

Effectiveness of Soul Software in Enhancing Library Automation and User Services in Academic Libraries Affiliated to Dr. Babasaheb Ambedkar Marathwada University, Aurangabad

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ABSTRACT

This study examines the effectiveness of SOUL software in enhancing library automation and user services in academic libraries affiliated to Dr. Babasaheb Ambedkar Marathwada University, Aurangabad. The study is based on responses from 73 college librarians out of 107 questionnaires distributed. Findings show that SOUL supports a wide range of services, particularly circulation, reference and information services, internet searching, OPAC, user orientation and N-LIST resources. Most respondents expressed satisfaction with SOUL and identified user-friendliness as an important feature. However, respondents also emphasised the need for software improvement and further training. Overall, SOUL has contributed to improved information retrieval, operational efficiency and quality of library services.

KEYWORDS: SOUL Software; Library Automation; User Services; Academic Libraries; User Satisfaction; INFLIBNET

1. INTRODUCTION

Academic libraries are set up to assist with the information needs of faculty, students, and researchers. Not only does the quantity of their collections matter for their efficacy, but so does their ability to manage resources and deliver fitting services to consumers. The demand for information management systems that can make library collections faster and more accessible has grown in tandem with the proliferation of print and digital information resources.

Numerous mundane tasks and user services have been transformed by library automation. Automation, according to the thesis, improves service quality in a number of ways, including efficiency, consistency, accuracy, quality of

Effectiveness of Soul Software in Enhancing Library Automation and User Services in Academic Libraries Affiliated to Dr. Babasaheb Ambedkar Marathwada University, Aurangabad

customer service, cost savings, and employee development. This system streamlines common operations, makes information more precise, speeds up service delivery, and gives library staff more opportunities to learn and grow in their roles.

One integrated library management system that the INFLIBNET Center created is Software for University Libraries (SOUL). According to the thesis, academic libraries can gain a hand with cataloguing, acquisition, circulation, serial control, and OPAC-related tasks with the help of SOUL. Enhanced information accessibility, speedy resource retrieval, and web access are further benefits of its use. Library workers will have more time to focus on patron needs including reference assistance, training, and course completion if mundane tasks are automated.

This SOUL Online Public Access Catalogue is a crucial part of the project. Using data such as class number, series name, accession number, author, title, corporate body, subject headings, keywords, and basic and advanced search capabilities, the OPAC offers access to over one million books. Not only that, you may download records in various formats and use the system's simple search or advanced Boolean search capability.

As a result, a more holistic view of service is necessary to evaluate SOUL's efficacy. Although a software package can automate transactions, its usefulness in an academic library is contingent upon its ability to simplify information retrieval, provide new or better services, be perceived as user-friendly, meet the needs of library professionals, and be efficiently utilised by trained staff.

Goals of training and enhancement of library services, user-friendliness, user perspectives, issues encountered by librarians and users, and so on were highlighted in the initial thesis. In addition, the hypothesis was put up that automation in libraries offers new services to both staff and staff members.

And so, the service-effectiveness aspect of the thesis is the focal point of this work. This study assesses the evidence on service enhancement, satisfaction, user-friendliness, training, and improvement of SOUL, in contrast to the first article that addressed the status and operational use of SOUL-based automation.

OBJECTIVES OF THE STUDY

- ✓ To examine the effectiveness of SOUL software in enhancing library and information services in the selected academic libraries.
- ✓ To study the range of user services facilitated through library automation.
- ✓ To assess respondents' satisfaction, user-friendliness, and the need for improvement in SOUL software.

2. LITERATURE REVIEW

Patil and Sutar (2017) studied the computerization of college libraries affiliated to Dr. Babasaheb Ambedkar University, Aurangabad and highlighted the growing importance of technology in the management of academic library resources and services. Their study indicated that computerization had enabled libraries to maintain records in a more systematic manner, organize bibliographic information and carry out routine activities with greater efficiency. The application of computer technology had also supported quicker handling of information and had created better conditions for providing timely services to users. However, the extent of computerization had differed from one institution to another because of variations in infrastructure, technological facilities and institutional capacity. The study was particularly relevant because it provided a local perspective on the technological

development of affiliated college libraries in the Aurangabad region. It established a useful foundation for examining how subsequent adoption of integrated library management systems such as SOUL had influenced the efficiency and quality of library services.

Sonone (2023) examined the use of Library Management Systems (LMS) in library automation and explained their contribution to the transformation of traditional manual operations into integrated computerized processes. The study indicated that automation had improved the management of bibliographic records, circulation activities, resource searching and information retrieval. It had also reduced the dependence of library professionals on repetitive manual procedures, thereby improving the speed and consistency of routine services. Computerized searching had made it easier to identify and retrieve required resources, while automated circulation had simplified issue, return and renewal activities. The study further emphasized that the benefits of automation had depended on the effective application of technology rather than merely on the availability of software. Thus, the work demonstrated that library management systems had played an important role in improving both internal operational efficiency and the delivery of services to library users.

Ghumre (2013) investigated college library services in the Marathwada region with particular reference to the impact of NAAC accreditation. The study established that quality assessment and accreditation had encouraged academic institutions to give greater attention to the development of their libraries, including improvements in infrastructure, information resources and service facilities. College libraries had increasingly been expected to provide organized and accessible information services that could effectively support teaching, learning and other academic activities. The study also indicated that modernization had become an important aspect of improving the overall quality of college library services. Greater attention had been given to the accessibility of information and to meeting the changing academic requirements of students and teachers. In this context, technological development had emerged as an important means of strengthening library services. The study provided a useful regional background for understanding how quality expectations had encouraged academic libraries in Marathwada to adopt more systematic and technology-supported service practices.

Yakkaldevi and Ghante (2014) examined library automation as an important mechanism for modernizing traditional library practices. Their work indicated that computerized systems had facilitated the systematic organization, storage and retrieval of library information and had improved the management of routine services. Automation had enabled libraries to handle increasing volumes of records and transactions more efficiently while reducing dependence on time-consuming manual procedures. The authors also emphasized the importance of automation in improving access to information, as computerized records could facilitate faster identification and retrieval of required library materials. Such technological developments had enabled libraries to respond more efficiently to users' information requirements and had contributed to the development of more organized and accessible library services. Their work therefore supported the view that automation should be evaluated not only as a technological change but also in terms of its contribution to the overall efficiency and accessibility of library services.

Effectiveness of Soul Software in Enhancing Library Automation and User Services in Academic Libraries Affiliated to Dr. Babasaheb Ambedkar Marathwada University, Aurangabad

Patil (2020) assessed the effective utilization of information technology in university libraries and examined its contribution to improving library management and service delivery. The study indicated that the adoption of information technology had made it possible to process information more rapidly, organize resources systematically and provide easier access to library information. Technology had also supported library professionals in maintaining records, retrieving required information and managing different service activities more efficiently. The study further pointed out that the effective use of information technology had helped university libraries respond to the changing information requirements of students, teachers and researchers. As academic users increasingly required faster and more convenient access to information, technology had become an important means of improving the responsiveness of library services. The study therefore emphasized that the effectiveness of information technology in university libraries had depended on its practical contribution to information accessibility, operational efficiency and the quality of services delivered to users.

3. RESEARCH METHODOLOGY

This study's methodology details the steps taken to systematically evaluate SOUL's usefulness and impact on library services. This article maintains the format, scope, respondents, data-collection tool, and analytical processes of the original dissertation.

3.1 RESEARCH DESIGN

The initial study used a descriptive research strategy based on survey methodology. Information from librarians was gathered via a questionnaire. Visits, phone calls, emails, and Google Forms were also used to gather data for the study. We used SPSS 20 and Excel to evaluate the responses, and we used chi-square tests to test our hypotheses.

3.2 STUDY AREA AND RESPONDENTS

The library resources of Dr. Babasaheb Ambedkar Marathwada University's Arts, Science, and Commerce colleges were the focus of the dissertation. The study's geographical scope included the following four districts: Aurangabad, Jalna, Beed, and Osmanabad.

One hundred and seven college librarians were sent questionnaires. The study was based on 73 replies in total. This study uses the same 73 replies as its empirical foundation.

3.3 RESEARCH INSTRUMENT

The poll covered a wide range of topics, including library services, SOUL software, user feedback, issues, training, and prospective development areas. The service component included circulation, reference and information services, publishing, reprographics, bibliographics, online research, translation, user orientation, software development, standard definition indexing (SDI), cataloguing services (CAS), N-LIST, Web OPAC, and Book Bank services.

3.4 DATA ANALYSIS

The results of the hypothesis tests, as well as the percentages and frequencies reported in the thesis, are utilised in this article. No new statistical measures, such as reliability coefficients, regression models, standard deviations, or mean scores, have been developed.

4. RESULTS AND ANALYSIS

The results and analysis showcase the key discoveries concerning the efficacy of the SOUL program and the library services offered by the chosen university institutions. Usability, contentment, service availability, software enhancement, and training needs are the primary areas of emphasis in the study.

4.1 USER-FRIENDLINESS AS A CHARACTERISTIC FOR SELECTION OF SOUL

The thesis polled libraries on what factors they consider most important when choosing SOUL software. Factors such as the software's affordability, ease of use, compatibility with future needs, Unicode support, services, and development by INFLIBNET were considered.

Table 1: Selected Characteristics for Choosing SOUL Software

Characteristic	Most Important	Average Important	Less Important
User-friendliness	49	19	5
Price/Affordable Cost	41	26	6
Enough for Future Requirements	39	28	6
Unicode Based	39	27	7
Services	38	25	10
Developed by UGC-INFLIBNET	38	27	8

The thesis table shows that user-friendliness is the most significant characteristic, with 49 responses in the "most important" category. After that, 41 people said it was affordable. In terms of importance, 39 people ranked compatibility with Unicode and future requirements as very important. This conclusion suggests that SOUL's ease of use was a major factor for librarians who adopted the program, which is crucial to the software's efficacy. Most college libraries chose SOUL due to its user-friendliness, as stated in the thesis conclusion.

4.2 SATISFACTION WITH SOUL SOFTWARE

The satisfaction of library employees and patrons with SOUL was also investigated in the thesis. Out of the 73 participants, 48 (or 66%) were satisfied, 9 (or 9%) were not, and 18 (or 25%) were on the fence about it.

Table 2: Satisfaction with SOUL Software

Response	Frequency	Percentage
Yes	48	66%
Maybe	18	25%
No	7	9%
Total	73	100%

Effectiveness of Soul Software in Enhancing Library Automation and User Services in Academic Libraries Affiliated to Dr. Babasaheb Ambedkar Marathwada University, Aurangabad

As a result, the majority of responders were positive about SOUL. One of the thesis's findings is that the majority of library employees and patrons were satisfied with SOUL.

An essential metric of effectiveness from a user's perspective is the satisfaction findings. They reveal that most people were happy with the results, but others were still unsure or unhappy. The significance of the latter discovery becomes clear when weighed against the data presented in the thesis regarding the necessity of software enhancement.

4.3 LIBRARY AND INFORMATION SERVICES AVAILABLE IN THE SELECTED LIBRARIES

The thesis collected detailed information about **17 services** available in the responding libraries.

Table 3: Library and Information Services Provided

Library Service	Yes	No
Circulation Service	73	0
Reference & Information Services	72	1
OPAC	67	6
Printing	58	15
Reprographic Services	54	19
Bibliographic Services	47	26
Newspaper Clipping Services	63	10
Inter-Library Loan Services	49	24
Indexing & Abstracting Services	31	42
Internet Search Facility	69	4
Translation Service	25	48
User Orientation/Education Programme	61	12
Selective Dissemination of Information	36	37
Current Awareness Services (CAS)	54	19
N-LIST Resources	61	12
Web OPAC	50	23
Book Bank Service	48	25

All 73 libraries contributed to circulation, next came Reference and Information Services with 72, then OPAC with 69, Newspaper Clipping Services with 63, and User Orientation and N-LIST resources with 61 each. In addition, we offered translation services, indexing and abstracting, book banking, reprographics, printing, reprographics, CAS, Web OPAC, Inter-Library Loan, and bibliographic services.

4.4 CIRCULATION SERVICE

The survey found that circulation was the service that participants reported most frequently. Circulation Service was supplied to patrons and employees by library automation, according to all seventy-three respondents (100 percent).

According to the consensus, the academic libraries that the study examines have strong ties to circulation and automated service delivery. The thesis concludes that circulation—specifically issue and return—was the primary motivation for the installation of SOUL in numerous libraries.

4.5 REFERENCE AND INFORMATION SERVICES

Around seventy-two percent (or 99%) of the people who took part in the survey said they used reference and information services. Out of all the respondents, just one mentioned that these services were not offered.

According to the thesis, an overwhelming majority of respondents (99%) believe that library automation helps with reference and information services for both staff and users.

This discovery expands the impact of automation beyond mundane tasks, which is a major finding. The capacity of academic libraries to aid patrons in discovering and acquiring pertinent information is closely correlated to the quality of their reference and information services.

4.6 OPAC SERVICE

One of the most obvious ways that automated library systems make collections more accessible to users is through the online public access catalogue (OPC). According to the results of the survey, 67 people think that library automation offers an OPAC service, whereas just 6 people think the opposite.

Table 4: Availability of OPAC Service

Response	Frequency	Percentage
Yes	67	92%
No	6	8%
Total	73	100%

Thus, 92% of respondents reported OPAC Service.

The online public access catalogue (OPAC) at SOUL offers both basic and extensive search capabilities, letting users locate materials based on bibliographic characteristics including class number, accession number, author, title, subject, and keywords. Being able to search catalogue material electronically instead of relying solely on traditional manual access tools is a significant service-related effect of automation, which is why the assessed libraries had a high availability of OPAC.

4.7 INTERNET SEARCH FACILITY

Of the 73 libraries that were surveyed, 69 reported having an Internet search facility, while a mere 4 did not.

Due to the fact that information access is becoming more global, the ubiquitous nature of Internet searching is especially pertinent to modern academic libraries. This study's results demonstrate that, in addition to their traditional services, the libraries who participated in it offered patrons access to network-based information-search tools.

4.8 USER ORIENTATION AND EDUCATION PROGRAMME

It was found that 61 libraries offered user orientation and education programs, while 12 libraries did not.

Table 5: User Orientation/Education Programme Service

Response	Frequency	Percentage
Yes	61	84%
No	12	16%
Total	73	100%

Thesis findings show that 84% of people who took the survey think that automated library systems help with staff and patron education and orientation.

When working in an automated setting, user education takes on more significance since people need to learn how to use computerised information capabilities, such as electronic catalogue searches. A large number of libraries surveyed included user orientation as a key component of their service delivery, according to the study's high frequency reporting.

4.9 CURRENT AWARENESS SERVICE AND SELECTIVE DISSEMINATION OF INFORMATION

Only 19 libraries did not offer Current Awareness Services (CAS), whereas 54 reported providing them (74%). On the other hand, 36 libraries (49% of the total) reported providing Selective Dissemination of Information (SDI), whereas 37 did not.

The disparity between CAS and SDI suggests that more people received general current-awareness activities than personalised distribution services. Because they help patrons stay abreast of pertinent and newly accessible information, these services are especially valuable in academic libraries.

4.10 N-LIST E-RESOURCES SERVICES

There were 73 participants in the survey; 61 (or 84% of the total) said they offered N-LIST e-resource services, while 12 said they didn't.

4.11 WEB OPAC SERVICES

Web OPAC allows users to access catalogues from anywhere, not just in the OPAC environment that is accessible locally. According to the results reported in the thesis, half of the respondents said that library automation offers Web OPAC Service, while a quarter said the opposite.

Table 6: Availability of Web OPAC Service

Response	Frequency	Percentage
Yes	50	68%
No	23	32%
Total	73	100%

Thus, Web OPAC was available according to 68% of respondents. A large percentage of the replying institutions had already made the switch to web-based catalogue access, since the service was accessible in 50 libraries out of 100.

4.12 BOOK BANK SERVICE

Book Bank Service was reported by 48 libraries, while 25 did not provide it.

Table 7: Availability of Book Bank Service

Response	Frequency	Percentage
Yes	48	66%
No	25	34%
Total	73	100%

The thesis reports that 66% of respondents indicated that library automation provides Book Bank Service to users and staff.

4.13 OTHER SERVICES SUPPORTING USERS

The thesis details a number of other library services in addition to the ones already mentioned. The following services were offered by various libraries: printing (58), reprographic (54), bibliographic (47), newspaper clipping (63), interlibrary loan (49), indexing and abstracting (31), and translation (25).

These findings show that the scope of the thesis's service environment extended beyond catalogue and circulation searching. A mix of conventional, technologically enhanced, and information-focused services were offered by the chosen academic libraries.

4.14 REQUIREMENT FOR IMPROVEMENT IN SOUL SOFTWARE

The fact that the program was effective does not mean that users thought it had no restrictions. Whether SOUL needed improving was a direct question posed in the thesis.

Table 8: Improvement Required in SOUL Software

Response	Observed Frequency	Percentage
Yes	51	70%
No	22	30%
Total	73	100%

In a survey of 73 participants, 51 said that SOUL needed improvement and 22 said it wasn't essential. The chi-square value, with degrees of freedom (df) = 1 and $p = .001$, is 11.521 according to the thesis. Thus, it accepted the second hypothesis, "Improvement is required in SOUL Software," and determined that the replies differed significantly.

This finding is significant for understanding efficacy. The thesis notes both successful service outcomes and the obvious need for additional software development at the same time. Instead of showing that no more development is necessary, effectiveness could be seen as an existing contribution to service delivery.

4.15 TRAINING REQUIRED FOR EFFECTIVE USE OF SOUL

Staff proficiency with software has a direct correlation to the quality of services that can be provided by it. Consequently, the thesis looked at the question of whether further training was necessary for SOUL module users to be effective.

Table 9: Training Required for Effective Usage of SOUL Modules

Response	Observed Frequency
Yes	61
No	12
Total	73

Out of the 73 people who took the survey, 61 said they needed training and 12 said they didn't. The results of the chi-square test, which are detailed in the thesis, were 32.890, with degrees of freedom (df) = 1 and $p < 0.01$.

This supported the thesis's third hypothesis, which stated that more training is necessary for effective utilisation of SOUL modules.

Implications for service efficacy are directly related to the training outcome. The practical knowledge of library workers is crucial for the proper deployment of SOUL, notwithstanding their extensive range of activities.

DISCUSSION OF MAJOR FINDINGS

According to the results, SOUL has improved library services in the Academic' libraries that were part in the research. The software's ease of use was a major factor in choosing SOUL, and 48 out of 73 users were satisfied with their experience. As for the breadth of services offered, every one of the 73 libraries had circulation desks, 72 offered reference and information services, 69 offered online research, and 67 offered online public access catalogues. A total of sixty-one libraries reported offering either N-LIST or User Orientation/Education services. So, the thesis concluded that library automation does, in fact, offer additional services to both patrons and employees. But 70% of people who took the survey thought SOUL could need some work, and 61 people said they needed more training. Despite the continued need for training, technical support, and software enhancements, the results demonstrate that SOUL has enhanced service quality, information retrieval, and employee efficiency.

CONCLUSION

This study found that the academic libraries associated with Dr. Babasaheb Ambedkar Marathwada University had greatly benefited from SOUL software in terms of automation and user services. The results demonstrate that SOUL is useful for many different types of services, including circulation (reported by all 73 libraries), reference and information services (reported by 72 libraries), online public access catalogue (OPAC) (reported by 67 libraries), and user orientation and education program (N-LIST) resources (reported by 61 libraries each). Bibliographic services, Web OPAC, Book Bank, SDI, Indexing and Abstracting Services, and Inter-Library Loan are among the other services offered. Additionally, the thesis acknowledges the idea that automation in libraries offers new services to both patrons and employees. The majority of respondents were satisfied with the program, and its user-friendliness was a key factor in their choice of SOUL. Concurrently, 51 respondents said SOUL needed some work, and 61 said training was necessary to make the most of it. Thesis findings indicate that SOUL has enhanced library services in several ways, including management of resources, retrieval of material, time savings, user happiness, and

reduction of human errors. The study recommends the following changes to make SOUL even more effective: yearly hands-on training for librarians and library staff by INFLIBNET; networking among colleges that use SOUL; improved Linux compatibility, spellchecking, and multilingual facilities; wider promotion of SOUL; more accessible report-generation facilities; and addition of SOUL to Library and Information Science curricula.

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