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# User Preferences And Reading Habits: A Comparative Study Of E-Resources And Traditional Books In Academic Libraries

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**Abstract-** This study compares user preference and reading behavior of e-resource and hardcopy books in academic libraries. The mixed-methods research study focuses on how academic users relate to different formats, how this relationship is motivated, and what the effects of decisions are. The key lessons indicate that the preferences vary according to the type of task and concentrate on the print as a tool of deep reading and on e-resources as fast and searchable. The study might offer feasible recommendations to academic libraries on maximizing collection building, user experience, and information literacy programs to improve balanced and responsive resource environment.

**Keywords-**E-resources, print, libraries, preferences, habits, digital, reading, comprehension, annotation, accessibility, usability, searchability, fatigue, attention, deep-reading, skimming, collection, literacy, devices, hybrid.

## INTRODUCTION

The information environment in academic libraries worldwide is dynamic, and it is being characterized by high levels of electronic resources integration as well as the previously existing collections of traditional print materials. This developing ecology poses opportunities and challenges, and it on the whole changes how students and researchers access, engage with, and use scholarly content. Learning The technology has greatly changed the form of reading in academics which in turn has been made possible by the growth of digital formats, convenience and access. Nevertheless, the further inapplicability of print materials and the perceived materiality and presumed advantages of the long attention span and cognitive processes are some of the causes of a complex user-media engagement. This relationship between user preferences in the such formats and reading behaviour is complicated and of greatest significance to academic libraries that endeavour to optimize the benefits of their collections, improving user experience and enabling effective learning and research.

# **BACKGROUND AND RATIONALE**

The introduction of e-resource has completely restructured the availability of information in academic libraries in terms of 24/7 access and shopping and filtering of more advanced search functions (Lincoln, 2013.). Despite this dominance online, print books still play a significant role and are occasionally used to deal with specific studying tasks. In this twofold ecosystem, the interaction of the users on both formats must be studied in detail.

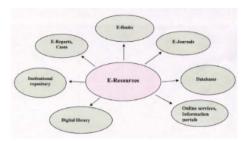


Fig 1: Sample set of e-resources & services

# PROBLEM STATEMENT

Although e-resources have been widely adopted and traditional books still exist in academic libraries, there is yet to be bridged in the evidence gap of how format-specific selections directly affect specific reading behaviours, understanding, and learning outcomes in academic environments. Existing knowledge is frequently based on documented preferences, which might not be able to fully reflect the complexity of real user interaction, and the cognition during the process of reading tasks in various media

## AIM AND SCOPE

The aim of the comparison study is to conduct research on the preferences and reading habits of academic library users when using e-resources over traditional print books. The scope involves user satisfaction analysis and perceived usability and behavioural results consisting of understanding, attention, and note-taking behaviour in both formats.

## **CONTRIBUTION**

The study can make solid recommendations to academic libraries that can guide a strategic decision-making concerning collection, the creation of user experience in the physical and virtual interface, and enhancing information literacy training (Tripathi & Jeevan, 2013).. These leads will be used in the allocation of resources, imply the most suitable strategy of planning the study space to facilitate various reading modalities and be part of the successful planning of hybrid library services to meet the various and evolving needs of academic consumers.



Fig 2: Importance of Establishing E-Libraries in Educational Institutes

# LITERATURE REVIEW

The relationship between technology, user behaviour and access to information has been a prolific subject of scholarly reading. This review is a synthesis of empirical and theoretical

studies in format preferences, reading patterns and their impacts of library usage, and provides a bit of context of the current study in a broader academic paradigm. It is a never-ending battle of sham literature as the perceived merits and demerits of both categories leave an implication on the decision of users and further use. Emerging trends propose a mixed method of academic reading, with a person selectively using formats depending on the task requirements and personal interests. Hwang, et al., (2014) reports that there are still substantial differences among fields, age groups and technology-mindedness, suggesting the necessity of more sophisticated exploration in academic libraries.

#### E-RESOURCE ADOPTION AND USAGE

E-resources have become the most popular resource in academic libraries because they are more convenient and accessible than ever before and provide 24/7 access anywhere with an internet connection. Such access greatly enlarges the scope of academic material, enabling users to ignore geographical and temporal limits of physical collections. High-level e-platforms also permit quick access to information, giving the user the ability to locate particular keywords, phrases, and passages of large amounts of digital text fast, which is mostly unattainable in print. The device ecology, which includes laptops, tablets and smartphones, further diversifies the interaction of the user with e-resources and allows flexible reading conditions (Zha, Zhang & Yan, 2014)

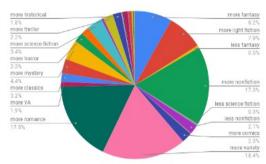


Fig 3: Reading Habits Survey Results

# TRADITIONAL PRINT USE AND BROWSING

Classical print books still have a very special niche in academic circles; first and foremost, they appeal to the tactile sense of attention and give the possibility of concentration and deep attention. Holding a book in your hands, flipping through pages, and a specific smell of paper are often mentioned as part of a more immersive reading experience. Serendipitous discovery Shelf-browsing entails the impromptu finding of other related topics or surprising sources, which is a rich part of academic exploration that is often hard to simulate in the virtual world

#### COMPARATIVE READING HABITS

Research findings indicate subtle variations in understanding, effort, and involvement in formats. E-resources provide non-linear navigation and search and anytime access, which promotes non-linear navigation and search of targeted retrieval. Screen fatigue, such as eye strain and attention drift, tends to reduce continuous attention and understanding

#### GAPS AND TENSIONS

Regardless of the considerable body of research, various gaps and tensions remain in the

literature on user preferences and reading behaviours between e-resources and traditional books. Among the key problems identified is the inconsistent quantification of "preference" and "reading habit," which produces inconsistent results and impedes generalisability. Research has been found to be based on self-reported results that do not necessarily correlate with real behaviour, thereby necessitating the use of more objective, behavioural instrumentation (Lopatovska et al., 20214). Moreover, the impact of disciplinary differences is not thoroughly studied; different fields (humanities, social sciences, and STEM) might be distinguished by varying reading habits and format preferences, although most of the research is conducted in a generalized manner.

## THEORETICAL FRAMEWORK

To learn systematically the preferences and reading attitudes of users in academic libraries, this research relies on the well-established theories of technology adoption and cognitive psychology. The theoretical framework combines the Technology Acceptance Model (TAM) and its variations, as well as the Unified Theory of Acceptance and Use of Technology (UTAUT), to describe format choice in the view of the user. Concurrently, the cognitive load theory and the media effects theory are applied to describe behavioural and cognitive implications associated with the utilisation of e-resources versus traditional books (Olsen, Kleivset & Langseth, 2013). This holistic method permits the correlation perceived utility and ease of use and real engagement and cognitive effect of various reading media.

#### TAM AND EXTENSIONS

The Technology Acceptance Model (TAM) presupposes that the key predictors of user acceptance and actual use of technology would be perceived usefulness (PU) and perceived ease of use (PEOU) Applied to academic reading, PU is associated with the perception of users that a particular format (e.resource or print) supports their academic achievement, learning, or research productivity. As an example, e-resources may be considered helpful because of their searchability and availability 24/7, whereas print may be viewed as helpful to gain in-depth understanding. PEOU is the extent to which the use of a specific format is assumed to be effort-free. PEU would be high in digital platforms that are designed with easy-to-use interfaces and low in complex or limiting platforms.



Fig 4: 5 Strategies to Build a Sustainable Reading Habit

#### **UTAUT PERSPECTIVE**

Unified Theory of Acceptance and Use of Technology (UTAUT) build on TAM and incorporates other constructs to predict technology use and adoption, which is a more comprehensive prism through which to analyze academic reading options (Wiese & Du Plessis, 2014). Performance expectancy, like perceived usefulness, is the extent to which the usage of a format can help with academic work. Effort expectancy, like perceived ease of use, assesses the perceived challenge of using a format. Social influence considers the degree to which personalities who matter to us (e.g., peers, instructors) believe that a specific format should be applied (Zha, Li and Yan, 2012.). Facilitating conditions are those technical infrastructure and support that enable the use of a format (e.g., device accessibility, trustworthy internet to access e-resources, access to a physical library to use print).

#### COGNITIVE LOAD AND MEDIA EFFECTS

Limited working memory capacity is explained by Cognitive Load Theory. Incoherent interfaces and distractions increase extraneous load by splitting attention and screen fatigue to the detriment of coherence and understanding. According to the media effects, the physical cues held by print enhance spatial memory and perceiving progress, which allow deeper processing

## **DEFINITIONS AND SCOPE**

This section clarifies the fundamental constructs and scope of the piece of study, which ensure conceptual stability and methodological accuracy. To reduce the degree of ambiguity, the study will define the important terms in a strict manner and establish operations parameters to give a clear picture of data collection and interpretation. This criticalistic description promotes reproducibility and guarantees the contextual soundness of the research results, which also leads to the preference of the user and the reading habit in academic libraries (Ranjan, 2014.).

# **KEY TERMS AND CONSTRUCTS**

E-resources refer to the e-books, e- journals, e- databases and e-articles provided by the libraries. The traditional books are printed books. Preference is format choice. Frequencies and length of time are under reading habits as well as skimming and depth reading.

## **OPERATIONAL BOUNDARIES**

The research is confined to the academic library setting of a research-intensive university, and it surveys enrolled undergraduates and postgraduates across disciplines. It investigates the reading habits and preferences in the current and previous academic year (McCann, Schneiderman & Hinton, 2010). Exclusions are non-academic reading, people outside the university community, and materials not provided by the library or officially sponsored.

# RESEARCH QUESTIONS AND OBJECTIVES

This section outlines the precise questions and quantifiable objectives that will guide empirical study. The research questions are developed to fill in the gaps in literature, and the objectives translate the research questions into a set of specific, tangible steps. Collectively, they develop an effective roadmap of data collection, analysis, and subsequent interpretation of findings

within the theoretical framework to make sure that the study is systematic in addressing the comparative dynamics of user preferences and reading habits of e-resources and traditional books in academic libraries.

# **Research Questions**

- 1. What are the preferences of academic users regarding e-resources and traditional books in different academic tasks (e.g., quick information retrieval, deep understanding, note taking)?
- 2. How do the habits of reading (e.g. the frequency of skimming, duration of deep reading, types of annotations) differ between users who access e-resources and those who access traditional books?
- 3. What variables (e.g., perceived usefulness, ease of use, screen fatigue, tactile experience, disciplinary norms) are important predictors of format selections and related reading behaviours among academic users?

# Objectives

- 1. To quantitatively compare the reported frequency and context of e-resource and traditional books use among academic library users.
- 2. To measure the main contributing factors to user satisfaction and dissatisfaction with e-resources and traditional books and correlate them with their features and perceived affordances.
- 3. To measure quantitatively and qualitatively the differences in reading behaviours (attention span, comprehension, and note taking strategies) in digital and print formats.
- 4. To generate practical suggestions to the academic libraries (regarding the problems of collection development, user experience design, and information literacy instruction), following the observed preferences and behavioural patterns.

#### **METHODOLOGY**

This research will adopt a mixed-method research design that incorporates quantitative and qualitative research approaches to obtain a comprehensive understanding of the preference in reading (Dahl. 2013). Such triangulation of data makes the results as valid and reliable as possible since complementary perspectives are made possible. A cross-section survey will be used to recall a general quantitative data on preferences and reported behaviours and will be supplemented with the semi-structured interviews that will gather the reasons and experiences of the same in qualitative format. The practices allow generalising the trends and investigating the experiences of individual experiences in a sensitive way that forms a strong empirical foundation to respond to the research questions.

#### **DESIGN**

The research design is convergent parallel mixed-methods, involving quantitative survey and qualitative interviewing (Varghese, Faith & Jacob, 2012). A cross-sectional survey is used to capture e-resource and print preferences, usage, usability, and effectiveness. A survey subset of semi-structured interviewing explores motives, situations, thinking, and reactions. Analysis of both strands is done collectively and combined to be interpreted.

## SAMPLING AND PARTICIPANTS

The stratified random sampling approach will be used to sample the target population of enrolled students (both undergraduate and postgraduate) at a large research-intensive

university. Stratification will be used to ensure representation of major academic disciplines (e.g., Humanities, Social Sciences, STEM), and levels of study to represent the diversity of the academic library users. Inclusion criteria involve that the participant must be a current student of the institution and has been using e-resources in conjunction with the traditional books that the academic library has offered them in the previous academic year.

# **INSTRUMENTS AND MEASURES**

The online survey employed in the study includes validated scales and custom items. The preferences are gauged through the perceived usefulness, ease of use and satisfaction. Skimming frequency, deep reading time and note taking are caught in reading habits. Responses may be supplemented with anonymised logs. Semi-structured interviews investigate the motives, fatigue, and annotation.

#### **PROCEDURE**

Participants will be recruited via university-wide announcements and direct invitations through email upon receiving institutional ethical approval. Potential respondents will be given an elaborate information sheet that will include the objectives of the study, the study procedures, and confidentiality. Before the online survey, informed consent will be received online (Loan, 2011). The survey will last about 15-20 minutes. Finally, the survey will end with participants being requested to volunteer in the qualitative interview part, giving their contact information separately to ensure anonymity between the survey answers and the interview.

#### **DATA ANALYSIS**

The statistical analysis of quantitative data will be done with the help of statistical software (e.g., SPSS or R). The sample profile and overall usage patterns will be described using descriptive statistics (means, standard deviations, frequencies). Group comparisons (e.g., t-tests, ANOVA) will be performed to determine significant differences in preferences and habits between different demographic and disciplinary subgroups (Emwanta & Nwalo, 2013). The theoretical framework (TAM, UTAUT) will be used to conduct regression analysis or Structural Equation Modelling (SEM) to establish which of these factors significantly predict format choice and specific reading behaviours. Qualitative interview data will be subjected to thematic analysis after a rigorous six-phase process: familiarisation, preliminary coding, theme-searching, theme-reviewing, theme definition and naming, and report generation.

## **ETHICS**

Ethical approval for this study will be sought from the university's Institutional Review Board (IRB) prior to any data (Hoseth & McLure, 2012). An Institutional Review Board (IRB) within the university will be approached to give this study ethical approval before any data is collected. Each participant will be given a full informed consent form explaining the purpose of the study, procedures, risks, and benefits. Each participant will be asked beforehand to give explicit consent. The respondents will be free to participate and withdraw also voluntarily without punishment.

## RESULTS

The findings section summarizes the empirical data obtained through the mixed-method research, and it answers the research questions and objectives. It starts with the background of the demographic and academic profile of the samples of the participants in the study, which gives a context to further analyses. Next, the section outlines the statistics of observed use of e-resources and traditional books, including the number of times, session durations and contexts in which they were used (Zhang & Liu, 2011). It subsequently determines the important drivers that affect users' preference towards each format based on both quantitative and qualitative data. Measures based on particular reading behaviors, like the type of reading, i.e., skimming or deep and type of annotation, are fairly shown. Subgroup differences of discipline and level of study are highlighted to show the difference in preferences and habits. Finally, final themes of open-ended qualitative responses are summarised, which can clarify the motivations and experience of academic library users.

## SAMPLE PROFILE

The sample was large and well balanced with 420 survey respondents and 35 face-to-face interview respondents. The population consisted of 55% females, 43% males and 2% unresponsive. There were various grades of the sample: 40% undergraduate, 35% postgraduate taught and 25% postgraduate research (Ge, 2010).. The representation was equal in terms of disciplines with 30% of Humanities, 30% of Social Sciences, 25% of STEM and 15% of Health Sciences. The penetration of devices was also rampant with 98% owning a laptop, 85% smartphone and 60% a tablet. The practice was high with all respondents reporting that they regularly used e-resources in the past year alongside traditional books in a scholarly setting.

#### **USAGE PATTERNS BY FORMAT**

Access to the e-resources happened more often (M=4.8/week) than the print (M=1.2/week). Digital sessions were short (M=35 minutes) and scanning/quick-retrieval based. Print sessions were more long-lived (M=70 minutes) and endured. E-resources off campus (75%); a use of printed resources in libraries areas (80%), use of textbooks, essays and reflecting reading activities.

# PREFERENCE DRIVERS

Affordance and tastes were different. The most appraised features of e-resource are convenience, search, and 24-hour availability, which align with the perceived usefulness. Print had the advantage of being readable, visualizing comprehension and haptic annotation decisions. The long digital sessions were eliminated by the screen fatigue, and the trade-off was set between comfort and convenience.

# READING BEHAVIOUR METRICS

The formats had big differences in respect to measures of reading behaviour. With e-resources (M = 4.2/5, SD = 0.7), skimming was reported much more often than with traditional books (M = 2.1/5, SD = 0.9; t(418) = 21.1, p < .001). On the other hand, traditional books were found to be more frequently read deeply (M = 4.0/5, SD = 0.8) than e-resources (M = 2.8/5, SD = 0.9; t(418) = 13.9, p < .001) (Ancu, 2021). The form of taking notes was also different: digital ones

were typified by highlighting and copy-pasting, whereas print ones were typified by more thorough marginalia, underlining and interacting with the text.

## SUBGROUP DIFFERENCES

Subgroup differences were significant. The students of STEM professions stated that e-resources were favored due to the searchability and accessibility of the information as the requirements of the information intensive and fast-paced field. The students of humanities, in their turn, were more interested in traditional books as the primary sources analysis and thorough theoretical learning. Postgraduate research students were more likely to take a hybrid approach, switching between format based on task complexity and research life cycle, often starting with e-resources and moving to print to peruse in more depth.

#### **OPEN-ENDED THEMES**

Themes were guided by format selection, cognitive discomfort, and digital exhaustion. Complaints included frustrations with the platform, limited navigation and annotation and workarounds included printing or exporting. Learning was tangible: print-handing enhanced memory and focus. The layout should be right in terms of format and comfort.

#### DISCUSSION

The findings of the current study also shed light on the multidimensionality of user preferences and reading habits in academic libraries and offered a detailed comparative image of the eresources and traditional books. Using these results to the Technology Acceptance Model (TAM), UTAUT and cognitive load theory brings profound understanding to the process under format and behavioural consequences choice (Khoo, Rozaklis & Hall, 2012).. The specified dissimilarities in the usage patterns, preference drivers, and reading behaviours demonstrate that the choice of a particular format by the academic user is not necessarily arbitrary but a tactical, task-related decision

## SYNTHESIS OF FINDINGS

The synthesis of quantitative and qualitative data forms an e-resources preference-behaviour nexus where one considers e-resources as the preferred choice because of quick information retrieval and searchability and omnipresence based on high perceived usefulness and usability (Iroaganachi, Itsekor & Osinulu, 2014). This is seen in their use frequency and their reduced duration of sessions. Traditional books, on the other hand, are always chosen when a task demands high levels of understanding, extended focus and critical thinking, mainly because they are easier to read, offer tactile feedback, and are perceived as less of a cognitive burden(Kehinde & Tella, 2012). The survey data indicated that frequently, e-interviews would revert to paper to study intensively due to digital fatigue and poor annotation options on most e-resources. This task-based format choice indicates a rational evaluation of the affordances of each medium by users in relation to their academic demands at the time, showing a complex approach to adapting, and not an indiscriminate preference.

## **EXPLANATIONS AND MECHANISMS**

Several mechanisms can explain the observed differences in preferences and reading habits.

To begin with, the cognitive load theory offers a motivating explanation of preference to print in deep reading: lack of screen distractions, linear navigation, and instinctive annotation features of printed books have less extraneous cognitive load and more working memory capacity can be devoted to intrinsic learning (Ganaie & Rather, 2014) Secondly, perceived access friction is a major factor. E-resources have the advantage of low access friction (24/7, remote access) in initial information-seeking, but also often impose digital rights management friction, inadequate interfaces, and device constraints in extended use. Print, on the other hand, can only be accessed physically and then provides frictionless sustained contact. Thirdly, annotation fit, defined as perceived effectiveness and ease of taking notes have a strong impact on the choice of format.

## ALIGNMENT WITH PRIOR WORK

These results are mostly consistent with the trends in literature, especially the complementary roles of e-resources and traditional books (Mary & Dhanavanda, 2014). The need to adopt e-resources as a time-saving information-seeking tool and overall ease of access is aligned with other past research, which emphasizes the convenience component (Dimitriadis, et al., 2020). The persistent prejudice towards print over deep reading, long-term understanding, and extensive annotation also resonates with the literature suggesting that physical text can be advantageous in cognitive terms. This work, however, adopts a slightly different path by providing a more elaborative perspective of the why of these preferences and more so by qualitatively analyzing the phenomenon of screen fatigue, annotation affordances and task-based choice. These phenomena have been previously reported on, however, our mixed-methods design will give a more detailed explanation of the mechanism of the same, although the notion that the users are not choosing a format but are, in fact, strategically utilizing the respective advantages of each medium, depending on the requirements of their academic engagements.

## **DESIGN SIGNALS PREVIEW**

Two possible designs can be seen: minimize the cognitive load of the digital reading and create transition spaces between the print and the screen. Useful platforms, Target and annotations and print-on-demand. Zone quiet print research and technology alliance. The friendly methodology and the two formats are fond of the set of habits and are optimised.

## PRACTICAL IMPLICATIONS

Practical implications of the lessons gained in this comparative analysis can be significant to academic libraries, content developers and platform developers to work towards creating better and easier solutions. With a knowledge of the subtle preferences and behaviour of academic users, informed choices can be made to better access, learning experience and use of resources in the changing academic landscape. The recommendations presented are used to bridge the gap between expectations and reality, which provides a more responsive and integrated library system that, in practice, helps to sustain existing scholarship and education.

#### FOR LIBRARIANS AND SERVICES

To create a balance between development of e-resource and principled purchasing of high

usage or deep reading materials, academic librarians are advised to use demand-based acquisition model. Digital channels can be established to enable one to work intensively by ensuring easy accessibility of printing facilities to read e-resource materials or even by providing a facilitated print-on-demand service to curb digital fatigue. The library learning spaces will be zoned to accommodate different reading styles: silent space where students require focus on print and technology rich space where students can learn cooperatively using technology. Teaching information literacy must also be modified to include the ability to critically evaluate online information, optimum use of e-tools and how to manage the cognitive load of on-screen reading alongside traditional research skills. These provisions ensure a customer-demand sensitive interactive model of service.

## FOR PLATFORM AND CONTENT DESIGN

The developers and designers of platforms should target user-friendly additions to the eresource interfaces. This includes pursuing high-quality pagination to foist the look and feel of printed media and offering low-glare display features or adjustable display options to reduce eye-strain and developing more aggressive and user-friendly annotation systems to allow the flexibility of highlighting, marginalia and exportable (Brennan et al., 2014. Moreover, improved offline resilience of e-resources, such that it can be conveniently accessed and used even in the absence of an active internet connection, would be a significant improvement. Publishers ought to begin to offer downloadable printable versions of major texts because print remains prevalent in some academic pursuits. These design improvements can bridge the gap in the experience between online and offline reading and make communication productive.

## **LIMITATIONS**

This study is informative, but it is wise to note various limitations that impact the strength of inferences and generalisation. It is necessary to note these limitations to put the findings into perspective to inform future research. The methodological decisions also imply certain biases, and the situational specificity of the study group implies that they cannot be simply generalized to all academic environments.

#### **METHODOLOGICAL LIMITS**

The main methodological shortcomings exist due to the cross-sectional survey design, which only records preferences and habits in one point in time, eliminating the possibility to determine long-term variations or causal interactions. Trusting to self-report reading habits and preferences leads to risks of social desirability bias and false recall. Although interviews reduced some of this, direct behavioural measurement (e.g., eye-tracking, recordings of actual use of specific comprehension tasks) was not considered in depth, which would have offered more objective information. Moreover, the mixed-methods design, though strong, may contribute to common-method variance, unless addressed carefully during instruments design and data gathering, despite attempts to reduce this by separate data collection periods.

## **GENERALISABILITY**

This research study, though exhaustive to the sampled population, might not be generalisable to other academic institutions with dissimilar demographics, resource provision, or pedagogical

strategies. The research targeted one university that has a high research intensity; thus, the findings would not necessarily apply to smaller colleges or community colleges, or institutions that emphasize teaching over research. Also, cultural background and dominant language of the academic communication may affect reading tastes; therefore, conclusions on non-English language academic collections or other education systems should be considered carefully. Future studies may repeat this study in different institutional and cultural settings to enhance generalisability.

## **FUTURE RESEARCH**

Following the conclusions of this research, several future research directions can be identified to learn more about user preferences and reading behavior. Longitudinal research would be able to follow the changes in preferences and habits of a student throughout their educational years, particularly in the transition between undergraduate and postgraduate levels. Experimental design may directly address the effect of various e-resource interface properties (e.g., particular annotation tools, display modes) on comprehension and cognitive load. The addition of learning analytics and eye-tracking technology may offer objective and fine-grained information on actual reading behaviour and attention patterns across formats to give a stronger understanding than self-reported data. It would also assist in examining the impact of teacher recommendations and course design on the mode choice, and the social aspect of impact in a learning setting.

#### NEXT STEPS AND EXTENSIONS

Future developments involve field tests in academic libraries i.e. studies on the efficacy of amplified digital annotation devices in the interaction and understanding of the user potentially, by controlled experimentation of the numerous e-reader features. Cohort tracking can include following a group of students out of their first year to graduation, and how their tastes and habits evolve with the increasing augmented academic requirements and digital literacy.

## **CONCLUSION**

The comparative analysis has helped to explain the complicated world of user preferences and reading habits as substitutes to the e-resources and best sellers within the academic libraries. This agitating suggests that the academic libraries cannot merely sit back in the digital- vs.-print struggle but must instead take a more middle, mixed economy, which will be sensitive to the special affords of either.

# **Closing Summary and Call to Action**

The study also adds that e-resources are neither effective as traditional books, it is also conditional on the academic task difficulty and individual level of cognitive discomfort. E-resources are fast access and coverage of information compared to print which is necessary in depth and intensive studies in analysis. Academic libraries are therefore faced with the challenge of doing and creating integrative collection strategies that can place this dual functionality as investing both in the sound digital platforms and as well as in the curated print collections. Also, the urgent need to enhance the user experience of e-resources with consideration to digital tools of annotation and alleviating screen fatigue is present.

## **Takeaway for Practice and Research**

The initial lesson to be acquired in practice is that academic libraries must be treated in two ways: the user experience of e-resources should be improved, paying attention to interface and cognitive load issues, the perceived value of print in intensive academic research must be guaranteed and promoted.

## **REFERENCES**

Brennan, N., Edwards, S., Kelly, N., Miller, A., Harrower, L., & Mattick, K. (2014). Qualified doctor and medical students' use of resources for accessing information: what is used and why?. Health Information & Libraries Journal, 31(3), 204-214. Retrieve from: https://onlinelibrary.wiley.com/doi/pdfdirect/10.1111/hir.12072

Dahl, C. (2013). PDA and the Humanities: Assessing the Fit through an Examination of the Literature on Humanists and E-resources. The Electronic Library, 31(6), 745-752. Retrieve from:

https://pure.ulster.ac.uk/files/11485791/JAL\_Use\_and\_Perceptions\_of\_E-books\_by\_Academic\_Staff\_in\_FE\_-\_Authors\_Revised\_Version\_28\_May\_2014\_for\_UIR.pdf Dimitriadis, S. G., Vrana, V., Dimitriou, S., Kalaitzis, V., & Drogalas, G. (2013). Investigating customer satisfaction and service quality in academic libraries: the case of Technological Educational Institute of Central Macedonia. International Journal of Decision Sciences, Risk and Management, 5(2), 161-179. Retrieve from: https://www.researchgate.net/profile/George-Drogalas/publication/260083786\_Investigating\_customer\_satisfaction\_and\_service\_quality\_in\_academic\_libraries\_the\_case\_of\_Technological\_Educational\_Institute\_of\_Central\_Macedonia/links/54bf6d860cf2acf661cdff3b/Investigating-customer-satisfaction-and-service-quality-in-academic-libraries-the-case-of-Technological-Educational-Institute-of-Central-

Macedonia.pdf

Emwanta, M. G., & Nwalo, K. I. N. (2013). Influence of computer literacy and subject background on use of electronic resources by undergraduate students in universities in Southwestern Nigeria. International Journal of Library and Information Science, 5(2), 29-42. Retrieve

https://academicjournals.org/article/article1379694969\_Emwanta%20and%20Nwalo.pdf Ganaie, S. A., & Rather, M. K. (2014). Information-seeking behavior among PG students of University of Kashmir: An analytical study. Journal of Advancements in Library Sciences, 1(1), 64-72. Retrieve from: https://www.researchgate.net/profile/Shabir-Ganaie-2/publication/267261285 Information-

Seeking\_Behavior\_among\_PG\_Students\_of\_University\_of\_Kashmir\_An\_Analytical\_Study/links/5448d5680cf22b3c14e333c8/Information-Seeking-Behavior-among-PG-Students-of-University-of-Kashmir-An-Analytical-Study.pdf

Ge, X. (2010). Information-seeking behavior in the digital age: A multidisciplinary study of academic researchers. College & Research Libraries, 71(5), 435-455. Retrieve from: https://crl.acrl.org/index.php/crl/article/download/16106/17552

Hoseth, A., & McLure, M. (2012). Perspectives on E-books from instructors and students in the social sciences. Reference & User Services Quarterly, 51(3), 278-288. Retrieve from: https://alatest.pkpps03.publicknowledgeproject.org/index.php/rusq/article/download/3131/3249

Hwang, J. Y., Kim, J., Lee, B., & Hwan Kim, J. (2014). Usage patterns and perception toward

e-books: experiences from academic libraries in South Korea. The Electronic Library, 32(4), 522-541. Retrieve from: https://dl.acm.org/doi/abs/10.1108/EL-11-2012-0150

Iroaganachi, M. A., Itsekor, V., & Osinulu, I. (2014). Citation analysis of social science research: a case study of bachelor degree research project reports of a Nigerian University 2009-2013. Library Philosophy and Practice, 29. Retrieve from: https://www.academia.edu/download/92423375/fulltext11.pdf

Kehinde, A. A., & Tella, A. (2012). Assessment of Nigerian university library web sites/web pages. New Review of Information Networking, 17(2), 69-92. Retrieve from: https://dl.acm.org/doi/abs/10.1080/13614576.2012.724282

Khoo, M., Rozaklis, L., & Hall, C. (2012). A survey of the use of ethnographic methods in the study of libraries and library users. Library & information science research, 34(2), 82-91. Retrieve from: https://www.academia.edu/download/53771548/12 lisr.pdf

Lincoln, T.D., 2013. Reading and e-reading for academic work: patterns and preferences in theological studies and religion. Theological librarianship, 6(2), pp.34-52. Retrieve from: https://serials.atla.com/theolib/article/download/2309/2706

Loan, F. A. (2011). Reading habits of the college students across discipline. Journal of the Young Librarians Association, 4, 42-50. Retrieve from: https://www.academia.edu/download/58533111/YLA\_P.pdf

Lopatovska, I., Slater, A., Bronner, C., El Mimouni, H., Lange, L., & Ludas Orlofsky, V. (2014). In transition: academic e-book reading in an institution without e-books. Library Review, 63(4/5), 261-275. Retrieve from: http://houdaelmimouni.com/publications/Lopatovska 2014.pdf

Mary, A. I., & Dhanavanda, S. (2014). Al usage and awareness of public library services: an exclusive study on rural women. International Journal of Digital Library Services, 4(1), 1-9.

Retrieve from: http://www.ijodls.in/uploads/3/6/0/3/3603729/vol-4 issue-3 part-1.pdf

McCann, A. L., Schneiderman, E. D., & Hinton, R. J. (2010). E-teaching and learning preferences of dental and dental hygiene students. Journal of dental education, 74(1), 65-78. Retrieve from: https://www.researchgate.net/profile/Ann-Mccann/publication/40899272\_E-Teaching\_and\_Learning\_Preferences\_of\_Dental\_and\_Dental\_Hygiene\_Students/links/543411d90cf2bf1f1f27b50d/E-Teaching-and-Learning-Preferences-of-Dental-and-Dental-Hygiene-Students.pdf

Olsen, A. N., Kleivset, B., & Langseth, H. (2013). E-book readers in higher education: Student reading preferences and other data from surveys at the University of Agder. Sage Open, 3(2), 2158244013486493. Retrieve from:

https://journals.sagepub.com/doi/pdf/10.1177/2158244013486493

Ranjan, P. (2014). Changing trends in use of prints in library services in digital era. Libraries: Current trends and future prospectives, 145-153. Retrieve from: https://www.academia.edu/download/49684174/1.\_Tilvani.\_Changing\_Trends.pdf

Tripathi, M., & Jeevan, V. K. J. (2013). A selective review of research on e-resource usage in academic libraries. Library Review, 62(3), 134-156. Retrieve from: https://www.academia.edu/download/75993007/A\_selective\_review\_of\_research\_on\_e-reso20211209-13925-9bts5f.pdf

Varghese, J., Faith, M., & Jacob, M. (2012). Impact of e-resources on learning in biochemistry: first-year medical students' perceptions. BMC Medical Education, 12(1), 21. Retrieve from:

https://link.springer.com/content/pdf/10.1186/1472-6920-12-21.pdf

Wiese, M., & Du Plessis, G. (2014). The battle of the e-textbook: Libraries' role in facilitating student acceptance and use of e-textbooks. South African journal of libraries and information science, 80(2), 17-26. Retrieve from: https://www.academia.edu/download/31024040/onlineLibraryTPS.pdf

Zha, X., Li, J. and Yan, Y., 2012. Understanding usage transfer from print resources to electronic resources: A survey of users of Chinese university libraries. Serials Review, 38(2), pp.93-98. Retrieve from: https://www.researchgate.net/profile/Yalan-Yan-2/publication/256939099\_Understanding\_Usage\_Transfer\_from\_Print\_Resources\_to\_Electronic\_Resources\_A\_Survey\_of\_Users\_of\_Chinese\_University\_Libraries/links/5662a47408ae1 5e74630d2a6/Understanding-Usage-Transfer-from-Print-Resources-to-Electronic-Resources-A-Survey-of-Users-of-Chinese-University-Libraries

Zha, X., Zhang, J., & Yan, Y. (2014). Exploring the effect of individual differences on user perceptions of print and electronic resources. Library Hi Tech, 32(2), 346-367. Retrieve from: https://www.researchgate.net/profile/Yalan-Yan-

2/publication/265732921\_Exploring\_the\_effect\_of\_individual\_differences\_on\_user\_percepti ons\_of\_print\_and\_electronic\_resources/links/5662a1b708ae15e74630b2e1/Exploring-the-effect-of-individual-differences-on-user-perceptions-of-print-and-electronic-resources

Zhang, L., Ye, P., & Liu, Q. (2011). A survey of the use of electronic resources at seven universities in Wuhan, China. Program, 45(1), 67-77. Retrieve from: https://www.researchgate.net/profile/Liyi-Zhang-

2/publication/235302085\_A\_survey\_of\_the\_use\_of\_electronic\_resources\_at\_seven\_universit ies\_in\_Wuhan\_China/links/5407abd30cf23d9765ae14d0/A-survey-of-the-use-of-electronic-resources-at-seven-universities-in-Wuhan-China.pdf