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Mobile Technology in Library: A Study

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Abstract:

Tremendous use of Mobile technology has brought the world very close. Library and information services also use mobile technologies in libraries for various services. We present here use of mobile technologies in libraries. Paper The written has thought some of the fundamental things which needs to be stated related to this issue.

Key Words: Mobile Technology, Mobile Application

Introduction:

The Technology has changed a lot during last decades. A lot of day to day works has become easiest due to the use of this technology. Everybody in today's world is used to use the technology and everyday new developments are made in the technology. In library and information center also a lot of new technology being used.

In earlier times most of the library works had been done manually. After the invention of computer, it's been used in library also. Use of computers have made it easy to carry out library works accurate and efficient. Variety of software are available in libraries for automation, barcode generation, RFID use, digital libraries use etc.

The motive behind the use of this technology in library is the readers should get the required information fast and accurately.

Today due to the increasing use of Internet the readers visit library and information center very rarely. We must help them reach up to the library and information center. A lot of instruments are being used to spread information and mobile technology is equally useful in this effort. This technology used to fulfill the requirements of users of library. Today's libraries must use this technology effectively to satisfy the needs of users.

Literature Review:

Kumar, Sampath., Kumar Vinay, B. T., and Prithviraj, K. R. (2013) Application of mobile technology in library services, How the uses of mobile technology can be useful for readers and which services libraries can provide to the users, has been discussed thoroughly.

Broussard, Ramona., Zhou, Yongyi. and Lease, Matthew.(2010). Mobile phone search for library catalogs in this research paper they have studied the benefits and cost of mobile technology application. While making the mobile application how it should be useful for readers, this has been discussed properly.

Lippincott, Joan K. (2010). A Mobile Future of Academic libraries in this research paper, he has studied which issue should be thought while using mobile technology in academic libraries. How this technology can be useful for libraries and users is discussed in this paper.

While writing this essay, some websites how also been used which have been mentioned in reference.

Regarding a review of the use of mobile technology in India:

In old days information and messages used to be transmitted with the help of Telegram, Telephone and Fax. All this tools were used keeping them at one place. After some days technology changed and pager was used

to for transmission of messages. These tools were used for sending messages only. After the invention of mobile, there was a huge revolution in message transmission. There was a continuous change took place in this tool and today it is the world of smart phone. With help of smart phone and internet we can transmit messages and information in different ways. Modern day mobiles, a part from conversation are used for internet use, give and take SMS, Listening songs, to click photograph and to use GPS technology etc. Nokia, Motorola, Apple, Siemens and Samsung these are some of the bigger companies which manufacture mobiles. The first mobile phone in the world was developed by Martin Cooper of Motorola Company in 1973. In 1990 there were around 1.24 Crore mobile user. At the end of the 2014 this number went up to 1.64 Billion. At present in developed Nations 97 out of 100 people have mobiles and this number is 45 peoples out of 100 are mobile user.

In India the end of the 2014 there were around 1.23 Smart phone users. India will overtake America which is at second number in using smartphone, in 2016 and become second largest user of smart phones, this has been provide in the survey of e-marketer. Due to affordability and low rate of internet, smart phone users are increasing in the world.

Chart No. 1 Smart Phone Users

Daily Sakal and Loksata dated 23rd Dec. 2014

Important elements in using Mobile Technology:

1. SIM Means Subscriber Identification Module.

2. iPhone is the production of Apple. The next step of this famous product is unification of phone and iPod.

3. Android is the technology developed by Google for mobile.

(Above information is taken from http://mr.wikipedia.org/wiki/mobilephon this website.)

In library the following Mobile Technology has changed over a period time for using technology in library:

1. ICT – Information and Communication Technology.
2. Internet
3. Web 2.0
4. Cloud Computing
5. Mobile Technology

Some application related to use of Mobile Technology:

To give fast services to customers, bank, railways and airplanes etc. are using mobile application so that they can give better services to customers. In the same way libraries can also use these technologies to give library services to their users. After reviewing the literature on Internet it was found that following services can be provided to the users by making use of mobile devices.

1. Mobile OPAC (Mobile Online Public Access Catalog)

With the help of mobile OPAC users can search different books, Journals, and documents available in the library.

2. OR Codes (Quick Response Codes)

Fast response indication is a type for matrices. Barcode means for two way indication trademark. This QR codes indicate for was used and developed for Motor – Vehicle business. But this technology became popular in other businesses as well dune to its fast readability

and big storing capacity later. We can store information of books in mobile after downloading this application with scanning QR codes. We can also understand where particular book is kept. We get whatever information we want at a particular time with QR codes.

3. Mobile RFID (M-RFID) :

Can be defined as services that provide information on objects equipped with an RFID tag over a telecommunication network.". The reader or interrogator can be installed in a mobile device such as a mobile phone or PDA.

Unlike ordinary fixed RFID, mobile RFID readers are mobile and the tags fixed, instead of the other way around. The advantages of M-RFID over RFID include the absence of wires to fixed readers and the ability of a small number of mobile readers can cover a large area, instead of dozens of fixed readers.

The required elements to use Mobile Technology in library:

1. Library mobile application website

The good example of how a library can give better facilities to its users with the help of Library's separate mobile application is of the University of Alabama. This Library while making its application has included the following facilities.

• **Resources**

1) Libraries Catalog2) Digital Archives3) Articles 4) Databases5) E-journals / E-Books

• **Services**

1) Interlibrary Loan2) Music Library3) Borrowing Materials4) Computer Availability

• **Research Help**

1) Subject Guides2) Ask-A-Librarian3) Finding Materials4) Subject Specialist 5) Digital Humanities Center6) E-Science Initiative

• **How Do I ?**

1) Renew My Book2) Find Course Reserves3) Report a Login Problem 4) Connect to Wireless Network 5) Print to Library Printer

Chart No. 2 Sample Example of Mobile Application.

Santa Clera University :http://www.scu.edu/mobileapp/

2. Bulk SMS Software:

With the help of bulk SMS technology we can give the user information about circulation of books and other documents.

Smart Tools for the Use of Mobile Technology:

1. Palm Tablet
2. Smart Phone
3. Blackberry Phone
4. Pocket-size Computer

Services can be provided with the Help of Mobile Technology:

1. SMS Service can be used for circulation of books, renewal and late fees etc.

2. Information regarding buying of books from readers.

3. Information regarding library like library time, some notices for readers and rules etc. for users.

4. Information of new arrival materials like books and periodicals.

5. For reference services of questions asked by readers.

6. To search books in library with the help of M-OPAC.

7. Online services like e-books, e-journals, e-database, online database etc. can be used by readers.

8. Ask Librarian: If readers have some

problems regarding library, or they have some problems regarding books search or suggestions for library services then readers can give it to the librarian.

Benefits of Mobile Technology:

1. Saves time of the users.
2. Users don't have to visit library for searching information.
3. Information can be downloaded in mobile.
4. Users can get information at any time,

Libraries giving Mobile Services to Users:

Lot of libraries in the western countries have started giving information to the users using mobile technology along with desktop access. The university libraries which started this service are Adelphi University, Boston College Library,HYPERLINK "http://m.harvard.edu/info/"Harvard University, Loyola. Marymount University Library, Loyola. University Chicago, Missouri State University, MIT's library, North Carolina State University, Northwestern University, Santa Clara University, Stanford University, University of Alabama, University of Washington etc. As compared to this in India this technology is not used on a large scale yet due to several reasons.

Some selected libraries have started using this technology are providing library services using mobile device such as Indian Prairie Public Library, Indian Low Mobile Library, Goeth-Institute Max Mueller Bhavan (German Language), Bureau of Indian Standards etc. Mumbai University has developed its mobile app recently in July 2015.

Conclusions:

1. The users can easily find the reading sources in library using mobile device.
2. It can bridge the library and users very effectively.
3. This technology can be used for giving effective services to the users.
4. As compared to foreign countries, where these services have started in India this technology is not being used very much in India though mobile users are increasing day by day

in India and a large user base of smartphone exists in India. Libraries should make efforts to popularize mobile based services in libraries.

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• eMarketer, New York: www.emarketer.com

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