/access (mean = 3.67). Librarians demonstrated a "very high" level of skills (mean = 3.61), particularly in communication, organization, research, information management, and technology. Administrative support for library sustainability was at the "Greatest Extent" (mean = 3.51), with budget and ICT support at 3.49 and physical facilities at 3.53. Significant relationships were found between librarian skills, budget, and hybrid collection management. Regression analysis showed that acquisitions accounted for 45.8% of administrative support variation ($p = 0.002$). The study highlights the crucial role of librarian competencies and institutional support in sustaining hybrid collections.

KEYWORDS

hybrid library collections, librarians' skills, and administrative support

I. Introduction

Chiconela and Chissano (2021)[3] highlighted that the term 'hybrid library' is frequently used in library and information science to describe libraries' evolving roles due to technological advancements. Dadhe and Dubey (2020)[4] noted that libraries have increased electronic resources to support distance education. Despite eased restrictions, hybrid libraries remain adaptable, continuing to enhance electronic communication and update systems to maintain services during the pandemic. Some libraries are also advancing the "Smart Hybrid" approach by improving infrastructure and building on existing policies.

Hybrid collections provide users with access to print, electronic, and multimedia resources, managing both traditional and digital collections (Nwosu, Opara, & Orji, as cited in Jeremia & Mwantimwa, 2022)[5]. Hybrid library collections describe libraries providing users with access to print and electronic resources alongside multimedia resources. These libraries are managing both conventional and digital library collections and multimedia resources (Nwosu, Opara, & Orji, 2019) [6].

According to McNicol (2021) [7], emphasizes the need for librarians to remain adept at traditional cataloging methods while also embracing new standards like BIBFRAME and linked data. This dual proficiency allows librarians to provide accurate resources efficiently in a rapidly changing information landscape.

A study by Liu & Dempsey (2023)[8] discusses how librarians are increasingly taking on roles as information literacy educators, helping patrons navigate complex databases and develop critical research skills. This reinforcing of educational roles highlights a shift towards more proactive engagements with users.

Tennant (as cited in Lawal, 2022) [9] highlights key personal attributes such as the ability to learn quickly and continuously, flexibility, skepticism, risk-taking, a commitment to public service, strong interpersonal skills, the ability to manage change, and the capacity to work independently.

Saunders' (2020)[10] study highlights several implications for both current and future academic library professionals and for LIS faculty responsible for curriculum development. Notably, of the top 10 core skills identified by academic librarians, seven are "soft" or personal skills, such as writing, interpersonal communication, and teamwork—skills that, while essential, are not unique to librarianship or specialized domain knowledge.

Otike and Bar (2021)[10] note that the role of librarians is evolving; libraries now expect librarians to go beyond simply providing information to actively training users on how to locate relevant information amid the vast array of resources. Additionally, librarians are tasked with educating users on distinguishing between fake news and credible information.

Academic libraries are increasingly supporting research by adopting open access and scholarly initiatives (Otike and Bar, 2021)[11]. With a growing number of digital and institutional repositories, libraries are focused on showcasing and sharing institutional research outputs. Librarians are also becoming more involved in the research data lifecycle, collaborating with researchers from data conception through to management and storage (Koltay, 2019) [12].

Mariano et al. (2020)[13] highlighted that the shift from print to digital has significantly transformed library services. Librarians now have expanded roles and responsibilities, including managing research outcomes for their institutions and communities and teaching information retrieval skills in the digital environment. This digital shift has made information access more affordable and widely available.

According to Bales (2020)[14], both librarians, staff, and patrons must adapt significantly in response to library automation projects, whether these involve initial implementation or system migration. One critical aspect is the interaction between individuals and technology. To function effectively in an automated setting, people need to modify their behaviors and thought processes.

Library staff must possess IT skills and competencies to effectively use and apply information and communication technologies (ICTs) for delivering quality library and information services (LIS). As noted by Hossain and Sormunen (as cited in Dube 2020) [15], these skills are essential for computer operations, online database creation and searching, and internet research.

According to Khot (2020) [16], librarians must possess sufficient technical knowledge to operate machinery such as computers, photocopiers, scanners, and printers. As technology continuously evolves and new IT applications emerge, librarians should also be adept at locating information about the latest technologies.

Husna (2022)[17] delineates ten attitudes associated with interpersonal communication between librarians and users, including mindfulness, cultural sensitivity, other orientation, openness, immediacy, metacommunication, and flexibility. Embracing the principle of openness and user support for independently uploading final assignments, librarians extend assistance and address user queries round the clock.

Reddy, Shamprasad, and Pujar (2021)[18] assert that communication skills are a critical component of effective leadership. These skills are essential for translating objectives into reality through interactions with management, publishers/vendors, and users.

Obite (2021) [19] outlines essential interpersonal skills necessary for reference librarians, including the ability to collaborate effectively, maintain social poise, exhibit confidence and self-assurance, demonstrate self-control and tactfulness, make informed decisions, uphold professionalism, prioritize tasks efficiently, be persuasive, enthusiastic, and possess strong communication skills encompassing listening, speaking, reading, and writing

According to Knott (2020), librarians arrange materials and equipment to facilitate information access for patrons. In larger libraries, they oversee support staff who assist with these responsibilities. Additionally, librarians organize public programs and events, including lectures, book discussion groups, and children's activities. They also ensure a safe and orderly environment for both visitors and staff.

Caeiro and Azeiteiro (2020) [20] concurred that Higher Education Institutions (HEIs) play a crucial role in societal transformation and the development of a sustainable society. HEIs can promote sustainable development through various dimensions, including education and curricula, campus operations, organizational management, community engagement, research, and communication.

Nunayon et al. (2020)[21] identified key drivers for efficient electricity management, including a clear vision and objectives for energy programs, necessary knowledge and skills, risk identification, and effective stakeholder communication. Munaro and John (2024)[22] analyzed various energy efficiency strategies at university campuses,

revealing that practical actions are limited and primarily focused on updating energy systems and reducing building energy consumption.

Budihardjo, Ramadan, et al. (2021)[23] identify several key factors influencing the success of Sustainable Development Goals (SDGs) in higher education institutions, including learning, research, campus operations, administration, and socialization. As the realization of organizational goals depends largely on the effective management of resources, skilled personnel, and institutional support, libraries play a crucial role in ensuring access to quality information. The integration of hybrid collections, continuous professional development of librarians, and strong administrative backing are essential in fostering a sustainable learning environment. By enhancing acquisitions, organization, and access to resources, institutions can better support academic excellence and innovation.

For these reasons, the researcher undertook this study to evaluate hybrid collections, librarians' skill levels, and the extent of administrative support in fostering a sustainable environment in Higher Education Institutions (HEIs) in Central Luzon. The study was conducted within HEIs in the region, with respondents selected from the specified locale. Upon completion, the researcher formulated several recommendations aimed at guiding implementers in establishing standards, enhancing library management, and fostering a more collaborative and empowered work environment. These insights seek to support continuous improvements in school libraries, ultimately contributing to the achievement of institutional goals.

1.1 *Objective of the Study*

The overall objective of this study was to assess hybrid collections, librarians' skills, and administrative support in fostering a sustainable environment in Higher Education Institutions (HEIs) in Central Luzon. Specifically, this study aimed to (1) evaluate the strength of hybrid library collections in terms of acquisitions, organization, and services/access, (2) determine the level of librarians' skills in information management, research and reference services, technology proficiency, communication and interpersonal skills, and organizational and managerial skills, (3) assess the extent of administrative support in terms of budget, physical plant and facilities, and ICT, (4) examine the significant relationship between hybrid library collections and librarians' skills, (5) analyze the significant relationship between hybrid library collections and administrative support, (6) explore the significant relationship between librarians' skills and administrative support, and (7) determine how predictive hybrid library collections and librarians' skills, taken singly or in combination, are of administrative support in providing a sustainable environment in HEIs.

II. **Methods**

To obtain the necessary data needed for the study, quantitative research was utilized. Vaidya (2018) [16] defined it as a method of research that relies on measuring variables using a numerical system, analyzing these measurements using any of a variety of statistical models, and reporting relationships and associations among the studied variables.

Likewise, descriptive- correlational research design was employed by the researcher, as it is the most effective research model for this study. Copeland (2022)[24] stated that the aim of descriptive research is to describe a phenomenon and its characteristics. This research is more concerned with what, rather than how or why something has happened. Correlational research refers to a non-experimental research method which studies the relationship between two variables with the help of statistical analysis. Correlational research does not study the effects of extraneous variables on the variables under study. In particular, this study described the hybrid collections, librarians' skills, and Administrative Support for Sustainable Environment of Higher Education Institutions in Central Luzon. Likewise, it probed the significance of relationships, through correlation, between and among the hybrid collections, librarians' skills, and Administrative Support for Sustainable Environment of Higher Education Institutions in Central Luzon. Through the utilization of these methodologies, the researcher sought to answer the (a) hybrid collections, (b) librarians' skills, and (c) Administrative Support for Sustainable Environment of Higher Education Institutions

For the sampling technique, stratified random sampling technique was used in this study. As explained by Lemm (2020) [25], it is a type of probability sampling that allows researchers to improve precision (reduce error) relative to simple random sampling (SRS). The population is divided into non-overlapping groups, or strata, along a relevant dimension then collects a random sample of population members from within each stratum. Using the Raosoft calculator with 90% confidence level and 5% margin of error, the researcher obtained a sample size of 168 librarians as respondents in Higher Education Institutions Central Luzon. The selected respondents were regarded as the best representatives from the total population because they had adequate knowledge of the research topic, which warranted

their selection as respondents of the study.

The respondents of the study were the librarians in Higher Education Institutions Central Luzon. Self-made survey questionnaires were personally and virtually (through Google Forms) administered to the selected respondents to better explain the nature of the study and their participation in the investigation and discuss with them the instructions to follow for an easier and more convenient ways of answering the survey forms. The questionnaire was first validated by discussing it with the thesis adviser to assess the substance and suitability of the items. To ensure that the indicators included in the research questionnaire were relevant to the study, the researcher submitted the questionnaire to experts for suggestions and approval. The accomplished questionnaires were collected right after they were answered by the respondents and the gathered data were tallied, tabulated, analyzed, and interpreted.

Statistical tools such as weighted mean and ranking, Pearson r, and Stepwise Multiple Regression Analysis were used for the analysis of data and interpretation of results.

III. Results and Discussion

I. The Strength of Hybrid Library Collections:

Table 1
The Strength of Hybrid Library Collections: Acquisitions

Indicator	Weighted Mean	Verbal Interpretation	Rank
1. diversity of resource types (digital and physical) available in the library's collection	3.73	Strongly Agree	2.5
2. The library's collection covers a broad range of subjects and formats	3.73	Strongly Agree	2.5
3. The library keep its collection up-to-date with current materials and resources	3.70	Strongly Agree	4
4. Prioritizing acquisitions based on user demand and feedback to ensure the collection remains relevant and use	3.74	Strongly Agree	1
5. Acquiring resources that are accessible to all users, including those with disabilities, and that reflect diverse perspectives and cultures.	3.62	Strongly Agree	5
6. Considering the environmental impact of acquisitions, such as prioritizing digital resources to reduce physical storage needs and the associated carbon footprint.	3.49	Strongly Agree	6
Average	3.67	Strongly Agree	

Table 1 presents the Strength of Hybrid Library Collections in terms of Acquisitions.

As seen in the table, indicator 4 “Prioritizing acquisitions based on user demand and feedback to ensure the collection remains relevant and useful” was ranked 1 with a weighted mean of 3.74, verbally interpreted as “Strongly Agree.” Indicators 1 “Diversity of resource types (digital and physical) available in the library's collection” and 2 “The library's collection covers a broad range of subjects and formats” were ranked 2.5, each with a weighted mean of 3.73, verbally interpreted as “Strongly Agree.”

On the other hand, indicator 3 “The library keeps its collection up-to-date with current materials and resources” was ranked 4 with a weighted mean of 3.70, verbally interpreted as “Strongly Agree.” Indicator 5 “Acquiring resources that are accessible to all users, including those with disabilities, and that reflect diverse perspectives and cultures” was ranked 5 with a weighted mean of 3.62, verbally interpreted as “Strongly Agree.”

Lastly, indicator 6 “Considering the environmental impact of acquisitions, such as prioritizing digital resources to reduce physical storage needs and the associated carbon footprint” was ranked 6 with a weighted mean of 3.49, verbally interpreted as “Strongly Agree.”

To sum up, the average weighted mean of 3.67 revealed that the strength of hybrid library collections in terms of acquisitions was “Strongly Agree.” This implies that the library excels in prioritizing acquisitions based on user demand and feedback, ensuring diversity in resource types, and maintaining an up-to-date collection.

Overall, the library's hybrid collection is commendable for its strength in meeting user demands, maintaining diversity, and staying current. Addressing areas of accessibility and sustainability could further solidify the library's position as a forward-thinking and inclusive resource hub.

Table 2
The Strength of Hybrid Library Collections: Organization

Indicator	Weighted Mean	Verbal Interpretation	Rank
1. digital and physical resources are effectively catalogued to ensure easy discovery and access	3.69	Strongly Agree	3
2. The search and navigation tools for both digital and physical resources are intuitive and user-friendly.	3.67	Strongly Agree	4.5
3. Physical space is used effectively for storing and displaying physical resources.	3.71	Strongly Agree	1.5
4. The resources are accessible to users with different needs, including those with disabilities.	3.67	Strongly Agree	4.5
5. The collections are regularly and effectively maintained and updated.	3.71	Strongly Agree	1.5
6. Related digital and physical resources are well linked to provide a comprehensive view.	3.60	Strongly Agree	6
Average	3.67	Strongly Agree	

Table 2 presents the Strength of Hybrid Library Collections in terms of Organization.

As seen in the table, indicators 3 “Physical space is used effectively for storing and displaying physical resources” and 5 “The collections are regularly and effectively maintained and updated” were ranked 1.5, each with a weighted mean of 3.71, verbally interpreted as “Strongly Agree.” Indicator 1 “Digital and physical resources are effectively catalogued to ensure easy discovery and access” was ranked 3 with a weighted mean of 3.69, verbally interpreted as “Strongly Agree.”

On the other hand, indicators 2 “The search and navigation tools for both digital and physical resources are intuitive and user-friendly” and 4 “The resources are accessible to users with different needs, including those with disabilities” were ranked 4.5, each with a weighted mean of 3.67, verbally interpreted as “Strongly Agree.” Lastly, indicator 6 “Related digital and physical resources are well linked to provide a comprehensive view” was ranked 6 with a weighted mean of 3.60, verbally interpreted as “Strongly Agree.”

To sum up, the average weighted mean of 3.67 revealed that the strength of hybrid library collections in terms of organization was “Strongly Agree.” This implies that the library excels in utilizing physical space effectively and maintaining and updating collections regularly, ensuring optimal organization for easy access. While the library also performs well in resource cataloging and user accessibility, there is room for improvement in linking related digital and physical resources for a more comprehensive view.

Table 3
The Strength of Hybrid Library Collections: Services/Access

Indicator	Weighted Mean	Verbal Interpretation	Rank
1. Users can easily access both digital and physical resources at any time.	3.68	Strongly Agree	3
2. The library supports users well in accessing and using both digital and physical resources.	3.71	Strongly Agree	1
3. The search tools are effective in finding both digital and physical resources.	3.70	Strongly Agree	2
4. The library offers excellent training and guidance on accessing and using hybrid collections	3.66	Strongly Agree	4
5. The library accommodates user preferences and customization for accessing resources.	3.63	Strongly Agree	6
6. The library effectively gathers and responds to user feedback regarding access to resources.	3.65	Strongly Agree	5
Average	3.67	Strongly Agree	

Table 3 presents the Strength of Hybrid Library Collections in terms of Services/Access.

As seen in the table, indicator 2 “The library supports users well in accessing and using both digital and physical resources” was ranked 1 with a weighted mean of 3.71, verbally interpreted as “Strongly Agree.” Indicator 3 “The search tools are effective in finding both digital and physical resources” was ranked 2 with a weighted mean of 3.70, verbally interpreted as “Strongly Agree.”

On the other hand, indicator 1 “Users can easily access both digital and physical resources at any time” was ranked 3 with a weighted mean of 3.68, verbally interpreted as “Strongly Agree.” Indicator 4 “The library offers excellent training and guidance on accessing and using hybrid collections” was ranked 4 with a weighted mean of 3.66, verbally interpreted as “Strongly Agree.” Indicator 6 “The library effectively gathers and responds to user feedback regarding access to resources” was ranked 5 with a weighted mean of 3.65, verbally interpreted as “Strongly Agree.” Lastly, indicator 5 “The library accommodates user preferences and customization for accessing resources” was ranked 6 with a weighted mean of 3.63, verbally interpreted as “Strongly Agree.”

To sum up, the average weighted mean of 3.67 revealed that the strength of hybrid library collections in terms of services/access was “Strongly Agree.” This implies that the library excels in supporting users with seamless access to both digital and physical resources. utilizing effective search tools, and offering valuable training and guidance on using hybrid collections. While the library also performs well in gathering and responding to user feedback, there is room for improvement in accommodating user preferences for accessing resources.

Table 4
Summary Table for the Strength of Hybrid Library Collections

Indicator	Weighted Mean	Verbal Interpretation	Rank
1. Acquisitions	3.67	Strongly Agree	2
2. Organization	3.67	Strongly Agree	2
3. Services/Access	3.67	Strongly Agree	2
Overall Weighted Mean	3.67	Strongly Agree	

Table 4 presents the Summary Table for the Strength of Hybrid Library Collections. As presented in the table, the overall weighted mean of 3.67 indicates that the strength of hybrid library collections was “Strongly Agree.”, specifically, the strength in acquisitions, organization, and services/access were all rated at 3.67

2. The Level of Librarian Skills

Table 5
The Level of Librarian Skills: Information Management

Indicator	Weighted Mean	Verbal Interpretation	Rank
1. I am proficient in cataloging and classifying information and resources for easy retrieval.	3.54	Very High	4
2. I effectively manage and maintain digital databases, ensuring data integrity and accessibility.	3.54	Very High	4
3. I possess skills in preserving digital information and maintaining digital repositories.	3.50	Very High	6
4. I am skilled in using various tools and techniques to locate and access relevant information efficiently.	3.66	Very High	1
5. I am capable of selecting, organizing, and maintaining valuable data sets for long-term use.	3.61	Very High	2
6. I am familiar with information technology tools and software used in information management	3.54	Very High	4
Average	3.57	Very High	

Table 5 presents the Level of Librarian Skills in Information Management.

As seen in the table, indicator 4 “I am skilled in using various tools and techniques to locate and access relevant information efficiently” was ranked 1 with a weighted mean of 3.66, verbally interpreted as “Very High.” Indicator 5 “I am capable of selecting, organizing, and maintaining valuable data sets for long-term use” was ranked 2 with a weighted mean of 3.61, verbally interpreted as “Very High.”

On the other hand, indicators 1 “I am proficient in cataloging and classifying information and resources for easy retrieval,” 2 “I effectively manage and maintain digital databases, ensuring data integrity and accessibility,” and 6 “I am familiar with information technology tools and software used in information management” were ranked 4, each with a weighted mean of 3.54, verbally interpreted as “Very High.” Indicator 3 “I possess skills in preserving digital information and maintaining digital repositories” was ranked 6 with a weighted mean of 3.50, verbally interpreted as “Very High.”

To sum up, the average weighted mean of 3.57 revealed that the level of librarian skills in information management was “Very High.” This implies that librarians were skills in locating and accessing relevant information efficiently, organizing data sets for long-term use, and demonstrating proficiency in cataloging, classifying, and maintaining digital databases and repositories.

Table 6
The Level of Librarian Skills: Research and Reference Services

Indicator	Weighted Mean	Verbal Interpretation	Rank
1. I have extensive knowledge of both digital and physical information sources, including databases, journals, books, and other reference materials.	3.51	Very High	5.5
2. I am skilled in teaching users how to evaluate and use information critically and effectively.	3.51	Very High	5.5
3. I am proficient in using advanced search techniques and tools to find specific and obscure information.	3.55	Very High	2
4. I have in-depth knowledge in specific subject areas to provide specialized reference assistance.	3.54	Very High	3
5. I am familiar with reference management software and digital tools to enhance research services.	3.53	Very High	4
6. I am committed to staying updated with the latest reference tools, resources, and research methodologies.	3.86	Very High	1
Average	3.58	Very High	

Table 6 shows the level of librarian skills in research and reference services, As seen in the table, indicator 6 “I am committed to staying updated with the latest reference tools, resources, and research methodologies” was ranked 1 with a weighted mean of 3.86, verbally interpreted as “Very High.” Indicator 3 “I am proficient in using advanced search techniques and tools to find specific and obscure information” was ranked 2 with a weighted mean of 3.55, verbally interpreted as “Very High.”

On the other hand, indicator 4 “I have in-depth knowledge in specific subject areas to provide specialized reference assistance” was ranked 3 with a weighted mean of 3.54, verbally interpreted as “Very High.” Indicator 5 “I am familiar with reference management software and digital tools to enhance research services” was ranked 4 with a weighted mean of 3.53, verbally interpreted as “Very High.” Indicators 1 “I have extensive knowledge of both digital and physical information sources, including databases, journals, books, and other reference materials” and 6 “I am committed to staying updated with the latest reference tools, resources, and research methodologies.” were ranked 5.5, each with a weighted mean of 3.51, verbally interpreted as “Very High.”

To sum up, the average weighted mean of 3.58 revealed that the level of librarian skills in research and reference services was “Very High.” This implies that librarians possess advanced proficiency in using search tools, staying updated with reference tools, and providing specialized assistance in specific subject areas. Their extensive knowledge of both digital and physical resources, along with their ability to teach users effective information evaluation, ensures the provision of high-quality research and reference services.

Table 7
The Level of Librarian Skills: Technology Proficiency

Indicator	Weighted Mean	Verbal Interpretation	Rank
1. I am proficient in using library management software and systems.	3.55	Very High	3.5
2. I can effectively utilize digital tools and applications for information retrieval.	3.54	Very High	5
3. I am skilled in managing and maintaining digital archives and repositories.	3.55	Very High	3.5
4. I can troubleshoot basic technical issues related to library technology.	3.52	Very High	6
5. I am familiar with various digital resources and platforms, such as databases and e-books.	3.60	Very High	2
6. I am adept at using social media and online communication tools for library outreach and engagement.	3.63	Very High	1
Average	3.56	Very High	

Table 7 presents the Level of Librarian Skills in Technology Proficiency.

As seen in the table, indicator 6 “I am adept at using social media and online communication tools for library outreach and engagement” was ranked 1 with a weighted mean of 3.63, verbally interpreted as “Very High.” Indicator 5 “I am familiar with various digital resources and platforms, such as databases and e-books” was ranked 2 with a weighted mean of 3.60, verbally interpreted as “Very High.”

On the other hand, indicators 1 “I am proficient in using library management software and systems” and 3 “I am skilled in managing and maintaining digital archives and repositories” were ranked 3.5, each with a weighted mean of 3.55, verbally interpreted as “Very High.” Indicator 2 “I can effectively utilize digital tools and applications for information retrieval” was ranked 5 with a weighted mean of 3.54, Indicator 4 “I can troubleshoot basic technical issues related to library technology” was ranked 6 with a weighted mean of 3.52, verbally interpreted as “Very High.”

To sum up, the average weighted mean of 3.56 revealed that the level of librarian skills in technology proficiency was “Very High.” This implies that librarians excel in using digital resources, managing archives, and employing social media tools for outreach and engagement. They are proficient in using library management systems and are capable of troubleshooting basic technical issues, ensuring smooth technology operations within the library environment.

Table 8
The Level of Librarian Skills: Communication and Interpersonal Skills

Indicator	Weighted Mean	Verbal Interpretation	Rank
1. I effectively communicate with users to understand their information needs.	3.68	Very High	3
2. I actively listen to users to provide appropriate assistance and support.	3.71	Very High	1.5
3. I am skilled in providing constructive feedback and guidance to users.	3.67	Very High	4
4. I engage with diverse groups and adapt my communication style as needed.	3.65	Very High	5
5. I can facilitate group discussions and workshops on library resources.	3.63	Very High	6
6. I maintain professionalism in all interactions with users and staff.	3.71	Very High	1.5
Average	3.68	Very High	

Table 8 presents the Level of Librarian Skills in Communication and Interpersonal Skills.

As seen in the table, indicators 2 “I actively listen to users to provide appropriate assistance and support” and 6 “I maintain professionalism in all interactions with users and staff” were both ranked 1.5, each with a weighted mean of 3.71, verbally interpreted as “Very High.” Indicator 1 “I effectively communicate with users to understand their information needs” was ranked 3 with a weighted mean of 3.68, verbally interpreted as “Very High.”

On the other hand, indicator 3 “I am skilled in providing constructive feedback and guidance to users” was ranked 4 with a weighted mean of 3.67, verbally interpreted as “Very High.” Indicator 4 “I engage with diverse groups and adapt my communication style as needed” was ranked 5 with a weighted mean of 3.65, verbally interpreted as “Very High.” Indicator 5 “I can facilitate group discussions and workshops on library resources” was ranked 6 with a weighted mean of 3.63, verbally interpreted as “Very High.”

To sum up, the average weighted mean of 3.68 revealed that the level of librarian skills in communication and interpersonal skills was “Very High.” This implies that librarians excel in effectively communicating with users, actively listening, and maintaining professionalism in all interactions. They are skilled in providing constructive feedback and guidance to users.

Table 9
The Level of Librarian Skills: Organization and Managerial Skills

Indicator	Weighted Mean	Verbal Interpretation	Rank
1. I effectively plan and organize library services and operations.	3.64	Very High	3.5
2. I manage library resources efficiently to meet user needs.	3.67	Very High	2
3. I can evaluate and assess library programs and services for improvement	3.64	Very High	3.5
4. I allocate budgets and resources effectively to maximize library services	3.60	Very High	6
5. I foster a positive work environment that encourages collaboration and innovation.	3.69	Very High	1
6. I can develop and implement strategic plans for library development.	3.62	Very High	5
Average	3.64	Very High	

Table 9 presents the Level of Librarian Skills in Organization and Managerial Skills. As seen in the table, indicator 5 “I foster a positive work environment that encourages collaboration and innovation” was ranked 1 with a weighted mean of 3.69, verbally interpreted as “Very High.” Indicator 2 “I manage library resources efficiently to meet user needs” was ranked 2 with a weighted mean of 3.67, verbally interpreted as “Very High.” Indicator 1 “I effectively plan and organize library services and operations” and indicator 3 “I can evaluate and assess library programs and services for improvement” were ranked 3.5, each with a weighted mean of 3.64, verbally interpreted as “Very High.” Indicator 6 “I can develop and implement strategic plans for library development” was ranked 5 with a weighted mean of 3.62, verbally interpreted as “Very High.”

Finally, indicator 4 “I allocate budgets and resources effectively to maximize library services” was ranked 6 with a weighted mean of 3.60, verbally interpreted as “Very High.”

To sum up, the average weighted mean of 3.64 revealed that the level of librarian skills in organization and managerial skills was “Very High.” This implies that librarians excel in fostering a positive work environment that encourages collaboration and innovation, managing library resources efficiently to meet user needs, and effectively planning and organizing library services and operations. They are also skilled in evaluating and assessing library programs for improvement, developing and implementing strategic plans, and effectively allocating budgets and resources to maximize library services.

Table 10
Summary Table for the Level of Librarian Skills

Indicator	Weighted Mean	Verbal Interpretation	Rank
1. Information Management	3.57	Very High	4
2. Research and Reference Services	3.58	Very High	3
3. Technology proficiency	3.56	Very High	5
4. Communication and Interpersonal Skills	3.68	Very High	1
5. Organizational and managerial skills	3.64	Very High	2

Overall Weighted Mean	3.61	Very High	
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Table 10 presents a summary of the level of librarian skills across various areas. The highest-ranked skill is "Communication and Interpersonal Skills," with a weighted mean of 3.68, verbally interpreted as "Very High,". Following closely, "Organizational and Managerial Skills" ranked second with a weighted mean of 3.64, also interpreted as "Very High." In third place is "Research and Reference Services," with a weighted mean of 3.58, demonstrating a very high level of expertise in this area. The fourth-ranked skill, "Information Management," has a weighted mean of 3.57, also rated as "Very High." Finally, "Technology Proficiency" ranked fifth with a weighted mean of 3.56, which is also verbally interpreted as "Very High." The overall weighted mean across all indicators was 3.61, indicating a consistently high level of librarian skills along Information Management, Research and Reference Services, Technology proficiency, Communication and Interpersonal Skills and Organizational and managerial skills.

3. The Extent of Administrative Support to Library in Providing Sustainable Environment

Table 11
The Extent of Administrative Support to Library in Providing Sustainable Environment: Budget

Indicator	Weighted Mean	Verbal Interpretation	Rank
1. I receive adequate budget support to implement sustainability initiatives in the library.	3.48	Greatest extent	6
2. I have the financial resources necessary to maintain and upgrade sustainable technologies.	3.49	Greatest extent	4
3. I can secure budget for sustainable resource acquisitions, such as eco-friendly materials.	3.49	Greatest extent	4
4. I receive support for developing partnerships that enhance the library's sustainability efforts.	3.51	Greatest extent	1.5
5. I am encouraged to propose new sustainability initiatives with financial backing.	3.49	Greatest extent	4
6. I feel that the administration prioritizes sustainability in budget decisions for the library.	3.51	Greatest extent	1.5
Average	3.49	Greatest extent	

Table 11 presents the extent of administrative support to the library in providing a sustainable environment in terms of budget.

As seen in the table, indicator 4, "I receive support for developing partnerships that enhance the library's sustainability efforts", and indicator 6, "I feel that the administration prioritizes sustainability in budget decisions for the library," were ranked 1.5, with a weighted mean of 3.51, verbally interpreted as "greatest extent." Indicator 2, "I have the financial resources necessary to maintain and upgrade sustainable technologies," indicator 3, "I can secure budget for sustainable resource acquisitions, such as eco-friendly materials," and indicator 5, "I am encouraged to propose new sustainability initiatives with financial backing," were tied at rank 4, with a weighted mean of 3.49, verbally interpreted as "greatest extent."

On the other hand, indicator 1, "I receive adequate budget support to implement sustainability initiatives in the library," was ranked 6, with a weighted mean of 3.48, verbally interpreted as "greatest extent."

To sum up, the average weighted mean of 3.49 verbally interpreted as greatest extend revealed that the extent of administrative support to the library in providing a sustainable environment in terms of budget was at the "greatest extent" level. This implies that the librarian receives support for partnerships, prioritization of sustainability in budget decisions, and adequate resources for maintaining and upgrading sustainable technologies.

Table 12

The Extent of Administrative Support to Library in Providing Sustainable Environment: Physical Plant and Facilities

Indicator	Weighted Mean	Verbal Interpretation	Rank
1. I receive adequate support for maintaining eco-friendly infrastructure in the library.	3.52	Greatest extent	4.5
2. I have access to funding for renovations that enhance sustainability in library facilities.	3.48	Greatest extent	6
3. I receive support for incorporating sustainable materials in library construction and furnishings.	3.54	Greatest extent	3
4. I receive assistance in ensuring that library facilities comply with sustainability standards.	3.52	Greatest extent	4.5
5. I am encouraged to propose improvements for sustainability in physical plant operations.	3.60	Greatest extent	1
6. I feel that the administration prioritizes sustainability in decisions related to library facilities.	3.55	Greatest extent	2
Average	3.53	Greatest extent	

Table 12 presents the extent of administrative support to the library in providing a sustainable environment in terms of physical plant and facilities.

As shown in the table, indicator 5, “I am encouraged to propose improvements for sustainability in physical plant operations,” was ranked 1, with a weighted mean of 3.60, verbally interpreted as “greatest extent.” Indicator 6, “I feel that the administration prioritizes sustainability in decisions related to library facilities,” was ranked 2, with a weighted mean of 3.55, verbally interpreted as “greatest extent.”

Indicator 3, “I receive support for incorporating sustainable materials in library construction and furnishings,” was ranked 3, with a weighted mean of 3.54, verbally interpreted as “greatest extent.”

On the other hand, indicators 1 and 4, “I receive adequate support for maintaining eco-friendly infrastructure in the library,” and “I receive assistance in ensuring that library facilities comply with sustainability standards,” were tied at rank 4.5, with a weighted mean of 3.52, verbally interpreted as “greatest extent.” Indicator 2, “I have access to funding for renovations that enhance sustainability in library facilities,” was ranked 6, with a weighted mean of 3.48, verbally interpreted as “greatest extent.”

To sum up, the average weighted mean of 3.53 “revealed that the extent of administrative support to the library in providing a sustainable environment in terms of physical plant and facilities was at the “greatest extent” level. This implies that the administration highly supports proposing sustainability improvements in physical plant operations, prioritizes sustainability in decision-making related to library facilities, and provides support for incorporating sustainable materials in library construction and furnishings.

Table 13

The Extent of Administrative Support to Library in Providing Sustainable Environment: ICT

Indicator	Weighted Mean	Verbal Interpretation	Rank
1. I receive adequate support for acquiring sustainable ICT tools and technologies.	3.50	Greatest extent	3
2. I have access to funding for implementing energy-efficient hardware and software solutions.	3.46	Greatest extent	4.5
3. I receive support for maintaining and upgrading digital infrastructure to enhance sustainability.	3.54	Greatest extent	1

4. I have the necessary resources to promote digital literacy and sustainability initiatives through technology.	3.52	Greatest extent	2
5. I receive assistance in integrating sustainable practices into library IT operations.	3.46	Greatest extent	4.5
6. I have regular communication about policies and initiatives related to sustainable ICT practices in the library.	3.44	Greatest extent	6
Average	3.49	Greatest extent	

Table 13 presents the extent of administrative support to the library in providing a sustainable environment in terms of Information and Communication Technology (ICT).

As shown in the table, indicator 3, “I receive support for maintaining and upgrading digital infrastructure to enhance sustainability,” was ranked 1, with a weighted mean of 3.54, verbally interpreted as “greatest extent.” Indicator 4, “I have the necessary resources to promote digital literacy and sustainability initiatives through technology,” was ranked 2, with a weighted mean of 3.52, verbally interpreted as “greatest extent.” Indicator 1, “I receive adequate support for acquiring sustainable ICT tools and technologies,” was ranked 3, with a weighted mean of 3.50, verbally interpreted as “greatest extent.”

On the other hand, indicators 2 and 5, “I have access to funding for implementing energy-efficient hardware and software solutions,” and “I receive assistance in integrating sustainable practices into library IT operations,” were tied at rank 4.5, with a weighted mean of 3.46, verbally interpreted as “greatest extent.” Indicator 6, “I have regular communication about policies and initiatives related to sustainable ICT practices in the library,” was ranked 6, with a weighted mean of 3.44, verbally interpreted as “greatest extent.”

To sum it up, the average weighted mean of 3.49 indicates that the extent of administrative support to the library in providing a sustainable environment through ICT is at the “greatest extent” level. This implies that the librarian receives strong support for maintaining and upgrading digital infrastructure, promotes digital literacy and sustainability initiatives through technology, and ensures the acquisition of sustainable ICT tools and technologies.

Table 14
Summary Table for the Extent of Administrative Support to Library in Providing Sustainable Environment

Indicator	Weighted Mean	Verbal Interpretation	Rank
1. Budget	3.49	Greatest extent	2.5
2. Physical plant and facilities	3.53	Greatest extent	1
3. ICT	3.49	Greatest Extent	2.5
Overall Weighted Mean	3.51	Greatest extent	

Table 14 presents the summary of the extent of administrative support to the library in providing a sustainable environment. The overall weighted mean was 3.51 which reflects the strong administrative support for sustainability across budget, physical plant and facilities and ICT.

The results of the study align with Hinton (2020), who emphasized that adequate physical environments enhance user engagement and service delivery in libraries. Karp (2021) noted that libraries with strong financial support are better positioned to invest in resources and services that boost user satisfaction. Similarly, Zhao et al. (2023) argue that strategic budget planning is essential for libraries to achieve long-term sustainability and adaptability in a rapidly evolving information landscape.

Table 15
Relationship between the Strength of Hybrid Library Collections and Librarian Skills in Higher Education Institutions in Central Luzon

Librarian Skills	Strength of Hybrid Library Collections		
	Acquisitions	Organization	Services/Access

Information Management	r=0.466** Moderate correlation p=0.000	r=0.480** Moderate correlation p=0.000	r=0.509** Moderate correlation p=0.000
Research and Reference Services	r=0.148 Low correlation p=0.056	r=0.187* Low correlation p=0.015	r=0.203** Low correlation p=0.008
Technology proficiency	r=0.413** Moderate correlation p=0.000	r=0.490** Moderate correlation p=0.000	r=0.496** Moderate correlation p=0.000
Communication and Interpersonal Skills	r=0.492** Moderate correlation p=0.000	r=0.635** Moderate correlation p=0.000	r=0.557** Moderate correlation p=0.000
Organizational and managerial skills	r=0.430** Moderate correlation p=0.000	r=0.558** Moderate correlation p=0.000	r=0.542** Moderate correlation p=0.000
**Significant @ 0.01; *Significant @ 0.05			

Table 15 presents the relationship between librarian skills and the strength of hybrid library collections

in higher education institutions. There was a significant relationship between information management skills and acquisitions (r=0.466; p=.000<.01), organization (r=0.480; p=.000<.01), and services/access (r=0.509; p=.000<.01).

Further, there was a significant relationship between technology proficiency and acquisitions (r=0.413; p=.000<.01), organization (r=0.490; p=.000<.01), and services/access (r=0.496; p=.000<.01).

Similarly, communication and interpersonal skills were significantly related to acquisitions (r=0.492; p=.000<.01), organization (r=0.635; p=.000<.01), and services/access (r=0.557; p=.000<.01).

Lastly, organizational and managerial skills were also significantly related to acquisitions (r=0.430; p=.000<.01), organization (r=0.558; p=.000<.01), and services/access (r=0.542; p=.000<.01).

This implies that the better is the Hybrid Library Collection along Acquisition, Organization and Services the higher the library skills in terms of Information Management, Technology proficiency, Communication and Interpersonal Skills, and Organizational and Managerial Skills.

Table 16

Relationship between the Strength of Hybrid Library Collections and the Extent of Administrative Support to Library in Providing Sustainable Environment in a Higher Education Institutions in Central Luzon

Strength of Hybrid Library Collections	Extent of Administrative Support		
	Budget	Physical plant and facilities	ICT
Acquisitions	r=0.463** Moderate correlation p=0.000	r=0.495 Moderate correlation p=0.000	r=0.481** Moderate correlation p=0.000
Organization	r=0.424** Moderate correlation p=0.000	r=0.481** Moderate correlation p=0.000	r=0.456** Moderate correlation p=0.000
Services/Access	r=0.399** Low correlation p=0.000	r=0.459* Moderate correlation p=0.000	r=0.403** Moderate correlation p=0.000
**Significant @ 0.01			

Table 16 presents the relationship between the strength of hybrid library collections and the extent of administrative support in providing a sustainable library environment in higher education institutions. There was a significant relationship between budget support and acquisitions (r=0.463; p=.000<.01), organization (r=0.424; p=.000<.01), and services/access (r=0.399; p=.000<.01).

Similarly, there was a significant relationship between support for physical plant and facilities and acquisitions ($r=0.495$; $p=.000<.01$), organization ($r=0.481$; $p=.000<.01$), and services/access ($r=0.459$; $p=.000<.01$).

This means that the greater the extent of administrative support for library facilities enhances the strength of hybrid library collections across acquisitions, organizations, services and/or access.

Table 17

Relationship between the Librarian Skills and the Extent of Administrative Support in Providing Sustainable Environment in a Higher Education Institutions in Central Luzon

Librarian Skills	Extent of Administrative Support		
	Budget	Physical plant and facilities	ICT
Information Management	$r=0.498^{**}$ Moderate correlation $p=0.000$	$r=0.493^{**}$ Moderate correlation $p=0.000$	$r=0.516^{**}$ Moderate correlation $p=0.000$
Research and Reference Services	$r=0.319^{**}$ Moderate correlation $p=0.000$	$r=0.354^{**}$ Moderate correlation $p=0.000$	$r=0.286^{**}$ Low correlation $p=0.000$
Technology proficiency	$r=0.441^{**}$ Moderate correlation $p=0.000$	$r=0.486^{**}$ Moderate correlation $p=0.000$	$r=0.471^{**}$ Moderate correlation $p=0.000$
Communication and Interpersonal Skills	$r=0.396^{**}$ Moderate correlation $p=0.000$	$r=0.512^{**}$ Moderate correlation $p=0.000$	$r=0.485^{**}$ Moderate correlation $p=0.000$
Organizational and managerial skills	$r=0.428^{**}$ Moderate correlation $p=0.000$	$r=0.521^{**}$ Moderate correlation $p=0.000$	$r=0.433^{**}$ Moderate correlation $p=0.000$
**Significant @ 0.01			

Table 17 presents the relationship between librarian skills and the extent of administrative support in providing a sustainable library environment in higher education institutions. There was a significant relationship between information management skills and budget support ($r=0.498$; $p=.000<.01$) as well as support for physical plant and facilities ($r=0.493$; $p=.000<.01$),

Similarly, research and reference services skills showed a significant but weaker relationship with budget support ($r=0.319$; $p=.000<.01$) and physical plant and facilities ($r=0.354$; $p=.000<.01$). Technology proficiency had a moderate significant correlation with budget support ($r=0.441$; $p=.000<.01$) and physical plant and facilities ($r=0.486$; $p=.000<.01$)

Communication and interpersonal skills were also significantly related to budget support ($r=0.396$; $p=.000<.01$) and physical plant and facilities ($r=0.512$; $p=.000<.01$),.

Lastly, organizational and managerial skills had significant correlations with budget support ($r=0.428$; $p=.000<.01$) and physical plant and facilities ($r=0.521$; $p=.000<.01$),

The greater the extent of administrative support along budget, physical plant and facilities contributes to a develop stronger, more adaptable librarian skills particularly in Information Management, Research and Reference Services, Technology Proficiency, Communication and Interpersonal Skills and Organizational and Managerial Skills.

Table 18

Regression Analysis between the Strength of Hybrid Library Collections and Librarian Skills taken Singly or in Combination of the Extent of Administrative Support to Library in Providing Sustainable Environment in a Higher Education Institutions in Central Luzon

Predictor	Dependent Variable	R ²	F	p-value	β	t	p-value
Acquisitions	Extent of Administrative support	0.458	16.812	0.000	0.294	3.192	0.002*
*Significant @ 0.01							

As indicated in the table 18, acquisitions accounted for 45.80% ($F=16.812$; $t=3.192$) of the variation of the administrative support. In addition, results showed that for every one-unit increase in acquisitions, there is 0.294 increase in the administrative support. The probability value of 0.002 was less than the significance level of 0.01 which implies that acquisitions significantly predict the extent of administrative support to library in providing sustainable environment in higher education institutions in Central Luzon.

IV. Conclusion and Recommendation

Based on the findings of the study, several conclusions were drawn. The strength of hybrid library collections is evident across acquisitions, organization, and services/access, as respondents "Strongly Agree," reflecting balanced and consistent performance in all evaluated areas. Additionally, the level of librarian skills is consistently rated as "Very High" across all indicators, with communication and interpersonal skills receiving the highest rank, followed closely by organizational and managerial skills, research and reference services, information management, and technology proficiency. Furthermore, the extent of administrative support to the library in providing a sustainable environment is at the "Greatest Extent," signifying strong backing in areas such as physical plant and facilities, as well as budget allocation. This level of support ensures that the library remains well-equipped and adequately funded, fostering a sustainable environment that enhances its ability to serve the academic community effectively. Moreover, the study highlights that higher librarian skills, including information management, technology proficiency, communication, and organizational skills, significantly enhance the strength of hybrid library collections in acquisitions, organization, and services/access. Likewise, increased budget support and support for physical plant and facilities play a crucial role in strengthening library collections across these areas. In addition, a strong correlation was found between higher levels of information management, research and reference service skills, technology proficiency, communication and interpersonal skills, and organizational and managerial skills with increased budget support and enhanced physical plant and facilities, thereby improving the overall quality of library services. Finally, the study identifies acquisitions as a key driver of administrative support in hybrid library collections, with each increase in acquisitions leading to greater institutional backing. Based on these findings, the proposed action plan may be implemented by librarians to further enhance hybrid library collections and services.

In light of these conclusions, several recommendations are proposed. Educational leaders should ensure a balanced investment across acquisitions, organization, and services/access to maintain the strength of hybrid library collections. Strategic resource allocation is essential to reinforcing each aspect equally, fostering robust collections, efficient organizational systems, and user-friendly services. Additionally, Higher Educational Institution (HEI) Administrators should motivate library staff by promoting professional development and collaboration while advocating for sufficient resources to enhance acquisitions, organization, and services, thereby improving the library's impact on student and faculty success. Strong administrative support is also necessary, and HEI Administrators should secure adequate funding while advocating for continuous improvements in library services to contribute effectively to academic sustainability. Furthermore, librarians should be encouraged to pursue ongoing professional development through training, workshops, and peer collaboration. Enhancing their skills in information management, technology, communication, and organizational leadership will ultimately improve library services and the support provided to students and faculty. To further strengthen hybrid library collections, librarians should focus on improving their competencies in these key areas. Additionally, administrators should allocate sufficient funds, implement sustainable policies, and upgrade digital resources, while staff training, collaborative initiatives, and sustainability monitoring should be prioritized. Conducting awareness campaigns on responsible library use will also contribute to long-term sustainability. Lastly, future researchers may replicate this study by exploring additional variables such as staff training programs, library user satisfaction, technological advancements, and the impact of budget allocation on specific library services. Investigating the role of external partnerships and community engagement in the success of hybrid libraries could also provide valuable insights for future improvements.

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