

SMS – Its Use in the Digital Library

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Abstract. SMS or short messaging service is a form of text messaging used extensively throughout the world. It is a cheap and mobile form of communication but there is limited research into its library use. Using Internet search techniques and content analysis, this research investigated how libraries use SMS. Fifty libraries with English language websites were found to be using SMS and were divided evenly between academic and public, with two national libraries. They spread over fourteen countries with the United Kingdom having the most libraries using the technology. Usage was mainly in the circulation area, particularly reserves. Some libraries offered reference services. Cost and complexity varied, with some libraries offering examples of possible future use. Suggestions are made as to the importance of libraries helping each other in implementing SMS.

1 Introduction

Libraries are always looking for new ways of communicating with users and with the growth in mobile phone ownership, a new avenue has opened up. Many businesses now use SMS for communicating with clients - SMS, or short messaging service, being defined as “a service similar to paging for sending up to 160-characters-long messages to mobile phones.”^[1] Software is available which sends SMS messages from a PC to a mobile phone and it can be integrated into library systems. However, in this stage of early adoption, it is difficult to establish the extent and type of library use. Content analysis has previously been used to determine library weblog use^[2] and this technique can be used to establish SMS usage in libraries.

2 Library Use of SMS

This survey focuses on English language library literature and websites and a small body of literature is available about using SMS in libraries. In 2001, the Helsinki University of Technology introduced Liblet which let the library communicate with users via mobile phone. It linked to the Voyager Library System and reservations, renewals and even payments were possible. Users were required to register and costs were shared, depending on whether the texts were library or student generated.^[3] At Curtin University of Technology in Perth, Giles and Grey-Smith in 2005 described their SMS reference service. Limited staff training was required, the service was heavily promoted and usage was steady. Most queries were explanatory.^[4] In an American context, South Eastern Louisiana University Library introduced an SMS reference service in 2005. Set messages were used, librarians required limited training and questions were short and factual. It was

concluded that the service might receive limited use and needed different marketing.^[5] In 2006, Herman described a SMS Reference at the Southbank Institute of Technology Library in Melbourne. MessageNet software met cost constraints, allowed for a unique number and interfaced with Microsoft Outlook. Protocols were developed for texts.^[6] Also in 2006, Monash, another Australian university, began using MessageNet to overcome reservation pickup problems. In 2005, 35% of intra-library loans were not collected. A SMS trial found quicker pick-up times.^[7] In Malaysia, university librarians in 2006 found that all students in a library survey had a mobile phone. Perceptions of SMS use by the library were positive with renewals service rating more highly than reference. The researchers found limited examples of SMS library use but they concluded that libraries should begin introducing SMS services as soon as possible.^[8]

3 Methodology

Laurel Clyde is a well-known researcher into library websites and associated technologies. In 2004, using Internet search engines and directories and content analysis techniques, she found weblogs on library sites in only three countries – the United States of America (USA), Canada and the United Kingdom (UK).^[2] A similar multi-step process was used in the current study to investigate library use of SMS.

1. Data was collected between June 20 and 26, 2007.
2. English language library websites were identified using google keyword searches including sms, “text messaging,” “mobile phones” and library or libraries.
3. Libraries using SMS were then identified, the relevant page printed out and then examined.
4. Categories were established and named. These were country, type, registration, charges, privacy, homepage link and special name.
5. TypeS of use were also established: a. Circulation (outward messages) b. Queries and reference (inward messages).
6. Numbers in each category were then counted and results analysed.

4 Results

Fifty libraries used SMS. There was an equal number of academic and public libraries and two national libraries. Spread over fourteen countries, most were in the United Kingdom, where six public libraries used it for circulation (reserves or overdues) and four for inward queries and reference. Australia had eight libraries, six academic and two public. Three of the academic libraries used MessageNet, where students could text into the library. Finland had most libraries using it in Scandanavia, with a group of libraries using Liblet which allowed for inward and outward communication.

The most advanced use of SMS was at Seoul National University where the mobile phone used a downloadable library card for entry, borrowing and circulation.^[9]

Registration was required mainly because mobile numbers were not on file. Charges usually clarified that users paid for texts. Three of the four libraries mentioning privacy were in the United States. Home page links often had special names. Most popular were SMS with a suffix e.g. SMS SCU or a group term like Mobile Services. Variations on txt were used for libraries with reference services e.g. Txt ur Library!

Use was mostly for sending outward circulation messages and ranged from multiple functions to many libraries using it just for reserve notices. Inward queries and reference services were obviously less used.

Table 1. Location and types of the fifty libraries using SMS

| Countries | No | Academic | Public | National |
|------------------|-----------|-----------------|---------------|-----------------|
| UK | 10 | 1 | 9 | |
| Australia | 8 | 6 | 2 | |
| Finland | 8 | 3 | 4 | 1 |
| Denmark | 6 | | 6 | |
| USA | 4 | 2 | 2 | |
| Korea | 3 | 3 | | |
| Norway | 3 | 2 | 1 | |
| Hong Kong | 2 | 2 | | |
| Sweden | 2 | 2 | | |
| Israel | 1 | 1 | | |
| New Zealand | 1 | 1 | | |
| Singapore | 1 | | | 1 |
| Thailand | 1 | 1 | | |

Table 2. Characteristics of SMS website pages

| Categories | Number of library website pages |
|-------------------|--|
| Registration | 21 |
| Charges | 16 |
| Privacy | 4 |
| Home Page | 14 |

Table 3. Use of SMS

| | Number of library website pages |
|--------------------------------|--|
| Circulation (Outward) | 40 |
| Queries and reference (Inward) | 12 |

5 Conclusion

Given the popularity of the mobile phone, the fact that only fifty English language sites with SMS services were found demonstrates that its potential is not being realised. Nonetheless, individual libraries, regardless of location, are trying to be

innovative. In addition, geographic clusters indicate that libraries are either learning off each other or that local SMS technologies are available. Obviously, the cost and complexity of the technology varies and Seoul National Library represents the future. In contrast, smaller libraries in isolation are still trying to provide a service, which could just be from mobile to mobile or from a free internet site. The dominant use of SMS in circulation is also interesting in that it demonstrates, given the 160-character constraint, the best use of the technology in libraries. It is also apparent that libraries are developing protocols for its use. In whatever form chosen, however, libraries need to start collecting mobile phone numbers if they plan to implement an SMS service.

A similar survey in five years time will undoubtedly be very different, especially when SMS is integrated into library systems. In the meantime, libraries using SMS should be informing others about software, use, popularity, problems, constraints and costs. If such information is shared, it is possible that, regardless of budget, geography and technology, SMSLIB or TXT2LIB will be a common feature on library websites.

References

1. Kajan, E.: Information technology encyclopedia and acronyms. Springer, Berlin (2002)
2. Clyde, L.: Library Weblogs. *Lib. Man. Emerald database* 25, 183–189 (2004)
3. Pasanen, I., Muhonen, A.: Library in Your Pocket (2001), <http://www.iatul.org/conference/proceedings/vol12/papers/Muhonen.pdf>
4. Giles, N., Grey-Smith, S.: Txing Librarians @ Curtin. (2005) <http://conferences.alia.org.au/online2005/papers/a12.pdf>
5. Hill, J.B.: Text a Librarian: Integrating Reference by SMS into Digital Reference (2005), <http://data.webjunction.org/wj/documents/12542.pdf>
6. Herman, S.: SMS Reference: Keeping Up with Your Clients (2006), http://conferences.alia.org.au/alia2006/Papers/Sonia_Herman.pdf
7. MessageNet: Monash University (2006), http://www.messagenet.com.au/caseStudies/casestudies_MonashUniLibrary.pdf3
8. Karim, N.S.A., Darus, S.H., Hussin, R.: Mobile Phone Applications in Academic Library Services: A Students' Feedback Survey. *Campus - Wide Information Systems* 23, 35–51 (2006)
9. Seoul National University Library (2007), <http://library.snu.ac.kr/Eng/StaticView.jsp?page=MobileIDCard>