What Librarians Need2Know
Instant Messaging and Chat as Reference Services in Public Libraries

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Abstract
Need2Know is the name of a test work made by the public libraries of Aalborg, Denmark. Using MSN Messenger as a tool for synchronous reference service the project tested if it is possible to reach new library users with instant messaging as a platform.

The authors of this paper followed the test work as researchers. The paper does not give a detailed report or evaluation of the test work but presents the project and discusses the implications of the use of instant messaging and new media in the public library.

The test work was a great success. A contract with Microsoft provided banner spots exposing Need2Know to MSN users, and 700 users signed up for the service. The users were mostly young people at the age of 12-15 years, a group of users who in recent years has deselected the library. The conclusion is that instant messaging is an excellent communication tool for reaching young people. Based on research literature in the field the paper discusses the kind and quality of synchronous reference service and the qualifications needed by the librarian.

Instant messaging has lately been related to the phenomenon of Web 2.0, and the paper also refers to Web 2.0, especially to the aspects of distributed services versus the library as a physical and virtual unit. Should the library be an equal among equals in a common knowledge sharing of user communities? Or will users still expect the public library to be a confidential guide in the jungle of information?

Introduction
The use of new media is not only a technological issue. New media mean new ways of communication. As an example the choice of online synchronous ‘chat services’ in libraries implies an accelerated and more speedy way of communication. There is no time for the thorough interview or the careful information retrieval. The discourse of conversation in instant messaging (IM) is not straight professional. Especially conversations with young users may have a personal, cheerful or even private turn. The librarian role changes from a professional expert to a “buddy” among buddies.

Are there further implications from these changes? Will instant messaging or similar services in libraries mean poorer quality in reference answers? Or will such new services have other qualities and advantages? This paper will unfold these questions and give some preliminary answers. During a year these authors have followed a project called The Digital Librarian in The Aalborg Libraries, Denmark. One of the main elements of the project was the IM “ask service” Need2Know (a name invented by librarians involved in the project). The Need2Know service is an exceptional example of a proactive IM service by attracting the users’ attention when they use IM for communication with their friends. This is unlike
ordinary IM library services, which have to be looked up from the library’s web site. We did not make a systematic evaluation but from observations and conversations with the involved librarians, questions like those above were put forward, and the questions were qualified through literature studies. Among further main questions we can mention: Is one of the advantages of IM services that it corresponds so well to the user-centred strategies of modern libraries? One of the main strategies of ‘Library 2.0’ is to make information available everywhere, to put the library everywhere. Is Need2Know as an IM service an example of such a ‘Library 2.0’ strategy? Finally, which new competencies will the integration of new media demand from professional librarians?

**Instant messaging in libraries**

Computer supported reference service has been used by libraries for several years. E-mail or chat services has commonly been offered to patrons who preferred remote virtual service to the face-to-face meeting with the librarian. “Chat reference” is a synchronous way of communication which has special advantages compared with e-mail. The patron gets an answer immediately and the synchronous dialogue may qualify the service.

In some countries the platform of chat reference has been delivered by special software packages, designed for and sold to libraries, most commonly academic libraries. Some academic libraries have designed their own IM services and interfaces, e.g. “Morris Messenger”, an IM reference service at Southern Illinois University Carbondale, Morris Library (Desai & Graves 2006). Recently more libraries have changed to the free instant messaging services (IM) (Oberhelman 2007; Ward 2006). In Europe Microsoft’s MSN Messenger is the most popular IM service. Especially in US other popular IM services are ICQ, Yahoo! Instant Messenger (YIM), and America Online’s AIM. A 2004 report, *How Americans Use Instant Messaging*, by the Pew Internet and American Life project, told that IM was used as daily communication means by a big majority of young people (especially college students) and the report was a direct cause for academic libraries to start IM services. For the young generation IM and SMS - not e-mail - is the natural way to communicate online. In fact:

> “With its increasing popularity among young people, IM has become more than a communication tool. For many, IM is also part of their lives” (Lee, 2007, p. 224)

Or, to quote an article in Library Journal: “...many IMers are those hard-to-reach Millennials who grew up in the 1980s with computers and don't think of them as technology” (Schmidt & Stephens, 2005).

Therefore it is important that also libraries allow users to communicate through the services they have got used to.

> ”In chat reference, we should take advantage of the opportunity to meet users where they are, with their own tools and in their own comfort zones, and make chat reference service a regular online habit as well” (Ward, 2006, 106).

A disadvantage to this strategy may be that the specialized IM services designed for libraries have more management features than free IM services. Therefore some libraries prefer software programmes such as Trillian which allow communication between users of different IM clients. The use of Trillian allows the library to use a more advanced IM client while the users communicate through their usual client. This is the case in the reference service GetLibraryHelp (Ciocco and Huff, 2007)
According to an article in Chicago Tribune in September 2007 (Channick, 2007) the vast majority of the 140 US libraries using instant-messaging reference is placed at universities. Only 37 are public libraries in September 2007. It is natural, therefore, that the literature of IM services usually deals with services of academic libraries. Here the purpose of IM service is to help or instruct patrons in the information search process (Foley, 2002; Desai & Graves, 2006). Users are remote online users or users inside the library building (Oberhelman, 2007). The large majority of user requests deals with problems concerning library catalogue or databases and resources in the library system.

The purpose of the Aalborg project was not to offer current library patrons an expansion of the reference service as “remote users” or to help patrons in the library building. The purpose was to go “out” into the virtual environment, find new users and offer them a service. In fact an academic library was part of the project, namely Aalborg University Library, but dominant in the partnership was the public libraries in Aalborg, and Need2Know never appealed to academics. Instead the Aalborg project mirrors the strategy of the few pioneers among US public libraries using IM.

Ask the librarian
The Aalborg IM test work Need2Know is a virtual reference/”ask the librarian” service. Before the analysis of Need2Know a retrospect of virtual “ask” services in Danish public libraries is presented as an example of the general development in the communication between the library/librarians and their users. It illustrates in other words the development from asynchronous to synchronous online communication between the user and the librarian.

The public libraries in Denmark were not on the Internet until the late nineties. The first stage of their web-sites was a presentation of physical collections, opening hours, addresses, etc. Some libraries supplemented with an e-mail address, which they considered to be an “ask” service. A survey of the 77 Danish public libraries that were on the Internet in 1998 emphasized the need for supporting the user in formulating the request (Hummelshøj & Skovrup, 1998). It was suggested to develop a fill in form to substitute the traditional reference interview. The suggestion was based on the results from test works by Abels (1996) which showed that a structured communication was an advantage for the user and the librarian, as well. An accurate request requires less resources to answer, furthermore, the user is supported in the formulation process. The choice between a carefully prepared service with maximum support but low accessibility and an easy accessible service with low or no support is hard to take for developers, and is discussed by librarians. As an example, The Internet Public Library has a fill in form1 which is very supportive by taking all information literacy problems in consideration. It may, however, be a barrier to users, who think it is time consuming to fill in the form.

The Danish public libraries developed their “ask” services with e-mail communication more or less according to these recommendations with the fill in form, which could be characterised as a first step to replace the face-to-face communication with the user.

Compared to most other countries, Denmark’s libraries are small and with few resources. The resource problem has affected the development of most of the electronic services with the result that they are developed and maintained in cooperation. The Danish national “ask”

service, for example, Biblioteksvagten\(^2\) was established 1999 as a cooperation between a number of both public and research libraries. Biblioteksvagten was in the beginning exclusively an e-mail based “ask” service supporting the most common way of communicating at that time.

Experiences from the e-mail services and the asynchronous communication showed that the user’s information need could change essentially during the communication period, which could be weeks (Abels, 1996). In order to overcome these problems and encouraged by the technological development, chat services which allows synchronous communication with the user, was established in many public libraries. The chat service is much closer to the interaction in the traditional face-to-face reference service, but the reference interview in the traditional form will, however, play a minor role. From a resource point of view, a chat service demands considerable resources and consequently is very appropriate for cooperative “ask” services. The Danish national “ask” service, Biblioteksvagten, as an example, is the only library chat service in Denmark.

In general the public library’s virtual “ask” services have been developed without profound knowledge about the users. It is now, however, well known that they are much more heterogeneous than the users of the physical library. It is also well known that unfocused services get no users. This knowledge is important for the development of services and should be combined with the choice of technology to match the users’ different needs. In addition, the continuous technological development enables the libraries to develop a more differential service which meets the users’ heterogeneous needs. Some requests need a more thorough communication which allows the librarian’s continuous estimate of the information need, and the user’s accept of the received answers. E-mail communication is suitable for these requests. Sometimes users need a more spontaneous communication which is best supported by the chat technology and presently we furthermore have Instant Messaging which most young people prefer. The library should give access to different ways of communication in order to support the different needs of their users.

The “ask” services which are presented and accessible from a library’s web-site depend on proactive users, who know or expect this service from the library. The challenge is consequently to catch new users who normally do not seek the service out on libraries’ websites. In the following we present a project with the aim of attracting new users on the MSN platform and which at the same time is an example of how progress in technological development can support a more spontaneous communication between the librarian and the user.

The project Need2Know was accomplished by the public library in Aalborg\(^3\), Denmark (about 200.000 inhabitants), from spring 2006 to spring 2007.

**Need2Know**

The purpose of the Need2Know test was to find “new virtual channels to the users”. The challenge was expressed this way: “If the young people do not visit the library the library the library must visit them”\(^4\).

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Teenagers are not frequent users of traditional library services, but are experienced users of Internet services and the majority communicates with their friends by using IM (Instant Messenger). An article in Chicago Tribune refers to librarians who express that:

“there is a possibility that we are losing younger patrons, that they’re not necessarily thinking of using the library as a resource” Channick (2007).

And further:

“If you don’t have a way of communicating with them through instant messaging, you really seem irrelevant” (ibid.).

Aalborg public library realised this problem and therefore wanted to test if they could succeed in attracting the young people on this platform.

The Aalborg test took an innovative step by proactively attracting the potential users’ attention on the MSN platform. The library made a contract with Microsoft which enabled them to establish a service on IM. From a traditional library viewpoint it was an expensive solution, and was only possible with support from the Danish Library Agency.

A number of questions with appeal to young people, for instance about music, actors, movies, etc. were exposed 15 million times during the test period which was one year (March 2006-March 2007). When the teenagers felt curious to get the answers to the questions they entered a communication with the librarian. The number of persons who jointed the service as regular users within a few months was about 700, which was far beyond the expectations.

They were as mentioned above caught by an interesting question to which they had an answer from the librarian. Subsequently, as regular users, they asked their own questions in a synchronous dialog with the librarian. More information about the project and the test is presented in Hummelshøj & Nielsen (2007).

The service was legitimated by the number of frequent users and the IM service is now continued by the Danish national “ask” service, Biblioteksvagten, which includes e-mail, chat, and now IM services.

The purpose of the test was twofold, one was to catch new users or “to meet the users where they are”, and the second was to train the staff in using the technology. We will present some of the experiences from the test, which is analysed in relation to reference service and to Web 2.0. In a final paragraph we will discuss the librarians’ competences in relation to the technology and the new services.

The quality of the answers

As mentioned above the reference interview is not accomplished in the synchronous IM ask service. The reference interview is normally an important component in the reference service and is inextricably bound up with evaluation of the quality of the answers. This classical research theme is well discussed in the research literature.

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Among others, Bruhns (1996) stresses the coherence, in the traditional face to face service, between the bad quality of the answers and a poor accomplished reference interview. Nilsen (2005) transfers this view to the electronic “ask” service referring to a survey that shows that bad habits from an incomplete traditional reference interview are transferred to the virtual, with a poor quality in the answers as a consequence. It should be mentioned that the classical/traditional measure for good quality is an exact match between the answers in a key and the answers given by the librarians.

Consequently, the value of the total reference service depends on the quality of the answers. Measuring the quality in reference service is, however, much more complicated.

An overview of research within measurement of the effectiveness of question-answering is presented by Kwon (2007, p. 74-75). The overview shows that accuracy, completeness, usefulness, speed of answering the questions and user satisfaction have been in focus in a number of evaluation projects. Additionally, the type of questions plays an important role in the quality of the answers. The level of user satisfaction with answers to subject-based research questions seems to differ from user satisfaction with answers to simple factual questions.

In the Need2Know test the answers were not evaluated according to the traditional professional quality criteria. Actually, no evaluation of the answers was accomplished. Observations from the test demonstrated, however, that the classical approach to quality of the answers was challenged. The service did neither have time for a proper reference interview nor for a proper evaluation of the quality of the information resources. We must still pay attention to quality of the answers but in a service like Need2Know the demand of an immediate answer can, however, affect the thorough evaluation of the information resource. It is nevertheless crucial to the users and a success factor for the service to deliver an answer as quickly as possible.

On the other hand, we must realize that users seem to use the service with an alternative purpose. They do not necessarily view the librarian as an expert who search and find the right answers. The challenge is the new social technologies, well known as web 2.0, which affect the relation between the librarian and the user.

Web 2.0 services
IM services are often assigned to the kind called Web 2.0 services. Therefore we will discuss if Need2Know can be considered as an example of the Web 2.0 or Library 2.0 trend.

There exist several types of web 2.0 services:
1. One type works as services for storing, knowledge organization and sharing of individual users’ products or repositories. Examples are services storing users’ own products. Flickr is a place for storing, organizing and sharing of private photos; YouTube a place for videos. Other examples are services organizing what people have found on the Internet or what they own of specific documents. On del.icio.us you can store, organize and share bookmarks for the Internet. On LibraryThing you
can have a catalogue of your private book selection and allow other users to have a look in your selection. All these services have resemblances to libraries or archives but are organized by the users; e.g. by “social tagging”.

2. Other services operate as places for common knowledge production. Thus the so called user generated wikis. This type of service has been the cause of calling web 2.0 a radical experiment in trust (Maness, 2006). Wikis (e.g. Wikipedia \(^{11}\)) has the resemblance of an encyclopedia but are not necessarily written by experts.

3. A third type works as services of communication, sharing and debating information or commentaries. Thus weblogs – or just blogs – covers a range of genres, from diaries to news services. Blogs are created by journalists, scientists, politicians or just plain people, reporting from their daily life.

Instant Messaging (IM) belongs to the third type. With the exception that chat services is not a new Web 2.0 service but in Internet history an old phenomenon. And with the exception too that a synchronous chat service does not produce persistent documents for storing or organizing (like articles in wikis or blogs). But Instant Messaging resembles Web 2.0 services by other features: it creates virtual communities, it is dialogical and it has become a natural part of that “culture of participation” (Maness, 2006) and dialogical knowledge sharing which are so crucial to Web 2.0. One of Maness’ definitions sounds like this:

“It is a matrix of dialogues, not a collection of monologues. It is a user-centered Web in ways it has not been thus far.” (Maness, 2006)

As a dialogical, synchronous communication program IM is located in the network of communication platforms which has become a part of the daily life of many users. The Internet or the Web ought not any longer to be conceived as a range of sites or as collections of documents to consult for information. Rather it is a network of shared communication, integrated in daily life. Tom Storey writes:

“In Web 2.0, the Web becomes the centre of a new digital lifestyle that changes our culture and touches every aspect of our lives. The Web moves from simply being sites and search engines to a shared network space that drives work, research, education, entertainment and social activities – essentially everything people do. You and your mobile and nonmobile devices – PDA, MP3, laptop, cell phone, camera, PC, TV, etc. – are always online, connected to one another and to the Web.” (Storey, 2006)

Especially the young generations communicate these ways. In this digital, virtual environment they seek and share information. If they don’t meet the Library out there, they probably will not miss it. But if the public library shows up in this new virtual environment, it probably will be welcome. The Aalborg project Need2Know obviously proves that Need2Know in this way can be conceived as an example of Library 2.0.

As to the issue of quality this means that quality and success of the service depends on its smooth integration in the commonly used IM services; i.e. is the librarian able to answer fast and short? Can she communicate in a discourse recognized and acknowledged by the common user (e.g. the teenager)? The communication skills and the social competences will be important. But of course it will not be satisfying only to chat with the youngsters as a virtual friend. An important question will be: Can the librarian be an “IM buddy” and a professional at the same time? It has often been emphasized that in Web 2.0 all users are equal and that knowledge is collaborative. The sinister scenario is that professional

knowledge and skill will not be acknowledged in this environment. A more optimistic point of view will be that seekers of information always will be in need of authoritative and professional answers. The users of Need2Know obviously appreciated the answers from their “Need2Know buddy”. From their comments we can see that they acknowledged Need2Know (and the librarians behind it) as a brand of trustworthy knowledge.

**Library 2.0**

Maness defines Library 2.0 like this:

“This paper defines ‘Library 2.0’ as “the application of interactive, collaborative, and multi-media web-based technologies to web-based library services and collections,” and suggests this definition be adopted by the library science community.” (Maness, 2006)

The term “interactive” may seem vague, but Maness focus on the conversational, dialogical aspect of the web. Library 2.0 develops user-centered services on the web. The users participate in dialogues, feed back, collaborative development of wikis, blogs etc.

The user-centered aspect is so vital that some researchers embrace the opinion that Library 2.0 is not dependent of web-based technologies. “A customer-driven 2.0 environment” can be developed without a web 2.0 technology, write Casey and Savastinuk (2006). In this way the value adding of the library service is grounded on the participation of the users. It resembles “citizen journalism” or “participatory journalism” where the audience participates by writing, reporting, delivering of photos or videos from cell phones etc. In Library 2.0 then, you let the users have “a participatory role in the services libraries offer” (Casey and Savastinuk, 2006).

**Library 2.0 and Need2Know**

From the brief delineation of Library 2.0 we can conclude that the IM service Need2Know can be defined as a Library 2.0 or Web 2.0 service, but only partially.

In some aspects it is a Library 2.0 service: It represents the application of an interactive, dialogical web-based technology to a web-based library service (cf. Maness, 2006). It puts users in the centre. The Aalborg librarians do not define the library service from an institutional perspective. They do not wait for users to become “patrons” and library users but communicate with users where they are in the network. With the help of banner commercials the service moves itself from the traditional librarian-patron dialogue to dialogues in the virtual, digital environment. To day potential library users read, write, work and communicate on several, web-based platforms. Especially to the young generation it is not necessarily the library which is the first choice. If the library means it still has something to offer, the library too must write, communicate and make services “out there” in the virtual environment. The library must be here, there, and everywhere.

In other aspects Need2Know is not a Library 2.0 service. It offers a reference service based on questions and answers. The user asks, the reference librarian finds a proper answer to the question. In a Library 2.0 environment the service probably would be collaborative. A community of users would be involved and contribute to answer the questions, and again we must ask: will the collaborative knowledge sharing make the librarian superfluous? The answer is that the euphoria about Web 2.0 seems like the euphoria about the World Wide Web in the 90’s. Then and now it was claimed that the new information technology enables everybody to find and share information and knowledge without help from experts or libraries. This is only partly true. “Everybody” does not know the best information sources on the Internet. There still is a need for librarians as consultants, i.e. persons who give
professional advice in relation to information search and in relation to best resources. This traditional role of the librarian can, however, be combined with a professional function in the Web 2.0 environment. Here the librarian must not be afraid of involving users as knowledge resources. Some users have knowledge of information resources on the WWW in some fields where the librarian may have lesser experience. Creation of knowledge sharing facilities in relation to IM, blogs, wikis etc. will become a natural part of the librarian’s professional work.

**The librarians’ competences**

As mentioned the Need2Know test finally included an examination and development of the librarians’ competencies in relation to the new media. We do not have an evaluation of this aspect. The librarians required, however, an identification of the necessary competencies in a new technological environment. These are presented below primarily on the basis of research literature in relation to observations and discussions with the project group.

The Aalborg test showed that the librarians’ barriers and reluctance against the test were primarily related to the technology. They were afraid that they did not have the right competences and afraid not to succeed.

In a decade or more we have mainly emphasized the importance of the users’ information literacy/competences by teaching them to be resourceful information seekers. Presently, the focus is directed towards the librarians’ professional qualifications as a consequence of the continuous and rapid change of the technology and its’ derived potentials. Continuous education in new technological advances is obviously needed to keep pace with the users’ demands. Users are familiar with the new sophisticated services on the Internet (web 2.0) and expect the librarians to be so, too (Benson & Favini, 2006). It requires, however, a more up-to-date information and technological literacy level for many librarians even those who had their education only a few years ago. How do librarians improve their literacy? One way to meet the challenge is to get involved in development projects like Need2Know. This will furthermore overcome the resistance against the technology as some librarians expressed their experience with the project. Projects alone, however, do not meet the demands for development of basic qualifications in exploiting and using the technology. A training programme based on the ideas from *lifelong learning* has been developed in an innovative public library in North Carolina. The programme has 23 exercises which the individual librarian can accomplish with the intension of improving his/her literacy level in relation to web 2.0. The programme has been transferred to many innovative libraries since it was presented. It is a realistic and pragmatic way to start the learning process.

Beyond improving the competencies related to the technology, the librarians need to be aware that a test like Need2Know undermines their traditional authority which was based on competences in information retrieval and in evaluation of information resources. Instead they have a new role as a consultant. The user does not ask for help to *search* information but for consultancy or guidance to find meaningful, reliable and relevant information. Sundin (2006) says that the librarians’ job now has its emphasis on analysing and evaluating the information resources and that information searching has been reduced (p. 94). The librarian is in a way at

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12 According to unpublished notes from the project.
the same level as the user and as a consequence they have to find a reasonable, reliable answer in cooperation.

The librarian does not necessarily accomplish a proper reference interview, but the knowledge about the pitfalls in the communication process is, however, continuously crucial for successful answers and the service, as well. The online communication is not comparable to the face to face communication. Research about the details and problems in the online synchronous communication is valuable for the librarians’ education and training and should still be an important part of the basic education in library and information science.

Another focus is the speed related to the service. Luo (2007) has accomplished interviews with chat reference librarians who told that important competences in chat reference / synchronous ask services are “the ability to work under pressure” and “online communication skills” (p.207). They found that they did not receive enough training on these competences. The librarians in the Need2Know test talked about multitasking as a competence. Individual training is necessary.

Finally, we want to focus on a new competence/talent which is openness to show one’s personality in the communication with the user, requested as a consequence of the close contact and the mutual dependence in finding an optimal answer. Krejsler (2005) discusses the change against more individualisation in knowledge-based societies for instance in teaching and guidance to fit the individual needs of the client:

“... the increasing demand that professionals develop individual styles of thinking and acting as professionals, i.e. that they develop the ability to integrate professional demands with their own personality”. (p. 346).

He continues by saying that the professional is increasingly expected to be able to act as “a fellow human being, as well” (ibid.). A list of questions from Need2Know confirms that the librarians were asked about their look and age. Some accepted and gave the answer and some were not ready to give up their anonymity by revealing their identity and personality.

An example from an IM service at University of Pennsylvania is referred to as “librarians making IM friends”. The librarian receives an invitation from the patron, but rejects14. The professional librarian will without doubt be more personally involved in the new services and must therefore be aware of his/her boundaries.

The challenge for the librarians is to combine the traditional competencies as reference interview, evaluation of information resources, etc. with the new requisite competencies related to the social technologies. This means that we need more research about the relation between users and the librarians in the virtual services.

**Future perspectives**

Unfortunately, we have no report on the users’ own experiences with the service. The test was not evaluated, neither by interviews nor by questionnaires. The test was, however, discussed

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and supervised by the project group and two researchers. Furthermore, the project established a blog, which actually was a diary written by the librarians with comments on questions and considerations on answers. Additional information and discussion about the observations and experiences are available in the report (Hummelshøj & Nielsen, 2007).

On this basis we are not able to present conclusions or transferable lessons about the IM Need2Know test. Instead we want to emphasize the necessity of more research about the impact web 2.0 has on the future development of library services in general and virtual “ask” services in particular.

The focus must be on the importance of a proactive library service like an IM service to meet the increasing user expectations in digital services and how this will influence both the traditional and the virtual library services.

Another focus should be on the librarian’s role and competencies in the virtual library environment influenced by the web 2.0, where the librarian seems to be in an even closer contact with the patron than he/she was in the traditional library.

Evaluation of the quality of answers from a library IM service is a third focus. The traditional criteria of quality are challenged by the speed of the answers which has priority to reference interview and thorough evaluation of information resources. The new relation between the librarian and the user in the web 2.0 environment affects certainly the criteria for quality, which are much more than a correct answer. The evaluation of the services’ quality should be related to more differentiated patterns of user needs.

The Need2Know test indicated the continuous need for the librarian on an Internet which is increasingly affected by the social technologies. An exposed and easy accessible service executed by a human librarian could even become in great demand in the future. Libraries and librarians should be accessible not from library web sites alone but from various platforms.

Libraries should also pay much attention to the continuous technological development in order to exploit the diversity in possible ways of communicating with their users, who have different communication habits in different situations and who have different information needs, as well. Sometimes a thorough e-mail communication is preferred and sometimes a more spontaneous communication will be appropriate.

References

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