

University of Nebraska - Lincoln

DigitalCommons@University of Nebraska - Lincoln

Library Philosophy and Practice (e-journal)

Libraries at University of Nebraska-Lincoln

2-16-2023

Pilot testing for Feasibility of Role of Public Libraries in Citizenship Information

Vanita Khanchandani

Indian Institute of Technology, New Delhi, India, vanita@library.iitd.ac.in

Follow this and additional works at: <https://digitalcommons.unl.edu/libphilprac>



Part of the [Scholarly Communication Commons](#)

Khanchandani, Vanita, "Pilot testing for Feasibility of Role of Public Libraries in Citizenship Information" (2023). *Library Philosophy and Practice (e-journal)*. 7625.

<https://digitalcommons.unl.edu/libphilprac/7625>

Pilot testing for Feasibility of Role of Public Libraries in Citizenship Information

Vanita Khanchandani

Research Scholar, School of Social Science, IGNOU & Assistant Librarian (SS), Central Library, Indian Institute of Technology Delhi, Hauz Khas, New Delhi-110 016, India.

Email: vanita@library.iitd.ac.in ORCID: 0000-0003-1997-6540

Highlights

- The pilot helps in determining the feasibility of the study and helps in pre-testing the tool (questionnaire).
- Internal reliability was tested using Cronbach's Alpha.

Abstract

This paper outlines the significance of the pilot study in determining the feasibility of the main study, i.e., the role of the public libraries in citizenship information, and entails pre-testing the measuring tool (questionnaire). In the pilot study, 25 items were assessed on 27 subjects, and internal reliability was determined using *Cronbach's Alpha*. The Alpha was found to be 0.78, indicating acceptable consistency of the measuring tool. (questionnaire). This pilot study will be beneficial in determining how to administer the measuring instrument for conducting the actual study and will bring transparency to the research process. The study will embark on a new paradigm in reporting pilot studies, as the pilot study are usually under-discussed and less reported. The pilot study is the original work carried out and will pave the way for the researchers, particularly to library and information professionals, before undertaking any survey study.

Keywords: Public library; Citizenship Information; Pilot study; Feasibility study; Reliability; and Cronbach's Alpha.

Article type: Notes

1. Introduction

Pilot studies are outlined by Prescott and Soeken (1989) as "underdiscussed, underused, and underreported." The discourse of pilot studies is often less reported in Social Science Research. However, they are well-reported and widespread in Medical Sciences and are called *trail runs*. Reconnoitering literature on the pilot was not easy, and the above statement holds. Through the gleaning of literature, the term "pilot" is known by various names, *pilot test*, *feasibility study*, *trial*, *pre-testing study*, *small replica study*, *miniature study* etc.

Pilot studies are mainly undertaken for two reasons. As aptly said by the famous business magnate Warren Buffett, “*Never test the depth of a river with both feet,*” the first and foremost goal of pilot studies is to endeavor to know the feasibility or viability of any study. It is always better to conduct a small-scale replica study in order to avoid the dreadful consequences or risk of embarking on a complete study that could mar the entire research. These are also known as **Vanguard studies** (Thabane et al., 2010:1). Secondly, pilot studies are also undertaken to pre-test the efficacy of the measuring tool (van Teijlingen and Hundley 2001). Sometimes, pilot studies are undertaken for other reasons, such as developing interviewing skills, establishing data storage processes and reviewing analytic strategies (Morrison et al., 2016: 320).

Thabane et al. (2010) have debated that sometimes the emphasis is given to statistical significance instead of feasibility in the pilot. They have also provided suggestions on reporting the pilot using the *CONSORT* format. Malmqvist et al. (2019) emphasized that there is a dearth of research guidelines for conducting a pilot study in qualitative research. They have provided methodological insights to the researchers on conducting a pilot in qualitative research. In pilot studies, an essential issue to deliberate is *contamination*. ‘Contamination’ can arise in two ways; one where data from the pilot are included in the main study; the second where pilot participants are included in the main study (van Teijlingen & Hundley, 2001).

Fraser et al. (2018) said that pilots provide an opportunity to improve the research process as a precursor to the main investigation. The pilot improves the quality and efficiency of the main study (Junyong , 2017). Time constraints and the rush to get on with the main study are the reasons behind passing the pilot (Hassan et al., 2006).

2. Purpose of the study

With the growing need for citizen participation and digital governance in a democratic country like India, the role of public libraries can not be undermined. Public libraries play a crucial role in disseminating citizenship information. They serve as community centres and provide citizens with information on daily needs. Public libraries can play a vital role in enabling citizens to be well-informed by providing information literacy on the availability of information and access to information relevant to their needs (bridging the digital divide), providing a network of delivery sites for government programmes and services and preserving and proving access to the world’s cultural heritage, as outlined by UN Agenda 2030 (IFLA, Access and Opportunity for All: How Libraries Contribute to the United Nations 2030 Agenda, 2015).

Delhi, regarded as the National Capital Territory of Delhi, has a population of 16.8 million people as per the 2011 census (Census, 2011). Being the capital of India, it is the place of all policies and governance. There are numerous libraries in Delhi that serve the needs of the city's residents. These are academic libraries, government libraries, special and research libraries, but among these, the Delhi Public Library and its branch libraries fulfill the needs of residents of Delhi by providing citizenship information. To know the information needs and the seeking behaviour of citizens and the role of public libraries in providing the citizenship information, a study must be undertaken to investigate expressed and unexpressed needs for citizenship information of users of the Delhi Public Library and explore the preferred routes to satisfy such information needs.

But before embarking on a full-fledged study, a preliminary pilot study is being undertaken in one of the branches of the Delhi Public Library on a small sample to ascertain the viability and practicality of the main study. The pilot study will provide insight into the methodological way of conducting research and thereby help in achieving the *objectives, such as* increasing the possibility of the main survey being successful by figuring out the feasibility of participants' recruitment, evaluating the usability of the questionnaire, and establishing the reliability of the scores.

3. Theoretical background and Earlier Literature

The information needs are basic needs similar to other basic human needs. To satisfy the information needs, the user undergoes an information-seeking process. (Prasad 2012). Information seeking is linked to psychological characteristics, behavioral options, and environmental influences, according to Mahapatra and Panda (2001). He further described that libraries are designed as a system to fulfill the information needs.

Citizenship information is an area of great concern for public libraries, particularly for democratic citizenship in an electronic era. Marcella and Baxter (1999) defined citizenship information as "information produced by or about national and local government, government departments and public sector organizations which may be of value to the citizens either as part of everyday life or in the participation by the citizens in government and policy formation." Citizenship information, also called community information, helps the public participate actively in the democratic process. It helps in the governance of a nation.

India, being the largest democracy of the world, is governed by a government ‘of the people, for the people and by the people’ is remarkable as it empowers citizens to make the government accountable (Mehta & Narayan, 2018).

With the growing concept of e-governance and emphasis on ‘Minimum Government and Maximum Governance,’ there is an increased focus of the government on web and mobile-based information services to the citizens (Kachhal, 2018).

The hallmark of democracy is that the government is accountable to the citizens for all the policies and activities (Kachhal, 2018). But due to a lack of awareness regarding the availability of information and the lack of resources to access that available information, citizens are unable to participate effectively and efficiently in governance. In this regard, public libraries are exhibiting their role in identifying the expressed and unexpressed needs of the citizens, providing information literacy to the citizens regarding available resources, making them accessible through the internet, and also providing print resources. UNESCO’s Public Library Manifesto (1994) has highlighted the role of public libraries in enabling them to be well-informed and participate in governance (IFLA, 1994). IFLA’s draft on Access and Opportunity for All: How Libraries can contribute to the United Nations 2030 Agenda, has identified the key roles to be played by libraries in sustainable development and recommended policymakers to include libraries in National Development Plans (IFLA, 2015).

National Knowledge Commission (2005) has recognized that “libraries have a social function in making knowledge publicly available to all. They serve as local centers of information and learning, and are local gateways to national and global knowledge” (NKC, 2005). To pursue NKC recommendations, National Mission on Libraries (NML) was launched in February 2014 by then the President of India, Dr. Pranab Mukherjee, for the upgradation and digital linking of public libraries.

Marcella & Baxter (1999) conducted a survey on the information needs and information-seeking behavior of a national sample of the UK population. The study used questionnaires as a tool to collect data, covering all the places of the UK. In this study, three-quarters of respondents said they prefer public libraries and believed that information is important for exercising their rights as citizens. Further, the study finds that public libraries are the most suitable place for accessing computerized information. In another study by Marcella & Baxter (2000) revealed that social class and social status impacted information needs and

seeking behavior. Certain classes are excluded in the UK from having access to information. The paper highlighted that the information policy must be framed to overcome the barrier to accessing information.

Arko-cobbah (2006) examined the role of public libraries in developing civil society and good governance. Bopape (2017) said that public libraries are indispensable institutions that contribute to the socio-economic development of every citizen of the country by providing access to information. He further stressed that access to information in South Africa is hampered due to apartheid laws. To overcome this injustice, new public libraries are built in South Africa. The study revealed that youth and adults use public libraries to study and access the internet. Akullo and Odong (2017) highlighted the role of public libraries in providing information to Uganda women refugees in their everyday life. Most of them are seeking information on health services. Audunson et al. (2019) conjectured that users extensively use public libraries to access citizenship information and highlight their role as democratic institutions for public discourse and in building communities. Nengomasha & Shuumbili (2020) posit the role of public libraries in national development and harbinger in delivering e-government services to the citizens of Namibia. The study conceives that public libraries help in accessing e-government services for employment information and tax filing.

Considering the above-cited studies, this pilot will be torch-bearing for conducting the main survey.

4. Methodology

Pilot studies have undoubtedly gained focus in health sciences, but it would be beneficial if they are conducted in other domains of the study. In order to contribute to the body of knowledge, the following process of conducting a pilot study has been described:

To avoid pitfalls in the execution of the pilot study, it should be appropriately planned. The pilot study was planned according to the *CONSORT* (Consolidated Statement of Reporting Trials) statement, comprising a checklist and flow diagram in medical sciences (*CONSORT*, 2010). It is divided into the following parts:

4.1. Scope of the Study

For this paper, a pilot in terms of a miniature replica was conducted on a small group of participants (i.e., users of one of the branch libraries of Delhi Public Library under South Zone, Sarojini Nagar Public Library) analogous to those to be recruited in the main study (Doddy and Doddy 2015).

The limitation of the study was that the data was collected during the COVID-19 pandemic. Hence, many of the services were restricted during that period. The library provided minimal services as per covid-19 standard operating procedures (SOPs).

4.2. Structure of the Instrument

The study entitled “Role of Public Libraries in Citizenship Information” will use the questionnaire as a measuring tool for surveying the Delhi Public Library and its branches under five zones. The study has adapted the questionnaire from the previous study conducted in 1997 by Rita Marcella and Graeme Baxter, titled “The Information Needs and the Information Seeking Behaviour of a National Sample of the Population in The United Kingdom, with special reference to Needs related to Citizenship” ((Marcella & Baxter, 1999). Permission to use the questionnaire was sought through the mail. The questionnaire was modified and many new questions were added, keeping in mind the Indian conditions and needs of citizens, specially of Delhi, i.e., the emphasis of the government of e-governance, the present needs of citizens and the objectives of the study.

The questionnaire was structured and encompassed dichotomous, multiple-choice, and Likert questions. To get the desired information, the questionnaire was divided into three parts:

- A. Profile (1-7 items)
- B. Citizenship Information: Need & Seeking (8-17 items)
- C. Public Libraries & Citizenship Information (18-32 items)

4.3. Planning & Data Collection

(a) Participants: Before the main survey, an imitation of the actual survey in the form of a pilot study was carried out.

Sarojini Nagar Public Library (South Zone), one of the Delhi Public Library System branch libraries, was selected for the pilot study. The questionnaire was distributed using the convenience sampling method. As a caveat to the study, the *Sarojini Nagar branch library will*

not be taken in the actual study to avoid sample contamination (sample bias). The data collected from the pilot will not be included in the main study (van Teijlingen & Hundley, 2001).

Potential users were provided information regarding the objectives of the pilot study and its relation to the main study. It was made clear to the respondents that feedback regarding the questionnaire format, clarity, objectivity and appropriateness of questions would be asked and used to improve the instrument.

(b) Sample size: There were 27,000 registered users in the Sarojini Nagar Public Library as of November 2020. The sample size was calculated using *Solvin's formula* (Ryan 2013) at Confidence Level (%) = 95 and Margin of Error (%) = 15,

$$S = \frac{N}{1 + N(e)^2}$$

where, S= Sample size

N= Population size

e= error margin/ margin of error

After calculation, S = 44.37 ~ 40 (approx.). The sample size taken for the pilot study was 40.

(c) Recruitment: The data was collected in November and December 2020 by administering the questionnaires to the Sarojini Nagar public library users. Follow-up was done to get an adequate response. Convenience sampling was used to pilot the survey to 40 users and 27 (18 females & 9 males) duly filled questionnaires were returned. 67.5% was the response rate. Because of Covid-19 and prevailing Standard Operating Procedures (SOPs) during that period getting more responses was challenging.

Table 1: Age & Gender of Respondents

Age	Female	Male	Total
15-19	4		4
20-29	9	6	15
30-39	1		1
30-49	3	1	4
50-59		1	1
60-69	1		1
Below 15		1	1
Grand Total	18	9	27

Table 2: Gender & Education of Respondents

Gender & Education level	Age
Female	18
Left blank	3
Graduation	5
M.Phil.	1
Ph.D.	2
Post-graduation	6
Sr.Sec	1
Male	9
Graduation	5
Post-graduation	2
Secondary	1
Sr. Sec.	1
Total	27

4.4. Ethical considerations: The information provided by the Sarojini Nagar public library users was used for research purposes only. No part of the personal information will be shared and will remain confidential. The library users have articulated about the confidentiality of their data before filling out the questionnaire.

5. Results and Findings: The data analysis of the pilot is deliberated into two parts keeping in mind the objectives of the pilot study:

- i) The analysis of the data collection instruments and procedures; and
- ii) The reliability of the scores.

Statistical significance was not taken into account as pilot was done only for ascertaining the feasibility of the main study and pre-testing of the tool.

5.1. Analysis of instrument (questionnaire): The instrument was analyzed according to the time taken to complete the questionnaire and the unanswered questions.

- a) **Assessing the face validity (assessing the appropriateness of the content of an instrument on the surface):** was evaluated during the development of the tool as it was modified, keeping in view the Indian conditions and the feedback from the respondents after the development of the instrument.
- b) **Time to complete the questionnaire:** The survey took a minimum of 20 minutes for a respondent to complete. The time duration also affects the response rate. It was decided that the average completion time is 20 minutes would be helpful in collecting data from the target population under the main study.
- c) **Unanswered questions:** Two questions, one on the frequency of seeking citizenship information from different organizations and people and the other on the quality of information obtained, had inadequate response rates. Both the questions were retained but reformatted, and the instructions were reframed, keeping in mind the objectives of the main study.

5.2. Analysis of data collection procedure: Questionnaires were distributed manually to the participants, and a proper follow-up was done. An online questionnaire was also circulated through the mail, but no adequate and complete response was received. So, it was decided to distribute the questionnaire manually to the target population for the main study. An online questionnaire will be mailed to those who want to fill the same through online mode for the main study.

5.3. Revision of the instrument (questionnaire): Recommendations about questionnaire content were solicited from respondents of the pilot; they provided valuable feedback to improve it. The questionnaire was revised to improve clarity and facilitate ease of completion. A few questions were added to seek more information on the topic under study, a few were converted to the Likert scale to seek opinion, and a few were converted to multi-select questions.

5.4. Reliability of the measures: Reliability is the property of a measuring tool, which yields consistent results when basic conditions are identical. Reliability can equate with Repeatability. There are various types of reliability, such as test-retest, interrater, alternate form and internal consistency.

In this pilot study, we measure the internal consistency of the scores using *Cronbach's Alpha* because of the following two reasons (Howard n.d.):

- i) it can be used both for dichotomous and continuously scored variables;
- ii) can be calculated using a single sample.

Lee J. Cronbach introduced Cronbach Alpha in 1951. It measures the consistency of responses on multiple items measurements (Cronbach, 1951).

Cronbach's Alpha is calculated by correlating the score for each scale item with the total score for each observation (usually individual survey respondents) and then comparing that to the variance for all individual item scores:

$$\alpha = \frac{n}{n - 1} \left(1 - \frac{\sum_i V_i}{V_t} \right)$$

where n is the number of items,

V_t is the variance of the total scores and;

V_i is the variance of the item scores.

Interpretation of Cronbach's α

<i>Cronbach's α</i>	<i>Internal Consistency</i>
0.90 and above	Excellent
0.80 - 0.89	Good
0.70 - 0.79	Acceptable
0.60 - 0.69	Questionable
0.50 - 0.59	Poor
Below 0.50	Unacceptable

Cronbach's Alpha has been computed for **25 items on 27 subjects** in the pilot study. The sum of item variances was found as $V_i = 2.57$, and the variance of total scores was $V_t = 10.39$. Hence, α was found to be 0.78, which is the acceptable consistency of the measuring instrument/tool.

Reliability Statistics

<i>Cronbach's α</i>	<i>No. of Items</i>	<i>Internal Consistency</i>
0.78	25	Acceptable

6. Discussion & Conclusions: Reporting of pilots are not in vogue. This pilot study has been entailed to comprehend the doability of the actual survey. The pilot was confined to only one branch of the Delhi Public Library, and data and findings were generated from one branch library only, which may affect the generalizability. Nevertheless, the conditions are overall the same in all other branches. Hence, this may decline the threat to internal validity. While commissioning the pilot, the difficulties that came around while commissioning the questionnaire will be considered during the main study. It has also helped in the improvement of the measuring tool. The pilot has found that the main study will be feasible and can be undertaken.

As a caveat, pilot data nor the sample will be taken in the main study. The pilot also has rubrics to assess the reliability of the measuring tool needed to carry out the actual study. To conclude, the test of reliability using Cronbach's Alpha has been successfully met with acceptable consistency of the measuring tool.

7. Implications of the Pilot study: It is essential to report pilot study results before conducting the entire survey, and this study will have border implications while doing so. Typically, pilot studies receive less attention and coverage in the journals. This pilot study will be a crucial stepping stone for future researchers, especially in libraries and information science. This pilot will add knowledge to the body of qualitative research methods. Pilot study results must be shared so that others can learn from the pitfalls encountered before moving on to the full-scale survey.

References

- Akullo, W. N., and Odong, P (2017) Information needs and information-seeking behaviour of women refugees in Uganda; Public Libraries' Role. *IFLA WLIC 2017: LIS professionals supporting women living in conflict situations*. Available at: <https://www.ifla.org/node/11319> (accessed January 24, 2018)
- Arko-cobbah, A (2006) Civil society and good governance: challenges for public libraries in South Africa. *Library Review* 55(6): 349-362.
DOI:<https://doi.org/10.1108/00242530610674767>.
- Audunson, R et al. (2019) Public libraries as public sphere institutions: A comparative study of perceptions of the public library's role in six European countries. *Journal of Documentation* 75 (6): 1396-1415. DOI: <https://doi.org/10.1108/JD-02-2019-0015>
- Bopape, S (2017) Identifying the information needs of public library and information services users in Limpopo province. *South African Journal of Library & Information Science* 83(1): 1-10. DOI:10.7553/83-1-1631.
- Census (2011) Delhi Population 2011 - 2022. [Online]
Available at:
<https://www.census2011.co.in/census/state/delhi.html#:~:text=Total%20population%20of%20Delhi%20as,are%208%2C987%2C326%20and%207%2C800%2C615%20respectively.>
[Accessed 10 November 2020].
- CONSORT (2010) Pilot and Feasibility Trials. [Online]
Available at: <http://www.consort-statement.org/extensions/overview/pilotandfeasibility>
[Accessed 24 December 2022].
- Cronbach, LJ (1951) Coefficient alpha and the internal structure of tests.. *Psychometrika*, 16(3): 297-334. DOI: <https://doi.org/10.1007/BF02310555>.
- Delhi Public Library (n.d.) Delhi Public Library_About us. [Online]
Available at: <https://dpl.gov.in/> [Accessed 5 December 2022].
- Delhi Public Library (n.d.) South Zone Library (Sarojini Nagar). [Online]
Available at: <https://dpl.gov.in/index.php/south-zone> [Accessed 20 December 2020].
- Doody, O and Doody, CM (2015). Conducting a pilot study: case study of a novice researcher. *British journal of nursing* 24(21): 1074–1078.
DOI: <https://doi.org/10.12968/bjon.2015.24.21.1074>
- Fraser, J et al. (2018) Pilot Testing for Feasibility in a Study of Student Retention and Attrition in Online Undergraduate Programs. *International Review of Research in Open and Distributed Learning*, 19(1): 260-278. DOI: <https://doi.org/10.19173/irrodl.v19i1.3326>.
- Hassan, ZA et al. (2006) Doing a pilot study: why is it essential?. *Malaysian Family Physician*, 1(2&3): 70-73. Available at:
<https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4453116/pdf/MFP-01-70.pdf> (accessed on February 5, 2023).

IFLA (1994) *IFLA/UNESCO Public Library Manifesto*. [Online] Available at: <https://www.ifla.org/publications/iflaunesco-public-library-manifesto-1994?og=49> [Accessed 12 January 2022].

IFLA (2015) *Access and Opportunity for All: How Libraries contribute to the United Nations 2030 Agenda*. [Online] Available at: <https://www.ifla.org/wp-content/uploads/2019/05/assets/hq/topics/libraries-development/documents/access-and-opportunity-for-all.pdf> [Accessed 10 January 2022].

Junyong , In (2017) Introduction of a pilot study. *Korean Journal of Anesthesiology*, 70(6) : 601-605. DOI:<https://doi.org/10.4097/kjae.2017.70.6.601>.

Kachhal, D (2018) February. Seeking solace.. In: *Yojana: A development monthly*. s.l.:Publication Division: 5. New Delhi: Publication Division, Ministry of Information & Broadcasting, Government of India. Available at: <http://yojana.gov.in/Yojana%20February%202018.pdf>. (accessed January 25, 2022)

Malmqvist, J et al. (2019) Conducting the Pilot Study: A Neglected Part of the Research Process Methodological Findings Supporting the Importance of Piloting in Qualitative Research Studies.. *International Journal of Qualitative Methods*, Volume 18. DOI:<https://doi.org/10.1177/1609406919878341>.

Marcella, R and Baxter, G (1999) The information needs and the information-seeking behaviour of a national sample of the population in the United Kingdom, with special reference to needs related to citizenship.. *Journal of Documentation*, 55(2): 161. DOI:<https://doi.org/10.1108/EUM0000000007142>.

Marcella, R and Baxter, G (2000) Information need, information-seeking behaviour, and participation, with special reference to needs related to citizenship: results of a national survey. *Journal of Documentation*, 56(2): 136-160. DOI:<https://doi.org/10.1108/EUM0000000007112>.

Mehta, US and Narayan, S (2018) Private service providers: Redressal mechanism.. In: *Yojana: A development monthly*. s.l.:Publication Division,: 25. New Delhi: Publication Division, Ministry of Information & Broadcasting, Government of India. Available at: <http://yojana.gov.in/Yojana%20February%202018.pdf> (accessed January 25, 2022).

Morrison, J et al. (2016) “Underdiscussed, underused and. *Qualitative Research Journal*, 16(4): 320. DOI:10.1108/QRJ-07-2015-0053.

Nengomasha, Cathrine T and Teopoline N Shuumbili (2020). “Access to E-Government Services by Citizens through Public/Community Libraries in Namibia.” *Information Development* 38 (1): 68–82. DOI: <https://doi.org/10.1177/0266666920979009>.

NKC (2005) *National Knowledge Commission (NKC)*. [Online] Available at: <http://14.139.60.153/bitstream/123456789/1267/1/report09.pdf> [Accessed 10 January 2022].

Prescott, PA and Soeken K L (1989). “The potential uses of pilot work”. *Nursing Research*, 38(1): 60-62. DOI:10.1097/00006199-198901000-00015.

Thabane, L et al. (2010) A tutorial on pilot studies: the what, why and how. *BMC Medical Research Methodology*, 10(1): 3. DOI:<https://doi.org/10.1186/1471-2288-10-1>.

van Teijlingen, ER. and Hundley, V (2001) The importance of pilot studies. *Social Research Update*, Volume 35. Available at: <http://sru.soc.surrey.ac.uk/SRU35.html> (accessed January 20, 2022).

Funding: This research did not receive any grant from funding agencies.

Declaration of Conflicting Interest: None

Acknowledgements: The study is the outcome of Ph.D. work done under the supervision of Prof. Jaideep Sharma, Indira Gandhi National Open University (IGNOU), New Delhi, India. I thank the library staff and users of Sarojini Nagar Public Library for the cooperation needed during the filling of the questionnaires.

Biography: *Vanita Khanchandani* is working as Assistant Librarian (Sr. Scale) at Central Library, IIT Delhi. Before joining IIT Delhi, she worked at the Defence Institute of Psychological Research (DIPR), DRDO, Delhi. She has qualified UGC-JRF examination and has M. Phil. degree in Library and Information Science. She holds a Bachelor's degree in Science (Botany Honours), Bachelor of Education (B.Ed.), Bachelor of Library & Information Science (BLISc) & Master of Library & Information Science (MLISc). She is the Gopala Krishan award recipient for being a topper in BLISc and Prof. S Dasgupta Memorial Gold Medal for being a topper in MLISc. She has also achieved a Six Sigma White Belt Certificate from ABI, Ohio, USA. Her areas of specialization are marketing of LIS products and services, open access, public libraries, and e-learning. Currently, she is pursuing a Ph.D. from the School of Social Science, IGNOU.