

Health Libraries as Joint Use Libraries: Serving Medical Practitioners and Students

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ABSTRACT

Libraries, whether medical or healthcare, in higher education (HE) institutions or the National Health Service (NHS), provide services to all types of healthcare students and professionals. Many of these are delivered through contracts, in the form of service-level agreements, between the two key organizations. The challenge to librarians is ensuring that users are provided with access to the resources they need and the skills to use those resources to the benefit of a patient-centered environment. External drivers such as developments in education, a continuously modernizing health service, and new technology have influenced the development of services. Issues regarding the access to electronic information for the different user groups still exist. Librarians have to support the differing user groups, who may have varying levels of computer and library skills, and provide skills training on a wide variety of resources from their own institution and from nationally provided content.

INTRODUCTION

The dual use of health libraries by practitioners and students has been a recognized practice going back many years, although there is very little documentation to support it. What there is often describes the establishment of multidisciplinary library services in UK National Health Service (NHS) Trust hospitals, such as that described by Sue Childs (1996), or partnership arrangements between higher education (HE) institutions and NHS Trusts (Black and Bury, 2004).

Health professionals, both clinical and nonclinical, whether practitioners or students, require access to library and information services through-

out their education, training, and continuing professional development. These services are primarily provided by libraries in the health care and higher education sectors. The changes that have taken place, many of which are still ongoing, in the NHS and in healthcare education in the UK have made major impacts on libraries and on the services they deliver and have raised the expectations of their users.

Medical and other staffs working in the NHS require access to libraries for their day-to-day work, for educational purposes, for research, and for the planning of services. Many professions working in the health service are required to attain further skills and qualifications for career advance. The NHS also undertakes a great deal of primary research, independently or in collaboration with higher education. Information is also essential for management decision making, with the current emphasis on clinical governance.

The education of health professionals primarily takes place within the higher education sector but relies heavily on the NHS for the practical aspects, whereby clinicians often deliver training and students observe and practice. Healthcare education has seen a fundamental change in recent years following the transfer of nurse education into the academic sector, where students can take either a diploma or degree course, lasting three and four years respectively, to qualify as a nurse. Education is provided by universities, with placements in local hospital and community settings. The course is 50 percent practical and 50 percent theoretical. A Common Foundation Programme is followed by a chosen speciality in adult, children's, mental health, or learning disability nursing. Midwifery education is also provided at diploma or degree level, and allied health professionals such as physiotherapists and radiographers follow similar courses. All these students at various stages of their placements will use the libraries of the hospitals to which they are attached.

RECENT CHANGES IN THE EDUCATION OF HEALTH PROFESSIONALS

The education of nurses has seen profound changes. "Project 2000" (UKCC on Nursing Midwifery and Health Visiting, 1987) was introduced in the 1990s to give nurse education a higher academic content resulting in a new diploma to replace the old State Registered Nurse (SRN) and State Enrolled Nurse (SEN) qualifications. This required an amalgamation of small schools of nursing into fewer, but larger, institutions, often in liaison with existing polytechnics. The change from polytechnics to universities in 1992 embedded nurse education more firmly within higher education. It thus became a degree-based profession with training commissioned by Strategic Health Authorities (SHAs), and a portion of the course is based within NHS hospitals. The most recent changes followed the publication of the UK government report *Making a Difference* (Department of Health,

1999), which outlines the government's strategic intentions for nursing, midwifery, and health. One aim was to strengthen nurse education and training. The effects of this change were reviewed by the University Health Sciences Librarians group in a report whose recommendations include that "Library staff from the HE and NHS sectors should work together to ensure adequate library provision for nursing students and those that work with them, at Trust level" and that "Workforce Development Confederations should work with NHS and HE library staff to facilitate and where necessary ensure funding for collaborative working" (Walton, Wakeham, & Gannon-Leary, 2002).

These changes caused other librarians working in both the HE sector and the NHS to be concerned that barriers were being created, so in 2000 the British Library funded a research project to look at cross-sectoral collaboration between the NHS and HE in the field of health care. The aim of the project was "to develop a model which would offer an integrated approach for improving inter-sectoral co-operation in the NHS and higher education sectors to improve access to library and information services for health professionals and students" (Childs & Banwell, 2001, p. 15). It concluded that the hybrid library should provide access to electronic and print resources and physical space for study and use of information technology (IT).

The education of doctors is a continuous process. Medical school courses normally last five years, or four for graduate entrants and a year as pre-registration house officers. This is followed by training in the particular speciality chosen by the doctor. The latest developments in undergraduate medical education and the introduction of new curricula followed the publication in 1993 of *Tomorrow's Doctors* (General Medical Council, 2003). This was subsequently revised and laid the foundation for a fundamental change in the way medical students were to be taught, with the emphasis shifting from the acquisition of knowledge to the learning process, including the development of skills to communicate effectively with patients. The emphasis in curricula on problem-based learning (PBL) and informatics has meant libraries also need to review the way they deliver information skills training. A survey conducted amongst medical school librarians concluded that they are likely to be more heavily involved in both the planning and teaching process (Murphy, 2000). It is necessary to teach basic information retrieval skills to enable students to locate and access the material they use in the problem-based case studies that begin in the first year and continue in most curricula until the fourth or fifth years. Current challenges include the need for students to be able to search for, appraise, and use the best available evidence, including the ever-expanding resources available on the Internet.

Following the publication of *Tomorrow's Doctors*, UK medical schools have been reviewing their curricula, their learning resources, and their teaching

methods to ensure they meet the General Medical Council's demands. A shortage of doctors in the UK has been met by an increase in student numbers, either by a rise in the student intake at established medical schools or by creating new medical schools such as the Peninsular and Brighton and Sussex medical schools (HEFCE, 2001). In other parts of the UK, joint medical schools have been established with existing institutions, such as Newcastle/Durham (Harbord & MacFarlane, 2002) and York/Hull.

CHANGES IN NHS STRUCTURES

The NHS has not stood still either. Continuing reorganization has seen the structure of library provision change, expand, and move toward a service provided both locally and nationally. The establishment and expansion of postgraduate medical centers in the 1960s and 1970s led to the development of regional library networks. Today the network, based on Strategic Health Authorities, coordinates NHS library services throughout England. Since the mid-1990s a number of government reports and strategies have been published, starting with *Working for Patients* (Department of Health, 1989) and followed by *The National Health Service: A Service with Ambitions* (Department of Health, 1996), *The New NHS: Modern, Dependable* (Department of Health, 1997), *Information for Health* (Department of Health, 1998), *Health Service of all the Talents* (Department of Health, 2000), *Building the Information Core* (Department of Health, 2001), *Funding Learning and Development for the Healthcare Workforce* (Department of Health, 2002a) and *Making Information Count* (Department of Health, 2002b). Although not explicitly, these reports have been important drivers in influencing the context in which library services are provided, especially in supporting clinical governance and evidence-based practice. For libraries the 1997 Health Service Guidelines (NHS Executive, 1997) for Library and Information Services laid down the key concepts that are a "key resource for clinical effectiveness, for research and for training and education."

Without doubt one of the most important developments has been the emphasis in healthcare on evidence-based decision making, supported and promoted by government policy. It has led to librarians reviewing their role in information handling and information skills, especially to support systematic reviews and critical appraisal (Palmer, 1996, 2000).

THE LIBRARY AND ITS USERS

Within the higher education context, the key groups of users of medical libraries are undergraduate medical students, taught course and research students undertaking master's and doctorate programs, and academic research and teaching staff, all of whom will be members of their respective institutions. In addition, there will also be students on placement, the biggest group being nurses, who are attached to an NHS Trust for the practical element of their course but members of another higher education institu-

tion, and all the staff of the associated NHS Trust—doctors, nurses, allied health professionals, management, and support staff. In addition there will also be staff from other local Primary Care and Mental Health Trusts. In NHS libraries the groups are very similar, with the NHS staff belonging to the parent organization and students on placement, including medical students.

Library Funding

Funding for health libraries is still a complex issue. Higher education institutions are funded through the Higher Education Funding Councils (HEFCE) with additional funding for research-based libraries to facilitate access for postgraduate students and other research staff. NHS libraries are funded through their Strategic Health Authorities through MADEL (Medical and Dental Education Levy) and NMET (Non-Medical Education and Training) levies. In addition, trusts that support undergraduate medical students receive SIFT (Service Increment for Teaching) funding from academic institutions, although in the past it was often not clear if any of this funding was included in library allocations.

Academic libraries that provide library services to the NHS are usually funded through contracts between the parent institution and its associated NHS Workforce Development Confederation. A recent survey undertaken by SCONUL's (Society of College, National and University Libraries) Advisory Committee on Health Services (2003) reveals that nearly half of the contracts were negotiated without direct involvement of the library; the range of the value of contracts is great; and a significant number of contracts are based on service-level agreements. A service-level agreement will specify the type and level of service to be provided and which groups of NHS staff it covers. The survey found that many contracts were for three or fewer years.

Resources

The new curricula developed by medical schools have meant librarians are rethinking their approach to the provision of resources. Student numbers are large; for example, Imperial College London's annual intake is 326. With the course taking six years, the total medical student body numbers nearly 2,000. Textbooks are still an integral requirement, and Imperial has refined its annual call for reading lists to ensure lists are submitted, core texts are correctly identified, and the requisite number of individual titles purchased. The inclusion of problem-based learning cases as part of the course requires students to use a wide range of materials—textbooks, journal articles, and Web sites. The material has to be available for the period the case is being studied; therefore, it is essential for a system to be in place so that students have easy access to it.

The use of the physical library by research staff is decreasing, as more of the library resources they use are being made available electronically.

Substantial investment is being made in the purchase of electronic journals to provide access to current and archival material. Academic libraries spend a large proportion of their annual budgets on these purchases. Until the introduction of networked electronic resources, as far as possible the majority of users registered with a medical library were given equal status and access. However, the transition to the electronic environment has raised a number of issues regarding access. The majority of publishers' licenses for their products allow remote access by members of the institution, which has purchased the product, and walk-in access for nonmembers. This has led to a two-tier system whereby NHS staff have to visit the library to access electronic resources and may not be able to access products that do not allow walk-in access. In some cases to enable NHS users to have remote access to core material, libraries have purchased e-resources for specific user groups. The issue of nonacademic staff using the academic network is largely resolved. What still requires a solution is remote access by NHS users to academic resources. At present the two communication networks, NHSNet and JANET, do not allow two-way traffic between them. A common solution is for an academic working in an NHS environment to have two computers, one for each network.

One notable difference of library use between academic users and healthcare practitioners is the latter's continuing use of print resources. Whereas major academic libraries are providing a large proportion of journals in electronic full-text, the provision of print titles is still required in libraries serving medical and healthcare staff.

A fundamental change to the provision of information to the healthcare profession started with the establishment of the National Electronic Library for Health. In 1998 the NHS Executive published its new information strategy, *Information for Health* (Department of Health, 1998). The strategy set out national plans and targets for using current and developing information and communication technologies locally to achieve better and more consistent patient care (Fraser, 1999). It also announced the creation of the National Electronic Library for Health. This was reemphasized in *Building the Information Core*, which states:

The NHS must be a major provider of information services in support of care services, working with carefully selected partners to provide a range of information to patients, clinicians and others . . . The public and NHS staff will be able to access information on local care services and how best to use them through nhs.uk and evidence-based information and clinical guidelines through the National Electronic Library for Health (NeLH). (Department of Health, 2001, p. 4)

Amongst the resources it provides access to are a number of core databases such as Cochrane and PubMed.

In 2002, the health service librarians group Library and Knowledge Development Network (LKDN) established a working group to look at the

feasibility of purchasing a number of databases and full-text journals for the NHS libraries in England. This led to a project to establish the National Core Content Collection, and bids were submitted from a number of major suppliers. Dialog was chosen as the provider of databases and ProQuest as the provider of full-text journals. Thus, there are now two key resource groups—one provided by the academic institution and the other by the National Core Content. A similar consortial purchasing initiative in Scotland has led to the establishment of the NHS Glasgow e-Library (Davies & Wales, 2001). In an ideal world, all healthcare students, whether doctors, nurses, or allied health professionals, would use the same resource platforms from the start of their education and then throughout their working lives. At the time of writing there is no academic institution in the UK that has bought into the National Core Content. This is a key issue for academic medical librarians. They have to provide information literacy skills training to undergraduate medical students and to NHS staff, and provide support for students on placement, often using different versions of core databases.

This has implications for the training that the library staff have to undertake for themselves in order to gain the knowledge and experience needed to teach in information skills programs. Another outcome is that several of the resources are duplicated. This dual provision and noninteroperability of the two networks has long been recognized as a barrier to the equity of library user entitlements, and in 2001 the NHS/HE Forum was established to review this situation. The forum itself concentrated on identifying technical solutions to access problems between two networks, and in 2004 a Joint Information Systems Committee (JISC) funded post was created to implement the solutions. A subgroup of the forum was established to look at content. In 2002 the Content Group commissioned a study “to explore existing barriers [in the areas of funding transparency, eligibility to use resources and access, copyright and licensing issues, and administrative complexities] to seamless library and knowledge services across the NHS and HEIs and to recommend solutions, courses of action and pilot projects to improve knowledge access and encourage best value in both sectors” (Thornhill, 2003, p. 4).

The outcome is the report *Users First: Removing Barriers to Knowledge Access Across HE and the NHS* (Thornhill, 2003). It made ten recommendations and suggestions for further projects. Two of these projects have been scoped: one a user needs analysis for the UK NHS and NHS-HE interface, and the other an information literacy curriculum for users of NHS and HE library and knowledge services, for which funding is being sought to take work forward. A positive development has been the establishment of a Joint NHS-HE Procurement Group by JISC, whose goal is to procure one common piece of content jointly across the NHS-HE using a common license; negotiations are currently taking place with two publishers. The work of the forum and the Content Group highlights the need to build

relationships with funders, government departments, and NHS and HE stakeholder communities.

Provision for NHS users will vary depending on the type of institution providing the service. Trust libraries, the successor to postgraduate medical libraries, based within a hospital, will structure their services and resources to meet the needs of their users. Those who have contracts to support undergraduate medical education also have an obligation to provide basic resources such as core textbooks. This requires collaboration with the associated medical school library to ensure exchange of information in such areas as reading lists, teaching material, and information literacy support. At Imperial College this is achieved through regular communication between the team leader (medicine) and the librarians of the associated trust libraries in West London in the form of regular meetings and an annual meeting of the senior medical and trust librarians.

Services

With such diverse groups of users, library services need to be tailored to individual needs and expectations. Libraries provide the traditional services—loans, interlibrary loans, document delivery, and photocopying. There may be differing allowances or charges depending on user group, but where possible all users are treated equally.

Today greater emphasis is placed on ensuring library users are able to make full use of library resources. Promotion and marketing of library services is a key first step using a variety of methods, from well-designed library Web sites, to promotional leaflets and posters, drop-in sessions, induction talks, library open days, and a stall at freshers fairs. In November 2004 the first National Health Libraries week was run to promote library services to NHS staff, with many libraries undertaking innovative initiatives.

One area that is the most developed in medical and healthcare libraries is the provision of user education. Medicine and health have been well served for many years with bibliographic databases and more recently with electronic full-text journals, electronic books, and Internet resources. These do not come from just one provider but from many, so the challenge for librarians is to provide users with the skills not only to be able to search resources but to determine which one is best for their specific enquiry and how to evaluate the content. Librarians are also major supporters of evidence-based practice, assisting clinicians and others to make optimum use of information (Palmer, 2000).

The challenge for medical librarians in higher education who are involved in delivering skills training through information literacy programs is the range and depth of training they must provide for the different user groups, from new medical undergraduate students who are familiar with computers and the Internet but not library resources, to healthcare students and workers who many not be computer literate or familiar with

the Internet, to clinicians with very specific patient-centered demands, to research staff who require exhaustive literature searches. Library staff have to be knowledgeable and expert in using not only the resources provided by their own institution but also the resources within the National Core Content and the Internet. Recent developments in Web-based support for learning to use software such as WebCT and Blackboard are providing libraries with new methods of delivering and supporting information literacy programs. The introduction of library portals, it is hoped, will encourage users to make better use of library resources and not to rely on generic search engines such as Google to find information.

THE FUTURE

It is difficult to predict with any certainty what will be the next areas of development, but it is inevitable that joint use of health libraries will continue to develop. The issue of connectivity—removing the barriers as indicated in the *Users First* report (Thornhill, 2003)—is high on the agenda for both the NHS and HE, as is having licenses to electronic resources with the same access rights for both user groups. Outreach programs and clinical librarianship in the NHS are gathering momentum but as yet are not well developed in the HE environment. Libraries in both sectors are creating literacy skills modules to support student learning. HE is embracing e-learning based on interactive learning programs using software such as WebCT or Blackboard, and within the NHS there are plans to continue some of the initial work undertaken by the NHS University, which provides learning and development opportunities for everyone working in health and social care. The concept of the hybrid library will continue. Libraries in the higher education sector are developing new services to offer seamless access such as library portals using proprietary software, whereby a library's electronic resources can be searched using a single interface. As part of the new National Library for Health, which will develop an integrated library service for the NHS, work is ongoing on a single search engine for the electronic resources currently provided through the National Electronic Library for Health.

Developments in both the NHS and HE, therefore, will impact health libraries in the future as they have done in the past. Staff working in these joint use libraries need to take account of new initiatives and direction in both sectors in order to serve their two key user groups equally effectively.

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