



www.eahil.eu

Journal of EAHIL

European Association for
Health Information and Libraries

Vol. 12 no. 1

March 2016

ISSN L-1841-0715

The production of this journal
was made possible by the generous support of:

EBSCO Information Services
Thieme Verlag

Thieme Clinical Suites – Helping you obtain clinical information more efficiently than ever before.

The Thieme Clinical Suites are state-of-the-art multi-media platforms in clinical medicine. They currently cover four subject areas, Neurosurgery, Spine Care, Otolaryngology and Radiology. These powerful platforms enables users to search for procedures they want to brush up on, confirm references for their writings, find visuals for presentations, and much more!

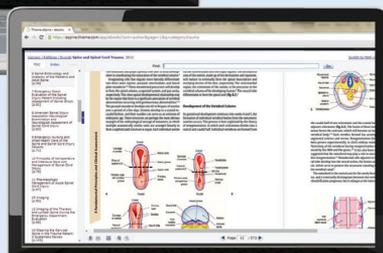
For more information please visit: www.thieme.com/clinical-suites



Thieme eNeurology

Thieme eNeurology provides access to Thieme's complete market-leading neurosurgery program.

www.thieme.com/eneurosurgery



Thieme eSpine

Thieme eSpine is a unique online resource providing access to Thieme's entire spine collection.

www.thieme.com/espine



Thieme eOtolaryngology

The premier online resource for otolaryngology – head and neck surgery, Thieme eOtolaryngology is a unique online resource providing access to Thieme's entire ENT and Head & Neck Surgery collection.

www.thieme.com/eotolaryngology



Medlantis

This new product gives you access to Thieme's entire radiology collection along with videos of classroom lectures on key topics in radiology, created in co-operation with the University Health Network of Toronto.

www.thieme.com/medlantis

The Americas

Thieme Institutional Sales
E-mail: esales@thieme.com
Phone: +1-212-584-4695

Europe, Africa, Asia and Australia

Thieme Institutional Sales
E-mail: esales@thieme.de
Phone: +49-711-8931-407

India

Thieme Institutional Sales
E-mail: eproducts@thieme.in
Phone: +91-120-455-6600

Thieme Connect

The online platform for medical & chemistry knowledge

E-Books · E-Journals · E-Learning · Clinical Suites · Reference Works



www.thieme-connect.com

Journal of the European Association for Health Information and Libraries

Vol. 12 No. 1 March 2016

CONTENTS

EDITORIAL

Letter from the Editor in Chief - *F. Napolitani* 2

COMMENTARY

What is the difference between a filter and a hedge?
S. Campbell 4

Feature Articles

Increasing transparency for e-journal subscriptions and Big Deals.
A comprehensive assessment of e-journals in Science, Technology
and Medicine (STM) 6

M.F. Schaffer, I. Kirgus and G. Bissels

Job-shadowing
Swiss health librarians observing experienced search specialists and
information skills trainers in London 10

D. Kopp-Heim and B. Minder Wyssmann

Information needs of the public health workforce in 2015 14

E. Hughes, H. Korjonen, A. Keswani and J. Ford

iPads as digital platform for medical study: The SAMR model for
mapping impact 19

M. Hamilton and T. Bird

On the importance of being a data-savvy librarian 24

A. Barbaro

Library impact, value and marketing: how do they fit together? 28

J. Turner

Evidence-based decision making when refurbishing a medical library:
a shorter way to better decisions? 31

R. Küfner Lein and M. Mühlburger

Qualitative research methods: interviewing as a way of learning and knowing
J. Rivano Eckerdal 36

NEWS FROM EAHL

Letter from the President
M. Dozier 42

NEWS FROM EAHL SPECIAL INTEREST GROUPS

MeSH: what's new for 2016
A. Ceccarini 47

NEWS FROM MLA

US Medical Library Association report for EAHL
C. Lefebvre 48

NEWS FROM ICAHIS

Early invitation to ICAHIS 9, 2017, Budapest
É. Orbán 51

NEWS FROM NLM

National Library of Medicine report for EAHL
D. Babski 53

TAKE A LOOK!

Collected during September to October 2015
B. Thirion 55

EMERGING CHALLENGES

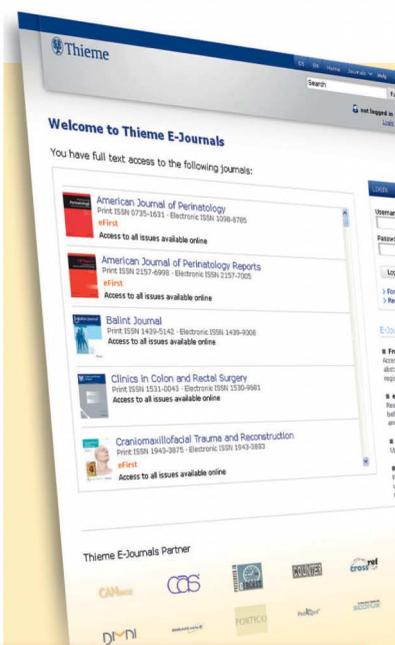
S. Stamford 60

PUBLICATIONS AND NEW PRODUCTS

L. Sampaolo 62



Get connected!



Thieme E-Journals

The Quality Choice in
Medicine and Science



For more information and
a trial access, please contact:

Thieme Institutional Sales
eproducts@thieme.de
Tel.: +49 711 8931 407





A new year ahead

Federica Napolitani

Editor in Chief

Istituto Superiore di Sanità, Rome, Italy

Contact: federica.napolitani@iss.it

Dear EAHIL friends,

I am thrilled to present this first issue of 2016 which contains eight excellent articles on topics of both great interest and practical use for all librarians and information specialists.

Usually, the first issue of the year hosts articles on various topics rather than a section dedicated to a specific theme. I will not conceal that we have had some difficulties in the past in finding articles for publication in no-theme issues, however this year I was pleasantly surprised in noticing we actually had the opposite problem; an abundance of items provided for our journal. This is a clear indication of the growing interest in *JEAHIL* and of the members of the Editorial Board's passionate work. To each of them I extend my gratitude, in particular to our newest member of the group: Gerhard Bissel.

We worked so well together! To quote the beautiful words of Letizia Sampaolo, who writes the column on publications and new products: "One of the greatest blessings to a leader is to have that team pull together and support each other."

A new aspect found in this issue is the presence of a Commentary (by Sandy Campbell). It is a space provided for discussion and comments on current topics as well as themes reported in previously published articles. We would love for it to become an integral part of the journal, to receive letters and, why not, open a variety of other columns, such as one dedicated to EAHIL history. It would be fantastic to reprint pages of the old newsletter, photographs and memories of past conferences and events.

We are in an important period for EAHIL because of the upcoming voting, as Marshall Dozier informed us in her Letter from the President:

"Elections for President and Board will happen in the next few months, and outcomes announced at the General Assembly in Seville. Please see the dedicated pages in this issue for information on nominations and voting. The new terms for newly Elected members will begin in January 2017. Later this year, we will have nominations and voting for Council members for each country where there are vacancies. The outcomes will be announced in late autumn and the new Councillors will begin their term in January 2017. We hope to receive a nomination form from you!"

Everyone who is involved in this professional association, a setting that has become for many of us similar to that of a large family, is called to give his own contribution.

Within the forthcoming issues of *JEAHIL* there will be a small change. Gerhard Bissels has proposed a monographic section on a topic of great impact "Education and training for medical librarians". It has been decided that it will be published in December 2016, moving the "Open Access 2: Research data" theme issue to the next year.

Please find below the updated Table

JEAHIL next issues:

2016

Issue	Theme	Deadline
2 - Open science 1: Open access		5 May
3 - Memories from Seville Conference		5 August
4 - Education and training for medical librarians		5 November

2017

Issue	Theme	Deadline
1 - No-theme, Deadline		5 February
2 - Open science 2: Research data		5 May

So, as you have seen, the next issue of the journal will be on Open Access. Members of the Editorial Board Fiona Brown and Katri Larmo will be the Editors of this theme issue. If you wish to contribute with your paper, do feel free to contact them. Their email addresses are: f.brown@ed.ac.uk; katri.larmo@helsinki.fi

Last but not least, I would like to announce the winners of the two scholarships awarded for the best articles published in 2015.

One award was assigned to the best Workshop Report published in issue n 3, 2015, dedicated to the Memories from the EAHIL+ICAHIS+ICLC Workshop Research-Minded: understanding, supporting, conducting research, 10-12 June 2015, Edinburgh, Scotland.

The second scholarship was awarded to the best paper published in the other issues (n 1, 2 and 4) published in 2015. The evaluation committee has declared that the winners are:

1. M.J. Foster. An overview of the role of librarians in systematic reviews: from expert search to project manager (*JEAHIL* 2015;11(3):3-7);
2. M. Toro-Troconis, C. Morton, T. Bennie, C. Leppington, A. Hemani, M. Lupton
Design, development and implementation of a mobile learning strategy for undergraduate medical education (*JEAHIL* 2015;11(2):14-20).

Congratulations to the winners, and a big thank to the evaluation committee for evaluating the 32 feature articles published in 2015.

To you all..... a lovely start to spring!
Federica

What is the difference between a filter and a hedge?

Sandy Campbell

John W. Scott Health Sciences Library
University of Alberta
Edmonton, Alberta, Canada
sandy.campbell@ualberta.ca

Abstract

Tracing the history of the naming of saved searches, this commentary proposes the use of two terms: filters and hedges.

Key words: search filters, search hedges.

Over time many different terms have been used by searchers to describe stored searches: pre-made searches, stored searches, saved searches, canned searches, saves, filters, hedges, and now, search blocks. De Jonge and Lein, in their paper “Sharing literature search blocks: status and ideas for a cooperative solution”, appear to have created the term “search block” to represent all kinds of stored searches apart from “filters” (1). Presumably a “search block” refers to a block of text that one could copy and paste into a database search box, analogous to the concept of a “text block” from the context of word processing (2). If this is the intended meaning, the term does not encompass the many useful stored searches that have been published in articles or on websites as text that must be retyped into a database.

The term “hedge”, has existed in the literature since at least 1977, roughly the beginning of mediated online literature searching in libraries, when Funk described a “hedge” to be used in “SDILINE and the storesearch capability of MEDLARS” (3). In 1980 Dolan credited the development of the hedge concept to the Medlars Management Section of the National Library of Medicine (4). She speculated that “it was because Medlars used tree structures that ‘hedge’ was chosen to define groups of related terms that occurred across all trees”, carrying on a vegetation theme.

Dolan distinguished between saved searches or “saves” and hedges. She defined “saves” as being

“concepts that will remain constant and will be used in a majority of searches...concepts such as age groups, grade levels, sex, race and nationalities”. In contrast, she defined “hedges” as “groups of terms representing concepts which occur frequently in the search requests, but not always in the same way... [and] combine terms which are synonyms, variant spellings of the same term or terms that are related in some other way”. The term “hedge” and the practice of storing searches for later use caught on. Early database providers charged searchers to store their searches, so before there were site-licenced databases, with simple and free ways of storing and re-using searches, searchers kept “hedge books”, where they wrote down the searches that they expected to re-use (5).

The searches that Dolan described as “saves” would now be called “filters”. One needs to look no further than PubMed, to see Clinical Queries identified as filters. De Jonge and Lein distinguish “filters” from their “common literature search blocks” saying that “[f]ilters are a type of search block developed for specific purposes e.g. finding studies within a clinical concept, like diagnosis, prognosis or therapy”. There is a functional difference between a stored subject search (Dolan’s hedge) and stored searches that are used to restrict subject searches to specific clinical concepts, geographic regions, study methods or population groups (Dolan’s save). However, the terms “search hedge” and “search filter” are often used interchangeably. McMaster University’s page

Address for correspondence: Sandy Campbell, John W. Scott Health Sciences Library, University of Alberta, Edmonton, Alberta, Canada T6H 5L8. E-mail: sandy.campbell@ualberta.ca

What is the difference between a filter and a hedge?

entitled “Hedges”, describes “investigat[ing] ways to develop and harness search filters (“hedges”)” (6). In 2014, Beale *et al.* wrote “Search filters or hedges are search strategies developed to assist information specialists and librarians to retrieve different types of evidence from bibliographic databases” (7). However, the expert searcher community can use both of these terms to good purpose. Instead of creating new terminology, the term “filter” can continue to be used to represent the stored searches that are designed to extract articles with specific characteristics and the term “hedge” can be used, as Dolan originally defined it, to represent stored subject searches.

REFERENCES

1. de Jonge G, Lein R. Sharing literature search blocks: status and ideas for a cooperative solution. *Journal of EAHIL*. 2015;11(3):11-4.
2. Block [Internet].; 2016 [cited 02/07/2016]. Available from: <http://www.webopedia.com/TERM/B/block.html>.
3. Funk ME. An SDILINE profile oriented to patient care. *Bull Med Libr Assoc*. 1978 Apr;66(2):223-7.
4. Dolan DR. Hedges for online searching. *Database*. 1980 Mar 1980;3(1).
5. Klatt MJ. An aid for total quality searching: developing a hedge book. *Bull Med Libr Assoc*. 1994 10;82:438-41.
6. Hedges [Internet]. 2015 [updated 10/19]. Available from: http://hiru.mcmaster.ca/hiru/HIRU_Hedges_home.aspx.
7. Beale S, Duffy S, Glanville J, Lefebvre C, Wright D, McCool R, et al. Choosing and using methodological search filters: searchers' views. *Health Information & Libraries Journal*. 2014 Jun;31(2):133-47.

Increasing transparency for e-journal subscriptions and Big Deals. A comprehensive assessment of e-journals in Science, Technology and Medicine (STM)

Michelle F. Schaffer, Isabelle Kirgus and Gerhard Bissels

Bern University Library, Bern, Switzerland

Abstract

The University library of Bern carried out a one-year survey of the frequency of use, cost and cost-per-article-use (CPU) of its e-journals. The collected data allows a comparison of journal bundles and individual subscriptions. The results show that the CPUs for Big Deals are in an acceptable range; however because of their high cost they limit the library's flexibility to provide user-oriented resources.

Key words: evaluation of e-journals; Big Deals; e-journal usage; science and medical research.

Introduction

Bundled sale of electronic journals

As libraries have moved away from print toward electronic formats several commercial and non-profit publishers offered new licensing models that allow access to multiple journal titles for a fixed price. The term “Big Deals” is used for bundled access to journals sold as a unit for one price (1). These 2-3 year contracts have a built-in annual price increase of about 6% (2). The cost is composed of expenditures for journals to which the library previously subscribed (“core titles”), an access fee, and low charges for online access to previously unsubscribed journals (“collection titles”) (3, 4). Kenneth Frazier predicted that even the conditions of Big Deals are attractive for individual university libraries; on the other hand libraries would not be able to sustain the annual increases of such arrangements (3). In general “Big Deal” journal subscription packages are cost-effective, but they consume a large portion of a library's budget and limit its flexibility to purchase other resources (5). In addition, “collection titles” are excluded from archive arrangements in the event of a cancellation of the deal.

Motivation and study goals

For the last approximately 15 years the University library of Bern has been tied to journal packages that limit the flexibility in the selection of titles. The

contracts often force the library to retain subscription even if the composition of the packages does not meet the actual needs. The decision to enter into a bundled arrangement is usually taken after a thorough cost/benefit analysis to see whether the arrangement justifies the expenses. The decision to renew an existing license should be taken with equal care. The 3-month project aimed to verify the relevance of the e-journals in relation to the costs for the Science, Technology and Medical (STM) areas. The evaluation increased the transparency and enabled us to regain control over the composition of our e-journals collection. It allowed us to make economies in order to safeguard future access to e-journals in line with the research and education needs of the University. Further, the annual increase of such arrangements exceeds the normal growth of the media budget and forces the library to find ways to stabilize its expenditure. The STM disciplines are most affected by the increasing costs which limit their ability to purchase additional resources. Funds freed up through the evaluation of current subscriptions could then be used to purchase e.g. missing required textbooks for students. For the first time subject librarians in the STM area got an overview of the content of the bundled arrangements. The survey forms the basis for further decisions and supports the exchange of the topics with the faculties. A second goal we pursued was renegotiations of subscription costs and conditions with the publishers.

Address for correspondence: Michelle F. Schaffer, Bern University Library, Münstergasse 61, 3008 Bern, Switzerland. Tel. +41 (0)31 631 92 96. E-mail: michelle.schaffer@ub.unibe.ch

Increasing transparency for e-journal subscriptions and Big Deals

Data gathering and proceeding

First a detailed recording of data for 2014 was carried out to analyse in a second step the data on the level of CPU. The metric CPU is common in US libraries for the evaluation of Big Deals, however in Europe this method is rarely used. The evaluation was conducted on the level of the mode of licensing (deal-level metrics) and the level of the single journals (journal-level metrics) (6).

Collected data are cost, uses, data preservation, CPU, mode of licensing, publisher, long-term preservation, assignment to individual disciplines, ISSN, URL and journal name.

A professional tool or method for the efficient quantitative and qualitative data gathering and analysis is still missing. The Electronic Resources Management (ERM) contains metadata and some additional information. However, several other sources were consulted to collect data on different excel sheets that were finally matched with each other. COUNTER reports are the standard for measurement of use (7). The Successful Full-Text Article Request (SFTAR) was taken from the COUNTER Journal report (J1). Data for uses are often missing, because the small provider does not offer surveys of the uses values.

In order to make the evaluation comparable, the relative uses were calculated, taking into account the number of journals per discipline or licensing model.

Cost were either taken from ERM or individual institute libraries were asked for their payments for subscribed journals.

Results

Comparison of different licence models in the STM area

We divided the different licensing models in small packages (mostly non-profit publishers), the 3 Big Deals (Elsevier, Springer and Wiley-Blackwell) and individual subscribed journals. With 89.5% the bundled arrangements have the highest portion in journal titles; therefore the 3 Big Deals by far outweigh single-title subscriptions. However, the Big Deals recorded only 29% of all uses. The journals of the small bundled sales of the non-profit publishers are frequently used and reflect the high quality of the journals that are often assigned to one specific discipline (Figure 1).

Distribution of the e-journals to individual subjects

The journals of the STM area were classified into 15

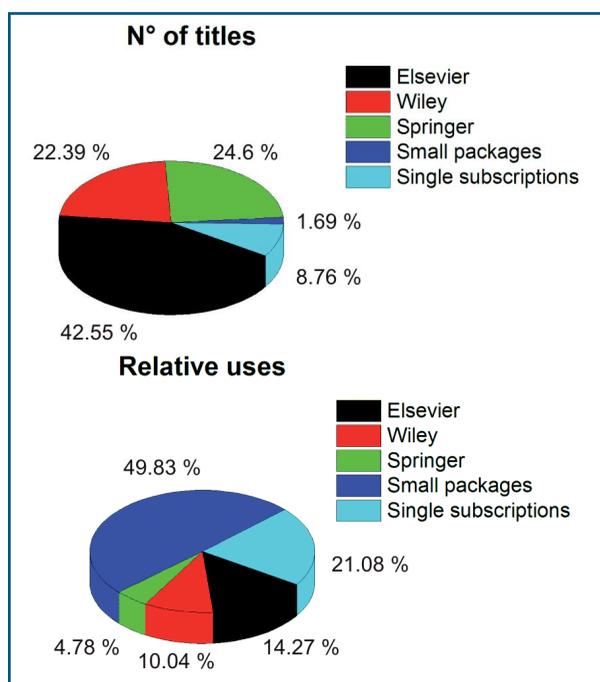


Figure 1. Comparison of number of titles and relative uses for Big Deals, for bundles of non-profit publisher and single subscriptions.

disciplines which we defined ourselves. The analysis considers the individual e-journal subscriptions and the “core titles” of the 3 Big Deals. We observed that the number of journal titles subscribed to roughly corresponds to the number of academics and students in a discipline, with the highest number of journals in the medical area (28.7%) and less journals in the area of plant science and veterinary medicine (1.5%, each) (Figure 2). About 50% relative use are generated by the general Science journals due to a few highly popular titles such as Nature, Science and PNAS. The Veterinary Science shows the highest relative use (15%)

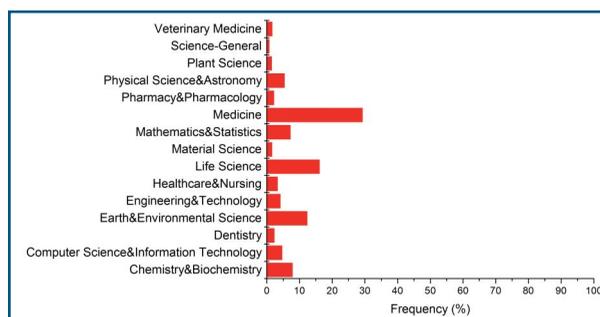


Figure 2. Distribution of the number of titles on individual subjects.

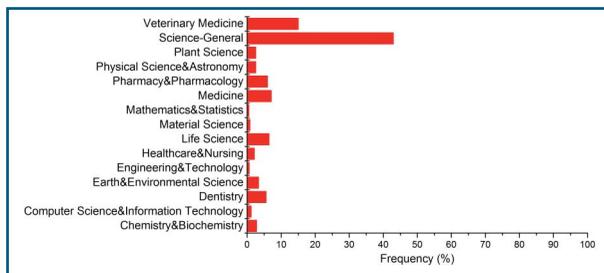


Figure 3. Distribution of the relative frequency of use on individual subjects.

within the individual disciplines (Figure 3). The Exact Sciences have a low relative usage frequency and we observed a high CPU between 20-40 Swiss Francs (~20 – 40\$). Carolina Consortium recommends a detailed analysis of these titles with CPUs over 20\$ (8).

Evaluation of the three Big Deals for all disciplines

In a second step, the study of the Big Deals was expanded to all disciplines. Around 83% of the journals are the “collection titles”. Those “collection titles” selected by the publisher are often swapped for others. Hence, the library has permanent access only to the 17% self-selected titles. The study showed that there are large differences between the individual disciplines. 40% of the e-journals are assigned to Medicine (26%) and the Life Sciences (14%). A high frequency of use was observed for journals within the disciplines of Medicine, Economics, Psychology and Education, whereas journals in the Exact Sciences had high costs and low usage. The low usage numbers are caused mainly by the “collection titles” with an average frequency of use of 30% (Figure 4). There is no match between costs and usage even for the “core titles”. Despite higher usage compared to the “collection titles”, usage does not justify the costs (Figure 5).

Conclusion and next steps

The evaluation increases the transparency in costs, frequency of use and options for long-term preservation. In addition, the evaluation demonstrates the necessity to optimize the product management and the regular evaluation of usage data for the subscribed e-journals. Only 16% of the titles in the STM area have more than 1000 successful full-text article requests per year and in particular journals in the Exact Sciences

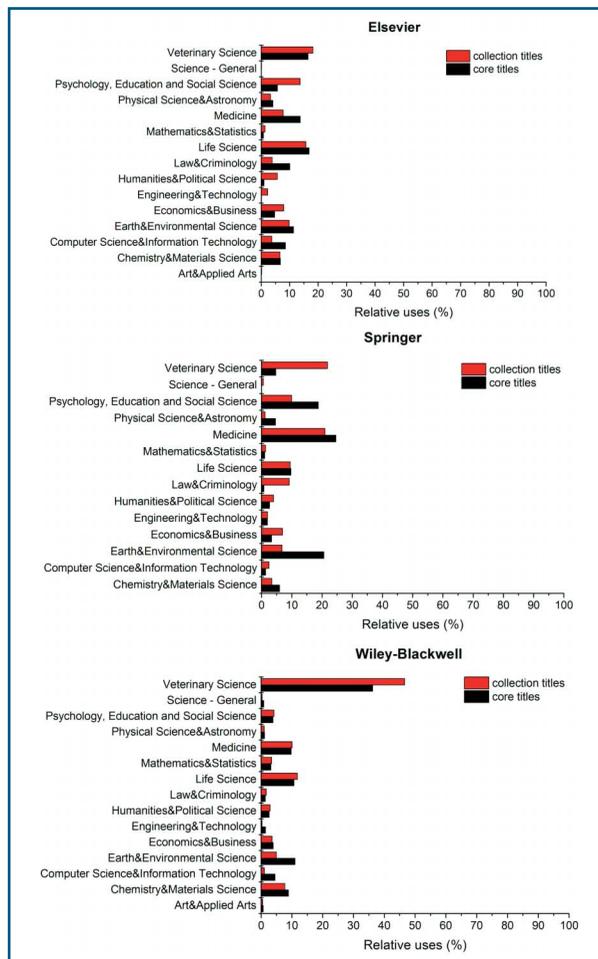


Figure 4. Relative use for the individual disciplines divided in “core titles” and “collection titles”.

have high CPU. This indicates that there are many expensive journals for specific research topics within a small user community. Small packages of non-profit publisher’s show a five times higher frequency of use than the Big Deals and are 2 times more often used than individual subscriptions (Figure 1). Therefore these results are important indicators of the relevance of the journals for the research groups and students at the University of Bern. It facilitates any decision concerning agreements with publishers. The Big Deals have the highest portion of e-journals in the STM area. However, these bundles contain mainly poorly used “collection titles”. Only the “core titles” chosen by the University of Bern are frequently used. Southern Illinois University Carbondale (SIUC) and the University of Oregon library cancelled the agreements with the three Big Deals and negotiated new licenses in 2009 and 2010.

Increasing transparency for e-journal subscriptions and Big Deals

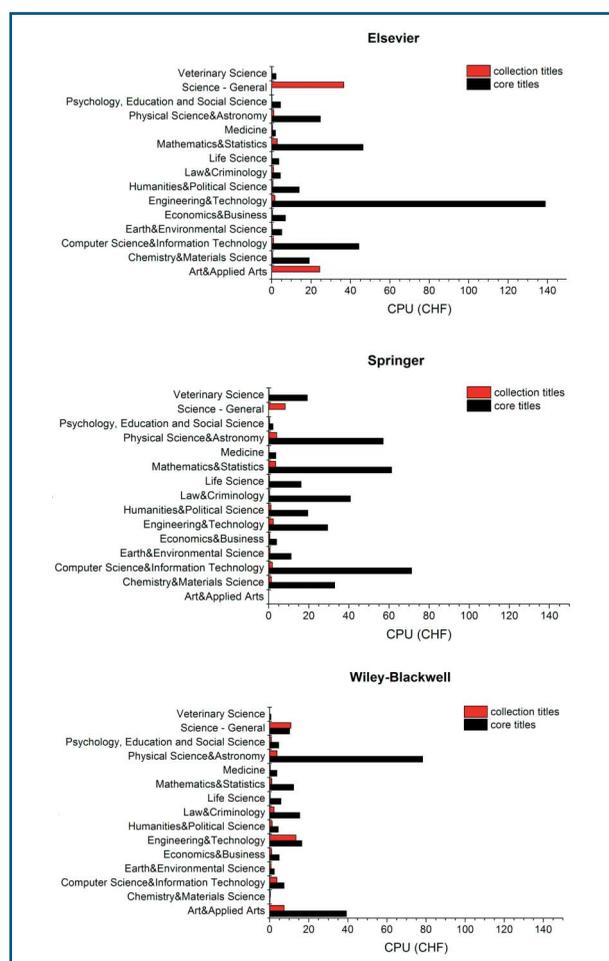


Figure 5. CPUs of the Big Deals for different disciplines divided in “core titles” and “collection titles”.

Recently they drew the consequences and took the decision to leave the Big Deals. The number of interlibrary loan requests increased, however demand for content from non-subscribed journals previously available via the Big Deal is significantly less than expected. Only a small percentage of purported demand translates into interlibrary loan requests. In conclusion they had several stable years of collections budgets and regained the crucial impact of the library on the collection, without affecting the research efforts (9).

Concrete actions at the University library of Bern are difficult to determine partly due to the limited flexibility in renegotiation of the strict and complex contracts with publishers. However, there are two ways for further steps. First, the decision for the continuation of individual subscriptions is not tied to multi-year contracts and can be done individually by

the subject area after consulting the research groups concerned. However, cancellation of the contracts with Big Deals requires alternative ways to get access for required articles and requires a detailed quantitative and qualitative evaluation of all the titles within the Big Deals. Therefore, in a next step the evaluation will consider several years (e.g. 2011-2014) and values for quality and usefulness will be determined and evaluated. In conclusion, the evaluation in the STM area for the year 2014 enables more accurate statements about the frequency in use, archive access of e-journals and related costs. The evaluation of uses for individual disciplines forms the basis for further decisions together with the persons and research groups involved to find cost-efficient ways for access to e-journals.

Received on 5 February 2016.

Accepted on 16 February 2016.

REFERENCES

1. Botero C, Carrico S, Tennant MR. Using comparative online journal usage studies to assess the Big Deal. *Library Resources & Technical Services*. 2008;52(2):61-8.
2. Poynder R. The Big Deal: not price but cost. *Information Today*. 2011;28(8):1-33.
3. Frazier K. What's the Big Deal? *Serials Librarian*. 2005;48(1-2):49-59.
4. Rolnik Z. Big Deal = Good Deal? *Serials Librarian*. 2009;57(3):194-8.
5. Lemley T, Li J. “Big Deal” Journal subscription packages: Are they worth the cost? *Journal of Electronic Resources in Medical Libraries*. 2015;12(1):1-10.
6. Blečić DD, Wiberley SE, Fiscella JB, Bahnmaier-Blaszczak S, Lowery R. Deal or no deal? Evaluating Big Deals and their journals. *Deep Blue*. 2013:178-93.
7. COUNTER: Counting Online Usage of Networked Electronic Resources. Available at www.projectcounter.org. [accessed 18 January 2016].
8. Bucknall T, Bernhardt B, Johnson A. Using cost per use to assess Big Deals. *Serials Rev*. 2014;40(3):194-6.
9. Nabe J, Fowler DC. Leaving the “Big Deal”. Five years later. *Serials Librarian*. 2015;69(1):20-8.

Job-shadowing Swiss health librarians observing experienced search specialists and information skills trainers in London

Doris Kopp-Heim and Beatrice Minder Wyssmann

Social & Preventive Medicine Library, Bern University Library, Bern, Switzerland

Abstract

As librarians of the Social & Preventive Medicine Library in Bern, we help researchers perform systematic literature searches and teach students to use medical databases. We developed our skills mainly “on the job”, and we wondered how other health librarians in Europe were trained to become experts in searching. We had a great opportunity to “job shadow” specialists in this area of library service during a 5-day-internship at the Royal Free Hospital Medical Library in London, Great Britain.

Key words: staff mobility for training, librarians, Erasmus, job-shadowing, professional development.

Introduction

Over the last few years, the Institute of Social & Preventive Medicine of the Bern University has grown considerably and now employs over 140 researchers who receive national and international grants and are involved in many research projects. As health librarians for the Institute, we support students and other researchers to develop systematic search strategies and we train them to use databases. We had “grown with the job” to fill these needs, but had no formal credentials for teaching in these areas. Everything we know, we have learned on the job, and at different short workshops on database searching. Because we had never been tutored or supervised by experienced searchers or trainers, we wanted to find out how to assess our performance. Were we doing these jobs well? We definitely needed professional exchange with other librarians!

In 2013, we met Betsy Anagnostelis at the Swiss “Meet & Greet” Day for Medical Librarians. She had joined us from London to conduct a workshop on PubMed, and mentioned that a whole team at the Royal Free Hospital Medical Library, UCL Library Services (hereafter called “Royal Free”) was dedicated to performing systematic searches for hospital employees and researchers. The team also taught medical students and fellow librarians to use the most

important medical databases efficiently. We immediately started to think about how we could learn from these more experienced colleagues.

From idea to realization

In spring of 2014, we told our Director at ISPM that we wanted to visit the Royal Free team and he gave us permission to take a week’s leave to do so. We decided our visit would take place in September, which we hoped would give us enough time to find funding for our trip. We quickly applied for the Staff Mobility for Training (STT) programme, an option provided by the Swiss-European Mobility Programme (ERASMUS): “Staff mobility enables academic and non-academic employees (administration, teaching, technical support) to enjoy short stays at a European partner university. The objective of this kind of stay is to find out via job-shadowing, workshops and the like – arranged at the partner university – about alternative solutions, in terms of organization, content and processes, that may help a person in their own area of work. It is supposed to be an opportunity for people to acquire ideas and aptitudes through an exchange of experiences and good practice and thereby develop as professionals and practitioners” (1).

Our application was accepted and approved within a few days, with confirmation that all our costs would be

Address for correspondence: Doris Kopp-Heim, Social & Preventive Medicine Library, Bern University Library, Finkenhubelweg 11, CH-3012 Bern, Switzerland. E-mail: doris.kopp@ispm.unibe.ch

covered. We just needed to submit a few documents before and after our stay: a training programme, a declaration of obligation, a letter of confirmation from the host institution, and a final report.

Once we secured funding, we received final approval from both our Directors (Institute of Social & Preventive Medicine and University Library) and, less than two weeks after we first had the idea, everything came together:

- hosting institution
- funding
- employer's approval

We booked flights right away, and a hotel near the Royal Free Hospital, and by end of June, 2014, our plans were complete. After the summer holidays we started writing down our “wish list” of all the topics we hoped to discuss with the Royal Free search specialists. We also chose specific search problems to share with Royal Free, and brought our latest PowerPoint presentation about systematic searching. Finally September 7th arrived, and we couldn't wait to start our adventure (*Figure 1*).



Figure 1. *The Royal Free Hospital and UCL Medical School.*

The week programme

On Monday morning, September 8, Betsy Anagnostelis welcomed us to the Royal Free, where we received a library tour and were introduced to the staff. The library is perfectly located between the hospital wing and the UCL (University College London) Medical School. Betsy organized events and tours for us, throughout the week. She also gave us enough time to discuss, process, and integrate all the information we

were given while we were there. We were also free to put together our own programme for the week.

Our working hours were not defined (except for training sessions at the Biomedical and Health Information Summer School). We planned the start and end of our days ourselves, which worked very well. Some days, we stayed at the Royal Free until 9:30 pm; other days we finished by 4 pm. We thus had the opportunity to explore beautiful Hampstead (the area where we stayed) with its pleasant Heath (forest), and also to see downtown London, where we visited four other libraries and, of course, the main tourist attractions.

Job-shadowing: observing our colleagues at work

We were given computer workspaces with guest accounts, from which we accessed online resources. There were three librarians on the team that performed literature searches and taught skills: Angela Young (Information Skills Trainer), Ruth Muscat (Knowledge Resources Librarian) and Sophie Pattison (Acting Clinical Support Librarian). Each had their own specialty field, and we were happy to profit from their advice. While we were “shadowing”, we could ask them questions about how they do things and why they do them that way (*Figure 2*).



Figure 2. *Together with colleagues of the Royal Free team.*

It was very useful to learn about an unfamiliar library service: the Clinical Effectiveness Enquiry Service (CEES) is a free literature search service for members of the hospital medical staff who seek evidence in support of patient care, guidelines, or

research. Staff members complete an online form themselves, or with the help of a member of the CEES team. The CEES assists hospital staff in clinical decision-making, but is not intended for use in complex searches for systematic reviews.

We also followed a session of the UCL-wide Biomedical and Health Information Summer School workshop on literature searching for systematic reviews. This training was held for health librarians, to help them perform comprehensive searches in multiple databases. The teachers focused on real-world examples, and the course was very interactive. We were glad to see that the training material we had developed met the quality standards.

In the workshop we were able to see one way of developing librarians' search skills. We were told that, as in Switzerland, literature search skills in medical databases were not an integral part of the Library School curriculum. It's mainly on-the-job training and courses. The Royal Free however took another approach: more experienced staff tutored new searchers and gave them regular support and feedback (2).

Betsy Anagnostelis was a valuable source for all kinds of information, including the pros and cons of different medical databases and their respective platforms, the need for more training, and information on document delivery. Although her schedule as Head of the Royal Free Hospital Medical Library and other UCL health libraries kept her very busy, she always found time to stop by our desk and ask if we needed anything, or if she could help in any way.

A special highlight was our visit to the British

Medical Association (BMA) Library (Figure 3). It is reserved for the use of BMA members, so we needed to get a visitor's pass and go through security gates. After search specialist Helen Elwell guided us through the whole building, she showed us how she performed literature searches for BMA members, what she requested from them in advance and which platforms and filters she used. We discussed some specific search problems, and she gave us valuable advice. We interviewed her, as we interviewed all the librarians we met.

Afterwards we visited the very impressive premises of the Royal Society of Medicine Library, where we could also collect information about their literature search services (Figure 4).



Figure 4. Beautiful silent study reading room at the RSM Library.



Figure 3. The BMA building.

Last, but not least, we visited the British Library and the Royal College of Nursing Library on our own. We enjoyed it, even though we did not have the opportunity to meet with a training or search team member. We just marvelled at the greatness of the British Library, and liked the beautifully presented Nursing Library, and the Heritage Centre with its nice little café and the interesting exhibition.

Self-reflection

How did our search services and workshops compare to those offered by our London colleagues? *Systematic searching:* We are less experienced than our colleagues, but, essentially, our way of building search strategies is the same. We were motivated to continue along these lines, and to refine our search skills even more by discussing strategies together. Evidently, our decision to introduce call-in sessions

was correct, since, in the three London medical libraries we visited, one-to-one teaching is very appreciated by customers.

Teaching: Our colleagues do a lot of teaching via online courses and blogs; that's something we have not started doing yet, and we may try that out. We learned that we are just as proficient at face-to-face teaching as our colleagues.

Topics covered: A lot of the learning content we provide is similar to that offered by the Royal Free (EBM, PICO system, structuring of searches in concepts, etc.), but Royal Free also gives workshops on critical appraisal and use of reference management software. Other specialists at the University of Bern cover these topics.

Conclusions

The medical field (hospitals and research institutions) has urgent need for professionals who can perform systematic literature searches, teach courses and offer one-to-one training to the medical audience (students, clinicians and researchers).

Mentoring programmes designed to deepen search skills should supplement courses on medical databases, so that more experienced searchers and teachers can bring less experienced librarians up to speed. Here in Switzerland, we should establish a

circle of medical librarians involved in systematic searching, so we can discuss complex search strategies and share ideas and skills.

Providing travel grants for staff that wish to train at other facilities is money well spent. Observing other professionals in their home environment is a great way to encourage reflection on our own processes, to gain new skills, and to implement new knowledge and expertise in the workplace.

Received on 6 February 2016.

Accepted on 16 February 2016.

REFERENCES

1. Staff Exchange [Internet]. [cited 2016 Jan 28]. Available from: http://www.unibe.ch/studies/mobilitaet/staff/staff_exchange/index_eng.html
2. Clarke S, Thomas Z. Health librarians: developing professional competence through a "legitimate peripheral participation" model. *Health Info Libr J.* 2011;28(4):326-30.

Information needs of the public health workforce in 2015

Emma Hughes, Helena Korjonen, Asha Keswani and Jennifer Ford

UK Health Forum, London, United Kingdom

Abstract

This research investigates the information needs of the public health workforce in 2015. It builds on previous research to look at information access, information use, information skills and barriers to information. Two online surveys were created and disseminated gathering both qualitative and quantitative data. Results showed that there are various uses for information. Respondents felt confident in their literature search skills but less confident in managing bibliographic references and critical appraisal. There were common barriers to information including lack of time and financial restrictions. The results from this information needs assessment support findings from previous research. Further research should explore ways to overcome barriers to information and get a better understanding of individual sector needs and barriers to information.

Key words: health information; public health; information need; information literacy.

Introduction

This research builds on previous research done by the UK Health Forum (UKHF) Research & Information Services team into the information needs of the public health workforce (1, 2). The first piece of research from the UKHF (formerly National Heart Forum) was conducted during a time of transition within public health in England. It focussed on the needs and barriers of the public health workforce prior to this transition. The results highlighted a lack of public health evidence, organisational access to information and a lack of time to search and read information. The aim of this research is to understand the needs of the workforce three years on in 2015.

The term “information need” has previously been defined as having two separate aspects to it: an information need is the awareness of an individual that they are experiencing an uncertainty which requires a “stimulus”, or piece of information in order to resolve that uncertainty, and also that the individual must be equipped to recognise the existence of their uncertainty (3). Infoday defines information need as “the motivation people think and feel to seek information” (4, p. 3).

The UK Faculty of Public Health defines the public health workforce, referred to here as practitioners, as covering “a wide cross-section of public health specialities in a wide range of settings, such as the NHS, local authorities and the voluntary and private sectors” (5). They are a diverse group with varying needs (1). Different types of information are created, disseminated and sourced throughout different projects and collaborations in public health. Our previous research shows that access to public health information is complex and time consuming (1). Practitioners reported spending up to six hours a week searching for information, with information overload and lack of time as their main barriers to information (1). These findings support previous research from Revere, Rutland and Twose (6-8). Rutland found that information needs in public health are diverse, ranging from the need for population focussed data to information on the cost-effectiveness of interventions (7).

Organisational cultures have also been found to affect access to and availability of information which makes it difficult for some practitioners to find and use information (9).

Kostkova concluded that the internet has “dramatically changed the availability of

Address for correspondence: Emma Hughes, UK Health Forum, Fleetbank House, 2-6 Salisbury Square, London, United Kingdom. E-mail: emma.hughes@ukhealthforum.org.uk

information” (10). It means more information is freely available, but this has also led to a sense of information overload.

Grey literature is known to be popular in public health. The Luxemburg definition of grey literature is “That which is produced on all levels of government, academics, business and industry in print and electronic formats, but which is not controlled by commercial publishers” (11). Grey literature has proven to be valuable in public health as often randomised controlled trials (RCTs) and systematic reviews are not appropriate methods for testing community interventions or local policy (12, 13). However, such types of information are often difficult to find due to a lack of indexing in any bibliographic databases, in particular popular databases such as PubMed or subscription only databases. It takes time and good searching and critical appraisal skills in order to be able to find suitable grey literature.

This paper aims to discover the information needs of the UK public health workforce in 2015. The research was funded by Public Health England (PHE).

Aims

The aims of this paper are:

1. to assess the information needs of the UK public health workforce in 2015;
2. to highlight areas where measures could be taken to improve information access and reduce barriers to information.

Objectives: to create and disseminate an online survey to the public health workforce to gather quantitative and qualitative data on their information needs. The survey will include questions on access to and use of information, confidence in information skills and barriers to information.

Methods

Due to the requirements of the project two surveys were produced; one to analyse the needs of PHE staff, another for the rest of the public health workforce. This paper has merged results from both the surveys to analyse and discuss the results looking at the workforce as a whole.

The questions were based on those used in previous information needs research and developed further in collaboration with staff at PHE. The questions

aimed to explore the following areas of information needs: information access, information use, information skills and barriers to information. The surveys were piloted by UKHF and PHE staff before being finalised for wider dissemination.

The surveys were created using Select Survey software. We determined that an online survey was the best method to reach the vast audience required for this research. Questions were designed to gather a mix of qualitative and quantitative data. It was disseminated in February 2015 to public health practitioners via the following channels: PHE internal email, UKHF information services users and social media. Due to the nature of dissemination requiring to reach as many as possible it was not possible to calculate a response rate. This would be difficult in any case as there is no exact figure of how many individuals work in public health (14).

At the beginning of the survey was the qualifying question “Do you work for Public Health England”. Those that answered “yes” were taken to the survey specifically for PHE staff, those who answered “no” were for the rest of the public health workforce.

The survey was open for one month. The data was exported into Microsoft Excel for analysis. Qualitative data was coded and sorted into themes. The themes were discussed between three information professionals for consensus.

Results

Due to participants being able to skip questions, it was not possible to calculate the number of complete and partial responses therefore, when possible to calculate, the number of responses for each section will be in brackets in the subheading. There were 558 responses to the qualifying question. 264 participants worked for PHE and 294 from other sectors in public health. PHE respondents will be from England, those from other sectors are mostly from the United Kingdom, but there may be respondents from other countries too.

Over half of the respondents were from PHE (53%). The rest distributed as follows: Local Authority (24%), NHS (20%), Third/Voluntary Sector (6%), Other (5%) and Government departments (2%).

Topic areas of interest

Respondents were asked to list three topic areas of interest to them in their work. This was a free text

answer. Figure 1 is a word visualization to display the results, the larger the word the more common the occurrence of it in the results.



Figure 1. Topic areas of interest as indicated by survey respondents.

Information access (n = 370)

Respondents were asked to select resource types they use in their work and could select as many as applicable. Table 1 displays the number of selections for each resource type. Guidelines were the most popular resource type, followed by reports and evidence summaries. It is worth noting that all resources were considered useful with few low numbers.

Resource type	Responses
Guidelines	302
Reports	284
Evidence summaries	258
Primary research	252
Datasets	211
Case studies	208
Indicators	180
Learning materials	178
Systematic reviews	160

Table 1. Which information resources do you use?

Information use

Respondents were asked what they use the information they retrieve for and were provided with a list of options. Respondents were able to select as many as applicable. “To keep up to date” was the most popular use of information (n = 311); this was followed by report writing (n = 244) and to give

advice to patients and colleagues (n = 221). Although the data showed that there are a variety of end uses for information, with no one use being particularly dominant at the expense of the other.

Information skills

Participants were asked to rate their level of confidence in the following information skills: Formulating search questions, literature searching, managing bibliographic references and critical appraisal. Each question had a ranking scale of: Very confident, Confident, Fairly confident, Not very confident. Table 2 shows a breakdown of the answers.

	Very confident	Confident	Fairly confident	Not very confident
Formulating questions	20%	39%	32%	9%
Literature searching	18%	38%	36%	8%
Managing bibliographic references	16%	34%	28%	22%
Critical appraisal	13%	35%	35%	18%

Table 2. Confidence in information skills

Barriers to information (n = 366)

We asked respondents to tell us about any barriers they experience when accessing information. The most common barrier to information was lack of time (n = 243). Subscription fees/financial considerations (n = 200) was also a common problem as was a lack of awareness of the information resources and services available (n = 174) and sense of information overload (n = 120).

This research displays the variety of uses for information, suggesting that job roles in public health are varied and that information needs are unique to individuals. Despite that, there were common themes in the use of and barriers to information. The most common use for information was to keep up to date, which supports results found in previous information needs research (1). Case studies were commonly required as a source

of evidence for the public health workforce. This is interesting as case studies are often lower in evidence hierarchies (15) as they are often less rigorous than other research methods, but in community-based interventions they can sometimes be the only source of evidence available. The finding is further supported by separate research we have undertaken into the value of case studies as evidence in public health (12).

People felt confident in their information searching skills, though were more likely to select “Confident” over “Very confident”. Thirty-nine per cent of respondents were confident in their ability to formulate search questions and 38% were confident in performing literature searches. Lowest levels of confidence were found in managing bibliographic references (22%). It was not clear from the research why respondents felt less confident in managing bibliographic references and critical appraisal, but we recommend that those providing information skills training should focus on these areas.

Lack of time and financial/subscription restrictions were common barriers experienced in both survey groups which also supports evidence from previous research. Another of the barriers to information was a lack of awareness of the resources available to them. This could be overcome by increased promotion of resources.

It should be noted that there were some limitations to the research. The Centre of Workforce Intelligence’s (16) report “Mapping the public health workforce”, estimated that the public health workforce in England is likely to range from 36,000-41,000, therefore the response rate to these surveys were relatively low. Due to the way the surveys were disseminated, our research only reached those affiliated with PHE and the UKHF. As the public health workforce is so wide ranging there will be some roles and sectors that were not reached in this research and therefore the research can only provide a snapshot of specific individuals at a moment in time. Also, there were areas of the two surveys where it was not possible to compare results.

Further research should use survey questions that allow for better comparison between the public health sectors. Research focussing on specific sectors of public health workforce is recommended for a deeper understanding of the variety of information needs and uses.

The results of this research have been shared with PHE and will be utilised to develop and strengthen existing national services and continue with research into information needs and behaviour of the public health workforce. We also see the need to publicly share the research results in order that health and care information services are able to utilise the data for similar purposes.

Conclusion

This research aimed to identify the information needs of the public health workforce in 2015.

The results found in this research support findings from previous research carried out by the UKHF (1). Combined with results from previous research, this research gives a useful understanding of how information needs change over time and to examine trends. Barriers to information appear to remain unchanged since our research in 2012, and we recommend further research and innovation to overcome these barriers. Further research should also identify reasons for lack of confidence in some areas of information literacy.

Further research could use qualitative methods such as focus groups and face-to-face interviews to get feedback on local services and a better understanding of individual sectors needs and barriers.

We recommend further evaluation for a better understanding of the barriers to information and lack of confidence in some areas of information literacy.

Received on 1 February 2016.

Accepted on 10 February 2016.

REFERENCES

1. Korjonen H, Ford J, Hughes E. Informing the design of the new Public Health England portal: A survey of information needs to establish priorities. London, UK: 2012.
2. Ford J, Korjonen H. Information needs of public health practitioners: a review of the literature. *Health Info Libr J.* 2012;29(4):260-73.

3. Forsetlund L, Bjorndal A. The potential for research-based information in public health: identifying unrecognised information needs. *BMC Public Health*. 2001;1:1.
4. Cole C. *Information need: a theory connecting information search to knowledge formation*. New Jersey, USA: Information Today Inc.; 2012.
5. Health FoP. About practitioner development 2010 [cited 2016 12/01/2016]. Available from: http://www.fph.org.uk/about_practitioner_development
6. Revere D, Turner AM, Madhavan A, Rambo N, Bugni PF, Kimball A, et al. Understanding the information needs of public health practitioners: A literature review to inform design of an interactive digital knowledge management system. *Journal of Biomedical Informatics*. 2007;40(4):410-21.
7. Rutland JD, Smith AM. Information needs of the 'frontline' public health workforce. *Public Health*. 2010;124(11):659-63.
8. Twose C, Swartz P, Bunker E, Roderer NK, Oliver KB. Public health practitioners' information access and use patterns in the Maryland (USA) public health departments of Anne Arundel and Wicomico Counties. *Health Info Libr J*. 2008;25(1):13-22
9. Bertulis R, Cheeseborough J. The Royal College of Nursing's information needs survey of nurses and health professionals. *Health Info Libr J*. 2008;25(3):186-97.
10. Kostkova P, Fowler D, Wiseman S, Weinberg J. Major infection events over 5 years: How is media coverage influencing online information needs of health care professionals and the public? *Journal of Medical Internet Research*. 2013;15(7):e107.
11. Grey Literature Report. What is grey literature? [cited 2016 22/01/2016]. Available from: <http://www.greylit.org/about>
12. Korjonen H, Ford J, Keswani A, Hughes E. The role of case studies as evidence in public health. UK Health Forum, 2015.
13. Ford JR, Korjonen H, Keswani A, Hughes E. Virtual communities of practice: can they support the prevention agenda in public health? *Online Journal of Public Health Informatics*. 2015;7(2).
14. Intelligence CfW. Mapping the core public health workforce: a literature review. 2014.
15. Petrisor B, Bhandari M. The hierarchy of evidence: Levels and grades of recommendation. *Indian Journal of Orthopaedics*. 2007;41(1):11-5.
16. Intelligence CfW. Mapping the core public health workforce. London: Centre for Workforce Intelligence, 2014 October 2014.

iPads as digital platform for medical study: The SAMR model for mapping impact

Mark Hamilton and Terese Bird

University of Leicester School of Medicine, Leicester, United Kingdom

Abstract

Conventional educational wisdom would caution against technological innovation without having all pedagogical outcomes fully mapped out. Our experience introducing iPads into medical education at the undergraduate level demonstrates significant augmentation over the traditional learning medium and manifests a digital platform enabling previously-unforeseen learning benefits. This study uses Puentedura's SAMR model of technological intervention to describe and categorise these benefits, as well as to illustrate the pleasing successes possible through an experimental and innovative approach.

Key words: SAMR model; mobile learning; feedback; formative assessment.

Introduction

Conventional educational wisdom would suggest that technology is a tool that should serve pedagogical ideals and that when considering incorporating digital tools, one should have a robust educational plan in place from the start to avoid your pedagogy becoming subservient to the latest technological trends (1, 2). In the words of M. Fullan, "Without pedagogy in the driver's seat there is growing evidence that technology is better at driving us to distraction..." (3). We would not disagree with this completely. However, requiring a complete road map before incorporating digital innovation can constrain innovation and introduce a crippling level of inertia. We believe that creating a digital platform – providing student iPads for learning materials and activities – can open up powerful educational opportunities even when a specific endpoint is not fully conceived. Our experience demonstrates an innovative project taking root and bearing fruit despite many unknowns, and a pleasing discovery that students contribute abundant resources toward realising the vision of such a project.

In 2013, the Leicester School of Medicine (based at the University of Leicester) had the opportunity to provide each of our first year students with iPads. At this stage the main drivers for doing this were to reduce the printing of paper workbooks and to democratise student access to online learning materials. What follows is an account of how the

project grew from these simple pedagogical beginnings into a fundamental component of the teaching and learning on this degree course.

To illustrate this we have used Dr Ruben Puentedura's SAMR model (4) as a framework for our project. This model is a useful way of assessing the impact that digital technology has on teaching and learning by describing broad hierarchies of impact. These hierarchies are found in the acronym SAMR and relate to Substitution, Augmentation, Modification and Redefinition, representing increasing levels of technology impact as illustrated in *Figure 1*. We will use SAMR to illustrate our iPad project and give a definition for each of the levels as we introduce them.

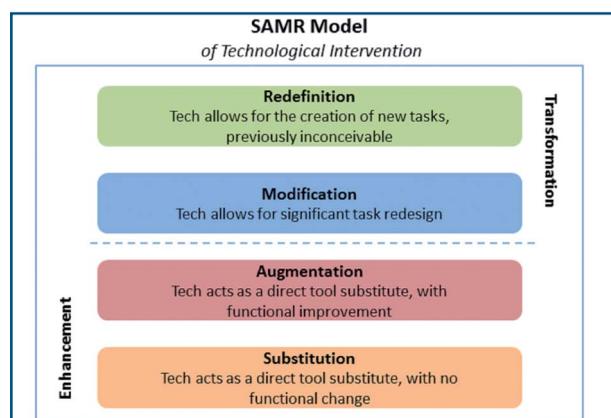


Figure 1. SAMR Model.

Address for correspondence: Terese Bird, Educational Designer, Leicester Medical School, University of Leicester, University Road, Leicester, LE1 7RH, UK. E-mail: t.bird@le.ac.uk

S - Substitution - Tech acts as direct tool substitute, with no functional change

Our initial approach was to convert our paper workbooks into PDF files (with some minor changes in formatting) and make them available to download through Blackboard, our virtual learning environment (VLE). We recommended students use the PDF annotation app Notability as it was good value and highly rated by other users. We also encouraged students to regularly back up their work which was made straightforward by Notability having built-in links to a variety of free cloud-based storage solutions. Providing PDF versions of workbooks aligns to Substitution on the SAMR model. Substituting PDF versions for paper workbooks required very little additional work on our part. In fact, the administrative burden was significantly reduced as the printing process and physical distribution of the workbooks was removed. Academics were also afforded extra time to work on their unit materials as a print deadline was no longer an issue. These cost savings are all additional to the obvious ecological gains of this approach, in that thousands of paper copies were no longer being printed.

We were however anxious to see how the students found using the iPads as a replacement for the more traditional medium of pen and paper. We surveyed the students at regular intervals during this first year asking them a consistent sequence of questions to assess if their attitudes changed over time. Representative students quotations regarding the use of iPads to read and study learning materials include:

- “At first I was a little apprehensive as I was used to paper format. However once I started using the iPad I had adjusted to the style of learning... I now find it easy to use a combination of the iPad and written notes.... The iPad is extremely useful when trying to access specific material. It also saves carrying lots of documents!”
- “I have found that I am more likely to do spontaneous revision by having all my work so readily accessible on the iPad.”

Figure 2 illustrates student response to a question about reading on the iPad. Survey 1 was conducted about three weeks after students were first given their iPads in autumn term 2013. Survey 2 was conducted about 12 weeks after students were given their iPads.

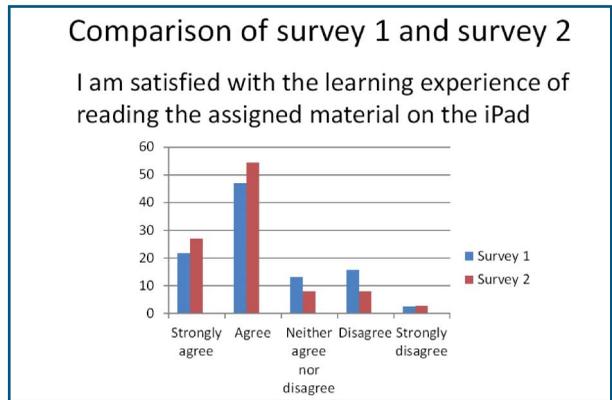


Figure 2. Comparison of replies to the statement “I am satisfied with the learning experience of reading the assigned material on the iPad” occurring in surveys 1 and 2

A - Augmentation - Tech acts as a direct tool substitute, with functional improvement

It soon became obvious that our act of substitution was in fact yielding broad Augmentation for staff and students alike. Very early in the use of mobile devices for learning, the promise of learning anywhere anytime was being realised (5, 6). It quickly became evident that our students were experiencing the beneficial affordances of mobile learning, allowing them as learners to freely move throughout their physical and virtual environments (7). Not only so, but mobile devices were opening possibilities of new inter-relationships and inter-dependencies among different types of content, and various interests, preferences and motivations of learners (8). These affordances are evident through student comments:

- “The iPad is fantastic to use during group work, ...in fact, I’m not entirely sure how previous years managed these sessions without it!”
- “I think the iPads have been a good way to learn. It makes studying possible in more locations.”
- “Its portability means I am not lugging heavy books everywhere, but have some ebooks neatly stored onto the iPad library – much easier to flick through these whilst going over notes.”
- “The iPad is useful, able to have all workbook information and lectures at all times, and useful to have two things up at once, e.g. workbook on iPad whilst looking at lecture slides that have been annotated on the computer screen through Dropbox.”

We also noted that the students were able to share their work and ideas with ease (for example using AirDrop, a file transfer service on iPads), whether that be across their group work table or a lecture theatre. Their connection to each other was noticeably augmented by these devices and as a result sharing was encouraged.

Electronic flashcard apps were also frequently being used. The augmentation advantage of these apps over paper based flashcards was not only the ability to widely distribute content but that students could tag and organise content for much more targeted retrieval. Questions that had been created at different times could be searched and viewed together to help the review of a particular topic. Students could also personalise their learning by rating the difficulty of individual questions. This in turn would automate the frequency that these questions appeared in future review sessions targeting weaker areas of understanding.

The example of electronic flashcards providing augmentation over traditional non-digital learning tools was a common theme. On the surface of it the iPads provided students with comparable tools – the ability to annotate documents, to read textbooks, to fill in surveys – but with all of these, there were layers of extra functionality. The most pleasing aspect of this was that it was student-led. We would find out or witness them using these digital tools in ways that supported their learning. If it wasn't beneficial or superior to traditional techniques, then it wasn't adopted.

M - Modification - Tech allows for significant task redesign

As the number of yearly cohorts with access to an iPad grew, so did the opportunities to exploit this digital platform. A key opportunity was the ability to significantly redesign our practice of formative assessment, thereby placing this task in the Modification category of the SAMR model. One of the greatest challenges facing our Medical school over the last few years has been a sustainable way to provide students with increased levels of timely and personalised feedback. Students value detailed and timely feedback; when feedback is delivered too long after the learning event, they perceive it to be of low quality and even of no value at all (9). While a level of digital automation would have been helpful in

achieving this goal we realised that we had to have a complete rethink of how and when we could give students useful feedback and how our digital platform could facilitate this process. We eventually came across e-assessment software called ExamSoft which was fully functional on an iPad. This software could act as a complete exam management solution and also deliver secure offline exams in multiple formats.

Following pilot studies and using feedback from the students, we have developed a format that enables us to deliver some of our feedback improvement goals. Students receive regular formative quizzes (using ExamSoft on their iPads) that test key learning outcomes from the previous week's topics. Quizzes are in the format of single best answer (SBA). With ExamSoft, students receive immediate detailed feedback; if they select the incorrect choice, the correct answer is given, along with a short paragraph of information to help them understand what is incorrect, how this relates to the learning outcomes, and how to optimise their study. At their convenience students may log into an online portal and review their exam performance along with the detailed feedback, coloured according to a "traffic light" system highlighting correct, incorrect and partially correct answers. They can take the exams more than once and check improvement of their understanding through a continually updating portal which stores feedback from all their quizzes. The feedback in essence allows students to target weaker areas of understanding by providing immediate specific guidance as well as general signposting to appropriate unit resources. The portal allows students to visualise the trajectory of their learning in a way that has not been possible previously, and our hope is that students will be better equipped to self regulate their learning behaviour because of this feedback.

To our surprise, the student feedback on this e-assessment strand of the project was initially very hostile; to a survey question whether they found the user interface of the ExamSoft app to be easy to use, 60% of the students either disagreed or strongly disagreed (10). However, after several weeks the students became very appreciative of the assessment feedback. At the conclusion of the module in January 2016, students gave the highest feedback marks ever received for that module, and many

specifically cited the formative assessments with instant feedback as the reason for their positive appraisal.

This system is therefore a significant modification over previous formative assessments, in that students can practice-test their understanding and receive instant, detailed feedback. Other welcome features include unanswered questions being highlighted by the software so that the student cannot accidentally miss questions, and the ability to include good-quality colour images and videos in exams. The redesign of the formative assessment task enabled by iPads has been both significant and welcome.

R - Redefinition - Tech allows for the creation of new tasks, previously inconceivable

The nature of our progress in teaching and learning with iPads is such that it is constantly evolving. Through horizon-scanning, we have discovered and trialled some systems which allow us to teach in ways we could not have previously imagined, placing such tasks in the Redefinition category of SAMR.

Socratic and Top Hat are systems enabling live polling and surveying of students in class. It is notoriously difficult to encourage interaction and response from students in large classes, so any tools that enable this are very welcome. Live-interaction systems can instantly check students' understanding so the instructor has the option to adjust the teaching in real time. Students can also visualise how their answers compare with the rest of the cohort.

Lecturers in the Medical School had used some polling systems in the past which required bespoke equipment ("clickers"), but had been prohibited from going much further due to not owning enough clickers. Now that students all have an iPad, however, new possibilities are opened with results we could not have previously conceived. The following recounts by one instructor using Top Hat in a large lecture on clinical diagnostic thinking.

- **Free-text answers:** An instructor lecturing to a group of approximately 200 gave a complicated clinical diagnostic question. Using the Top Hat app, students typed in words and phrases indicating the main symptom they believed would present because of the described condition.

- **Students and teacher see how students "think around" a topic:** The replies were instantly synthesised into a word cloud displayed from the front, so that both teacher and student could understand how they were thinking about the topic and what should be their next steps in learning that topic.
- **Dynamically-changing discussion:** Students could change and add to their answer as the lecture continued, immediately updating the word cloud, deepening the discussion.
- **Instructors discover students' "knowledge map":** Students responses are kept in a portal. After class, the instructor examined individual replies, reflecting on how students were constructing knowledge and beginning to synthesise and evaluate information on the topic, judging whether students were reading around the topic well enough and progressing in diagnostic thinking, and learning where he should intervene and further facilitate their development.

None of us could have envisioned the ability to instantly synthesise students' free-text replies to questions in lectures and how this would deepen in-class discussion, or the ability to reflect on these later to judge how to change teaching focus to address gaps and develop further. Our digital platform had redefined the lecture experience in this case.

Conclusion

Our experiences of creating a digital platform have been incredibly positive. From relatively simple beginnings we have seen real 'game changing' developments take place and, most pleasing of all, the students themselves have often driven these forward. This ground-up, student-led approach means that the project's momentum has been achieved without huge numbers of support staff, making it a very sustainable process.

The creation of a digital platform has allowed us to address challenges with a powerful set of new tools, enabling us to include learning opportunities that have previously not been possible. From improved connectedness to e-assessment, our teaching and learning experiences have been enriched to a point

where it would be inconceivable to return to our old methodology.

Through mapping a proportion of our activities to the SAMR model, we have attempted to illustrate the real impact on student learning that has occurred as a result of this project, as well as to demonstrate that the initiative has been extremely cost-efficient both in terms of financial outlay and in staff capital. Not only so, the creative processes involved in bringing this innovation to fruition have proven to be enjoyable for students and staff alike.

Received on 12 February 2016.

Accepted on 20 February 2016.

REFERENCES

1. Branson R K, Rayner GT, Cox JL, Furman JP, King FJ, Hannum WH. Interservice procedures for instructional systems development. Ft. Monroe, VA: US Army Training and Doctrine Command, August 1975.
2. Gagné RM, Wager WW, Golas KC, Keller JM. Principles of instructional design. *Performance Improvement*. 2005;44: 44-6. <http://doi.org/10.1002/pfi.4140440211>
3. Fullan M. Choosing the wrong drivers for whole system reform. East Melbourne, Victoria, Australia; 2011. Retrieved from <http://edsources.org/wp-content/uploads/Fullan-Wrong-Drivers1.pdf>
4. Puentedura RR. Transformation, Technology, and Education. 2006.
5. Sharples M, Corlett D, Westmancott O. The design and implementation of a mobile learning resource. *Personal and Ubiquitous Computing*. 2002;6(3):220-34.
6. Kukulska-Hulme A, Traxler J. Mobile learning: A handbook for educators and trainers. Abingdon: Routledge; 2005.
7. Laouris Y, Eteokleous N. We need an educationally relevant definition of mobile. In: Proc mLearn. 2005:1-13. Retrieved from <http://citeseerx.ist.psu.edu/viewdoc/download?doi=10.1.1.106.9650&rep=rep1&type=pdf>
8. Hamilton M, Conole G, Bird T. Evaluating the use of iPads with first-year Medics. In: Changing the trajectory: Quality for opening up education. Crete: 2015; International EIF/LINQ Conference 2014.
9. Quality Assurance Agency For Higher Education. What students think about their higher education. Gloucester; 2014. [online] Available from: <http://www.qaa.ac.uk/en/Publications/Documents/What-Students-Think-of-Their-Higher-Education.pdf> (Accessed 9 February 2016).
10. Hamilton M, Mongan L, Bird T, Bulman S, Thornber A, Norman R. Delivering assessment through iPads: Initial reflection on feasibility. In: ASME Annual Scientific Meeting 2015. Proceedings, 2015; Edinburgh.

On the importance of being a data-savvy librarian

Annarita Barbaro

Istituto Superiore di Sanità, Rome, Italy

Abstract

In the last years a sense of the importance of making all data related to scientific research open, shareable and therefore reusable, has spread in all the areas of scientific research. As this has generated a need to develop policies, infrastructures and services in order to assist researchers in creating, collecting, manipulating, analysing, storing and preserving datasets, this is a unique opportunity for libraries to play an active role in the research process. Librarians, along with their traditional skills, such as their ability to retrieve and organize information, consult and teach, should develop an understanding of the technical aspects of data management, developing new skills and capabilities.

Key words: librarians; data curation.

Introduction

Along with the open access movement, a sense of the importance of making all data related to scientific research open, shareable and therefore reusable, has spread in all the areas of scientific research. As with open access to journal articles, research funders are nowadays playing an important role in mandating the sharing of research data by introducing policies (or tightening existing ones) requiring the deposit and sharing of the data produced by the research they are funding. In order to ensure that research data are well-managed in the present, and prepared for preservation and usability in the future, some funders require also a Data Management Plan (DMP), a formal document outlining how the data resulting from the funded project will be handled both during the research, and after the completion of the project. The National Institutes of Health, for example, has mandated since 2003 that research data arising from projects they fund be made openly available, and the US National Science Foundation implemented a similar requirement in 2011. One of the biggest world funders, the European Union, has launched the Open Research Data Pilot – as part of EU Framework Programme for Research and Innovation Horizon 2020 (2014-2020) – to make the research data generated by selected Horizon

2020 projects accessible with as few restrictions as possible (1, 2). A policy of making data sharing a condition for publication has been enhanced also by some scholarly journals such as Nature (3) or all the journals published by the Public Library of Science (4).

While nowadays the benefits of making research data available are widely accepted, researchers are not always strongly motivated to share their own data because of concerns about intellectual property, confidentiality, or lack of academic credit, or fear that their research might be scooped or misinterpreted. Furthermore, preservation and planning for future use are often carried out in a localized and unsystematic fashion, usually limited to backup and storage for future reuse by the same research group. Moreover, no coordinated set of practices or even instructions exist to enable the majority of researchers to introduce an effective research data management into their workflow (5). As these factors generate a need to develop policies, infrastructures and services in order to assist researchers in creating, collecting, manipulating, analysing, storing and preserving datasets, this can be a unique opportunity for libraries to play an active role in the research process. This role can be fulfilled in several ways: for example, libraries can provide consulting services related to research data

Address for correspondence: Annarita Barbaro, Istituto Superiore di Sanità, Viale Regina Elena, 299. 001621, Rome, Italy. E-mail: annarita.barbaro@iss.it

management and curation, can provide the infrastructure, or at least the front end, for data storage and curation, can build a bridge between administrative staff and researchers, and can “clean” data for analytic use (6).

The new role of the librarian in a data driven environment

Given the library’s longstanding role in scholarly communication, librarians have a long history of facing changes in technology that reshape their work. The digital age has brought incredible changes in the way information and data are produced, consumed, adapted, and shared, requiring a transformation of resources and services. The NMC Horizon Report: 2015 Library Edition, which identifies and describes the important developments in technology likely to have a large impact over the coming five years in libraries around the globe, underlines the increasing focus on research data management, and that “[l]ibrarians now have a responsibility to educate researchers about how to select the proper medium to fit their findings – and to ensure that what is submitted can be stored and published in their databases”. This report states also that librarians can be genuinely useful for their technical expertise in areas including the optimization of taxonomies, citing data, and addressing any intellectual property issues (7).

The ACRL (Association of College & Research Libraries) Research Planning and Review Committee also identified library involvement in data curation, including collaboration with their research communities, as one of the 2012 top ten trends in academic libraries. According to the ACRL report, data curation offers opportunities for “finding new ways to communicate the value of the skills librarians already possess and in developing roles that were not previously associated with librarians” (8).

There is a substantial overlap between the areas where researchers face substantial challenges in developing data policies and the areas of expertise already associated with one of the core roles of the research librarian: collecting and arranging information in a way that guarantees that it will be retrievable and usable for a broad range of users in the future. Librarians have competencies that can be useful in supporting researchers during every

stage of the research data lifecycle (plan, collect, manage, share, and publish datasets). In detail, they can help the researchers to write Data Management Plans, give them the appropriate information regarding licensing data, and direct them to the right repositories. Moreover, as the researchers prepare for the long-term curation of data by creating identifiers and depositing data in a trustworthy repository, librarians can help with their expertise in this field offering workshops or promoting metadata best practices. The aspect of assigning the appropriate metadata to data sets is an obvious concept for librarians but most of researchers are unaware of their value for an effective data sharing, citation and reuse (5, 9).

As a step in this direction, libraries at research institutions or universities have started with a variety of data awareness services on their websites. The MIT libraries have created a page on data management (<http://libraries.mit.edu/data-management/>) with guidance on planning, storing and sharing of data, addressing a broad range of technical, administrative and confidentiality issues. The University of Edinburgh data library, funded by Jisc, developed an online course, MANTRA (<http://datalib.edina.ac.uk/mantra/>), covering the essentials of research data management for doctoral students and other researchers. The course provides also a DIY training kit for librarians (<http://datalib.edina.ac.uk/mantra/libtraining.html>).

Old and new skills

Broadly speaking, the mentioned skills already fall within the traditional competencies related to the work of a librarian, but in practice working directly with research data also involves a number of practical issues which may be unfamiliar. To be of effective help, librarians need increasingly to become data-savvy themselves and to have a deeper understanding of the research data lifecycle in order to enhance the services they offer.

Data curation is still an emerging field in librarianship so there is still some disagreement on the kinds of skills librarians need to perform this role effectively. One perspective is that the main requirement is a basic familiarity with how various software tools can transform data. For example, a librarian does not need to also be competent as a statistician or a graphic designer but every data

librarian should have a clear understanding of how basic tests of numeric data can be used and to recognize the features of an effective data presentation.

An alternative and more flexible approach is for data librarians to learn how to code (10). This also has the potential to make librarians more effective in other parts of their work. In a blog post titled “Why would a librarian learn to code?”, Tom Sykes, a Deputy Librarian at a Cambridge college library, sums up four reasons why librarians should learn how to code: to optimize workflows by automating repetitive tasks involving messy data, to improve usability of library services, to better communicate with IT and software vendors and, last but not least, improve their creativity, which is indispensable for problem solving (11). In a sign of more widespread interest in coding in libraries Library Technology Reports (journal published by the American Libraries Associations) published an issue entitled “Coding for Librarians: Learning by Example”, which reports more than fifty interviews with librarians who have written code in the course of their work (12).

Although librarians are broadening their expertise to adapt to this new environment, the scale of the challenge in terms of infrastructure, skills and culture change requires concerted action by a range of stakeholders, and librarians need to collaborate with IT services and researchers along with other key players such as research support offices. Acquiring more technical skills is useful in itself but it is also valuable for improving collaboration with IT staff who have a complementary role in managing databases. Not all librarians are interested in becoming data scientists but they can make a difference by collaborating with experts bringing their competence and knowledge in handling metadata and applying it in the context of data. This collaborative approach to service, which connects library expertise with different stakeholders, can create opportunities to build networks within and beyond the library, to integrate library support into the research process, and to support open access to research data.

Currently there is still no coordinated effort in providing targeted opportunities for professional staff development in this area and most library staff are building their knowledge and skills in research

data management on the job, through self-training, or participating to conferences or workshops. However, several initiatives have started to prepare librarians for more open and data-intensive scientific research. Among them, the Harvard-Smithsonian Center for Astrophysics John G. Wolbach Library and the Harvard Library, have developed, two years ago, an experimental course to train librarians to respond to the growing data needs of their communities: the Data Scientist Training for Librarians (DST4L) (13). In this free, hands-on course, librarians were taught about the research data lifecycle and they started to learn the basics of some of the latest tools for extracting, analyzing, storing, and visualizing data. In 2015 the course was hosted in Europe by the Technical University of Denmark Library of Lyngby, Copenhagen (<http://www.altbibl.io/dtu/>), and I was one of the 40 librarians who were selected to participate.

In this three day course we learned how to use several such tools through hands-on practice: OpenRefine, an open source desktop application for data cleanup and transformation to other formats, GitHub, a web-based collaborative platform for code and content management and review, Python, a programming language. The course also included an introduction to the basics of data visualization. One of the great things about DST4L is its hands-on approach to data-driven projects. The course is useful also for librarians who don't intend to work directly on these kinds of projects because after working directly with messy, unavailable or difficult-to-access data it is possible to have a more complete vision of the different issues the researchers have to face when working with data. Much of the DST4L course material is currently accessible through a WordPress site along with blog entries, written by participants, with accompanying notes, code, data, and anything else used in the sessions (<http://altbibl.io/dst4l/>).

Conclusion

Data management is still in its emergent phase and funding agency mandates are relatively new so only a few libraries have already developed strategies to assist their researchers with their data and in creating Data Management Plans. It is already clear that librarians, along with their traditional skills, such as their ability to retrieve and organize

information, consult and teach, should develop an understanding of the technical aspects of data management, developing new skills and capabilities. Experiencing the research data lifecycle firsthand and upgrading to data savvy skills could help librarians improve outreach and services to scientists but could also, at the same time, help them to explore new ideas to improve the workflow at their library, making them more efficient in their existing roles.

*Received on 5 February 2016.
Accepted on 15 February 2016.*

REFERENCES

1. European Commission. Directorate-General for Research & Innovation. Guidelines on Open Access to Scientific Publications and Research Data in Horizon 2020. October 2015. Available from: http://ec.europa.eu/research/participants/data/ref/h2020/grants_manual/hi/oa_pilot/h2020-hi-oa-pilot-guide_en.pdf
2. European Commission. Directorate-General for Research & Innovation. Guidelines on Data Management in Horizon 2020. October 2015. Available from: http://ec.europa.eu/research/participants/data/ref/h2020/grants_manual/hi/oa_pilot/h2020-hi-oa-data-mgt_en.pdf
3. Nature Publishing Group. Availability of data, material and methods. Available from: <http://www.nature.com/authors/policies/availability.html>
4. Public Library of Science. Data Availability. Available from: <http://journals.plos.org/plosone/s/data-availability>
5. MacMillan D. Data Sharing and Discovery: What Librarians Need to Know. *J Acad Librariansh*. 2014; 40 (5): 541-549
6. Tenopir C, Birch B, Allard S. Academic librarians and research data services: an ACRL White Paper. 2012. Available from: http://www.ala.org/acrl/sites/ala.org.acrl/files/content/publications/wHITEpapers/Tenopir_Birch_Allard.pdf
7. Johnson L, Adams Becker S, Estrada V, Freeman A. NMC Horizon Report: 2015 Library Edition. Austin, Texas: The New Media Consortium. Available from: <http://cdn.nmc.org/media/2015-nmc-horizon-report-library-EN.pdf>
8. ACRL Research Planning and Review Committee. 2012 Top Ten Trends in Academic Libraries. *Coll Res Libr News* June 2012; 73 (6): 311–320. Available from: <http://crln.acrl.org/content/73/6/311.full.pdf+html>
9. Auckland M. Re-skilling for research: An investigation into the role and skills of subject and liaison librarians required to effectively support the evolving information needs of researchers. 2012. London: Research Libraries UK. Available from: <http://www.rluk.ac.uk/wp-content/uploads/2014/02/RLUK-Re-skilling.pdf>
10. Erdmann C. Teaching Librarians to be Data Scientists. *Inform Outlook*. 2014; 18 (3): 21-24
11. Sykes T. Why would a librarian need to code. [blog post]. 2016 Jan 24. In: Code and the librarian. Available from: <http://codeandthelibrarian.wordpress.com/2016/01/24/why-would-a-librarian-learn-to-code/>
12. Coding for Librarians: Learning by Example, *Libr Technol Rep*. 2015; 51 (3): 1-30
13. Erdmann C. Data Scientist Training for Librarians, Library and Information Services in Astronomy VII: Open Science at the Frontiers of Librarianship ASP Conference Series. Vol. 492: 31-37

Library impact, value and marketing: how do they fit together?

Jenny Turner

East Sussex Healthcare NHS Trust, Hastings, East Sussex, United Kingdom

Abstract

This article explores where marketing fits with the process of identifying and capturing the impact of libraries and demonstrating library value. It considers whether having a clear concept of marketing is useful in practice. Drawing on Value and Impact work in healthcare libraries it concludes that adopting marketing as a strategic management process may help make work capturing impact and demonstrating value become mainstream.

Key words: libraries; librarians; marketing.

Introduction

The purpose of this article is to explore where marketing fits in the process of identifying and capturing the impact of libraries, and demonstrating their value. Does having a specific concept of marketing make a difference to what we do?

As has been well documented the terms impact, value and marketing are used in different ways and depend on a context and a situation for meaning (1-3)

Marketing: strategic management process not just publicity

I still tend to use the word marketing as a synonym for advertising “we must market our library using impact statements that demonstrate the value of what we do”, which is not uncommon (2). As Garoufallou (1) identifies however, the consensus is “that marketing is a customer-oriented strategic management process, which combines both a theoretical framework as well as a practical set of method and techniques”. Marketing can be the term used to describe a complete management process that ensures the clients (users and non-users) are at the centre of service development and the procurement of resources. Marketing requires library managers to be clear about the purpose of their service, and to know who their clients, and client groups are. From this they can profile

information needs, wants and likely future demands. Developing and maintaining a relationship with clients means the service can respond to expressed needs, and also create demand.

Viewing marketing as a client-focussed strategic management process makes the link with value and impact work obvious. Knowing what services make a difference (have an impact) makes it possible to tailor services to needs. Money is not wasted publicising services to those who are never likely to need them.

Value and Impact

The recent ISO definition of impact is “difference or change in an individual or group resulting from the contact with library services” (4) If the library service captures the difference made or change then value can perhaps be demonstrated.

Some research seeks to measure objective changes (5, 6). To prove that contact with a library (separate from any other factors) caused a change is clearly very difficult. The impacts therefore are often self-perceived, as used in the NHS Impacts toolkit (7). Individuals’ value different information and different impacts, and what is valued may change over time, or depend on the role they are in (8). We need to recognise what our clients’ value (for advertising, service and resource development) and also what our funding bodies, shareholders and wider

Address for correspondence: Jenny Turner, East Sussex Healthcare NHS Trust, Rosewell Library, Conquest Hospital, Hastings, East Sussex, United Kingdom. E-mail: jenny.turner2@nhs.net.

Library impact, value and marketing: how do they fit together?

organisations value (to demonstrate our contribution to achieving what is valued). Recent work on public value identifies that “public organisations that have no mandate (or authorizing environment) cannot survive, however noble their mission, and however capable their operational abilities” (9). Basically if the public doesn’t value what is being done, then why would they continue supporting it? Back to the marketing process - it takes an on-going two-way relationship to build a shared concept of library value. Christine Urquhart identifies value creation and value co-creation, noting “there are ideas for reflection from marketing science, but no easy answers” (10).

Value context for NHS libraries

My context for value and impact is healthcare libraries in NHS England. We have a clear, over-arching social value: good health. This value is generally shared by NHS librarians, public, patients, funders and managers. It is translated into a mission statement for NHS England (“Health and high quality care for all, now and future generations”) (11) and countless objectives at individual, group and organisational level. NHS library impacts need to resonate with that value structure. Capturing and publicising the impacts means we can demonstrate our contribution because the impacts relate to what is valued.

Although the over-arching value is a social one, local organisational values may be in the economic tradition, where value is measured in pounds. Research in healthcare libraries (5, 6) shows the impact of using the library can be linked to the objective measure of money (e.g. £Xs saved by reducing the length of time in hospital using information from a library literature search).

Research (12, 13, 8) has identified a range of self-perceived impacts that are relevant to healthcare (“I believe that information from the library influenced my decision and reduced patient risk/saved money/improved an essay”). Impacts are identified through the focus on an information incident (information supplied, or a training session delivered), often using the critical incident technique (13, 14).

Knowledge for Healthcare is the framework for the development of NHS Libraries in England (14, 15). The work programme to deliver the vision includes

a workstream for Quality and Impact, which, among other things, aims to enhance the existing Impact toolkit. Embedding the process of capturing and demonstrating impact into day-to-day practice is likely to be a challenge. What is the motivation for libraries? Is it to ward off cuts; publicise what we have in terms that will appeal to our clients; because we have to tick the box in a monitoring scheme; to inform service development and resource purchase; all of these things and others?

Conclusion

Most library managers agree that marketing is important, and it is worth emphasising that collecting evidence of value and impact is part of that process. Knowledge about what matters to the client and client group helps managers to plan more effectively for the future. Publicising evidence of impact at local and national level helps create a shared public value. Adopting marketing as a strategic management process would make impact and value work mainstream library activities, as they clearly sit within that strategic approach.

Yes, seems to be the answer to the question posed at the beginning. Our concept of marketing can change the way we work, and focus energy and time on the client interaction.

Acknowledgement

The author wishes to thank Christine Urquhart (Aberystwyth University) for her advice on the manuscript.

Received on 2 February 2016.

Accepted on 15 February 2016.

REFERENCES

1. Garoufallou E, Siatri R, Zafeiriou G and E Balampanidou. The use of marketing concepts in library services: a literature review. *Library Review*. 2013;62(4/5):312-34.
2. Gupta DK, Koontz C, Massismo A, editors. *Marketing library and information services-II: a global outlook*, IFLA publication 159. Berlin: Walter de Gruyter; 2013.

3. Saracevic T, Kantor P. Studying the value of library and information services. Part 1: establishing a theoretical framework. *Journal of the American Society for Information Science*. 1997;48(6):527-42.
4. ISO 16439:2014(E). Information and documentation - Methods and procedures for assessing the impact of libraries. ISO 2014.
5. Banks D, Shi R, Timm D, Christopher K, Dugger D, Comegys M, Mclarty J. Decreased hospital length of stay associated with presentation of cases at morning report with librarian support. *Journal of the Medical Library Association*. 2007;92(1):46-55.
6. Klein M, Vantoll Ross F, Adams D, Gilbert C. Effect of online literature searching on length of stay and patient care costs. *Academic Medicine*. 1994;69(6):489-95.
7. NHS library and knowledge services. Assessing the impact of health libraries: a practical online toolkit. [cited 18 Nov 2015]. Available from: http://www.libraryservices.nhs.uk/forlibrarystaff/impactassessment/impact_toolkit.html.
8. Urquhart C, Hepworth J. The value of information supplied to clinicians by health libraries: devising an outcomes-based assessment of the contribution of libraries to clinical decision-making. *Health Libraries Review*. 1995;12(3):201-13.
9. Lusk S, Birks N. *Rethinking public strategy*. Houndsmill: Palgrave Macmillan; 2014.
10. Urquhart C. Reflections on the value and impact of library and information services. Part 1 value identification and value creation. *Performance Measurement and Metrics*. 2015. 16(1):86-102.
11. NHS England. Health and high quality care for all, now and for future generations. [cited 18 Nov 2015]. Available from: <https://www.england.nhs.uk/about/our-vision-and-purpose/>
12. Marshall J. The impact of the hospital library on clinical decision making: the Rochester study. *Bulletin of the Medical Library Association*. 1992;80(2):169-78.
13. Weightman A, Urquhart C, Spink S, Thomas R: National library for health library services development group. The value and impact of information provided through library services for patient care: developing guidance for best practice. *Health Information and Libraries Journal*. 2009;26(1):63-71.
14. Urquhart C, Light A, Thomas R, Barker A, Yeoman A, Cooper J, Armstrong C, Fenton R, Lonsdale R, Spink S. Critical incident technique and explicitation interviewing in studies of information behaviour. *Library and Information Science Research*. 2003;25(1):63-88.
15. NHS Health Education England. Knowledge for Healthcare. [cited 18 Nov 2015] Available from: <http://hee.nhs.uk/wp-content/blogs.dir/321/files/2014/12/Knowledge-for-healthcare-framework.pdf>

Evidence-based decision making when refurbishing a medical library: a shorter way to better decisions?

Regina K fner Lein and Marion M hlburger

University of Bergen Library, Medicine and Dentistry Library, Bergen, Norway

Abstract

The question how to use the remaining open space after removing unused shelving gave us the idea to run an evidence-based library project at the Medicine and Dentistry Library at the University in Bergen. The transition from print to electronic literature has resulted in great physical changes in our library. Unnecessary bookshelves had to be removed and we had to decide what to do with the empty space in the library. We used evidence-based practice as a method for better decision making. The different steps during the project were: finding evidence from the literature, gathering information on user needs and preferences, involving our colleagues before making decisions. The results of the project were quite satisfying.

Working evidence-based contributed positively to the decision making process, and we have proven that we can work evidence-based within a short time frame.

Key words: libraries, medical; evidence-based practice; environment design; interior design and furnishings.

Introduction

Like many other libraries, the Medicine and Dentistry Library in Bergen is experiencing the decrease of printed in favour of digital literature. The consequence of e-journals replacing p-journals are many empty shelf-meters – and growing empty physical space in the library. In our case, the question was how we could best re-purpose the new space for our users? Should we, the librarians, make decisions based on what we think would be best for our users – as we had done so often before? We decided instead to use evidence-based library practice for decision making, wondering how many people it would involve and if it could be done within a short timeframe.

Methods

Evidence-based practice and evidence-based librarianship

Evidence-based medicine and evidence-based health care has been an important term in medical libraries for many years. Health care professionals increasingly use this method, and libraries support them at several stages, mainly in literature searching.

However, even if librarians at our library are familiar with evidence-based health care, we had not applied this method in our own daily practice to decision-making on library issues.

Evidence-based librarianship follows the same steps as all evidence-based practice: identifying the problem; finding the evidence; critical appraisal; implementation; evaluating the outcome (1, p. 6). Evidence for decision making on library issues derives from library research, from librarians' experience and practice, and from knowledge about the users' preferences.

Project members

In the beginning of the project, three persons were in charge: in a first meeting, two librarians, working in the Medicine and Dentistry Library on a daily basis, and their section leader, who was responsible for two other libraries in addition to the Medicine and Dentistry Library, decided how the project should be integrated into our daily workflow.

We were eager to work as efficiently as possible and keep the time used for the different steps to a

Address for correspondence: Regina K fner Lein, Medicine and Dentistry Library, University of Bergen, Post box 7808, 5020 Bergen, Norway. E-mail: regina.lein@uib.no

minimum. The three members of the project group had a final meeting after the various stages of data collection and literature search, and presented the material at a staff meeting. The following discussion in the staff meeting was meant to involve the other staff at the library in the project, get their ideas and feelings and include these into the gathered information.

Time frame

Doing the work within a short timeframe and integrating it into an everyday working situation was the reason why we kept the project group small and involved the other staff at the Medicine and Dentistry Library at a later point in the project. We put up a strict time schedule of only two months for information gathering. Because of summer holiday and other reasons, there was a break of about half a year before the implementation phase was started. At that time, a new head librarian/local leader of the Medicine and Dentistry Library was to take up her post and likely to be included in the project. Also, the administrative process had started.

Literature searching, user preferences and librarians' experiences

A general search of literature on users' needs and the library's physical space (search terms were: libraries, space utilization, library users, students, study carrels) in databases PubMed, LISTA and Svemed+ was performed by two librarians. The literature search took not more than about four hours, plus individual time to evaluate and read the literature, and resulted in twelve relevant articles. We were interested in user preferences and users' needs. We had some data from an earlier survey from 2009 (2) that we wanted to complement with additional data. Observations were made on how the students used the existing working places in our library, over a couple of average student work days, checking the students' use of computers at the library. We also got one of the dentistry students to post an open question on Facebook, asking her fellow students how the library should use the free space. At the end of the project we also put up a poster in the library's entrance area, depicting different kinds of furnishings, chairs and sofas that the users at the library symbolically could choose between or give us their comments on.

The librarians' expertise is an important part of evidence-based library practice. We have done other refurbishing-projects after removing shelves at the Medicine and Dentistry Library earlier, like establishing our computer room, or setting up tables and chairs for groups of two or three students. In the first case, we needed better teaching facilities and refurbished based only on the library's needs. Any changes in furnishing in the Medicine and Dentistry Library over the years have been positively accepted by the students. In this project, we included our colleagues at the Medicine and Dentistry Library by discussing the project at several occasions and took into consideration their experience and suggestions.

Results

Gathering knowledge phase

Results from the literature search showed that libraries should provide different types of learning space (3-5). What the users are looking for is "space for concentration, collaboration, contemplation, communication and socialization" (6, p. 106). Massis (7) puts the need for contemplation above all: "The timeless necessity for quiet place is as old (or as new) as the very concept of the library itself" (7, p. 398). The analysis of student preferences for study space, conducted by Applegate (3) showed that traditional carrels, and group study rooms were most used. Soft seating areas with sofas and chairs were the third most popular place.

We found that the results from the literature search were obvious: a library, and especially a university library with many student users, should offer different and varied seating. Also the importance of a quiet space was mentioned. Another crucial argument is the comfort-aspect of seating, or soft seating as Applegate (3) points out. As we have observed most of our regular users in the Medicine and Dentistry Library are students. We know that many of them use the library to read and learn. The regular reading desks and chairs were already in good use, so we opted to focus on the variation and the softness of the seating possibilities.

A user survey from 2009 (2) reflected the findings from the literature and partly from our own observations. Students would like to have more quiet places, but also more places where they can work together in groups. They also said that the

library is a good place for research, studying and learning.

Observations carried out in the Medicine and Dentistry Library during ten days in March 2012 gave a useful input on the use of computers in the library. During those days we counted a total of 325 students. The results were somehow surprising: 5% used their own computer, 35% worked without a computer and 60% used the library's computers. There were more library computers available at any time (out of 53 computers in the library, at no time more than 32 computers were in use simultaneously). This led to the conclusion that we already had enough computers in the library and that we wouldn't need more workspaces with computers. Also the traditional reading desks without computers were not occupied all the time (max 14 places in use out of 30). Again, we could not see that there was an immediate need for even more of the traditional reading desks.

At the same time we got the opportunity to put the question on Facebook (via one of the students) and reach one of the classes of dental students. Within less than 24 hours we got answers from seven students. They mentioned their wishes for massage chairs and comfortable chairs, sofas and more traditional reading desks.

From the librarians' point of view and working experience in the Medicine and Dentistry Library we knew that total silence was not really possible, as sound is carried throughout the rectangular rooms. Most of the study places were individual working places, and not much disturbing noise was caused by individually working students. Also the students themselves wanted to keep it silent and shushed each other when necessary. The computer room with 20 computers at the end of the library room was divided from the library shelves by thin walls and we would always hear the lecturer's voice. The new empty space we were trying to fill with new furniture was situated only about eight meters from the computer room, with three rows of bookshelves between. Therefore, the librarians did not suggest traditional silent reading desks in that area. The librarians have experienced an ever increasing number of working spaces, but also pointed out that all types of places and workspaces are in use. We concluded that soft seating in our library was the most underrepresented kind of seating, and that we

would go for that type of new furniture.

We finally removed the empty shelving and created the open area we wanted to change. We then asked our students directly in the library how they would like to use the new space. We put up flipcharts with pictures of chairs and sofas and asked the students for comments. And they agreed with the results of the project in that soft seating and nice chairs and sofas would be a good idea.

Implementation period

At a staff meeting we discussed the findings with our colleagues at the Medicine and Dentistry Library. We also tried to figure out how we would be able to put newly gained knowledge into everyday practice and how we could use that new knowledge on our users' needs. Literature and observations collected through the evidence-based working method were useful tools in the process of decision making on what we wanted to do with the new area. We were able to bring forward arguments that we wouldn't have had otherwise. Everyone agreed on the decision to buy soft seating furniture.

Despite this fact, the further implementation was not as smooth as expected. The Medicine and Dentistry Library had no budgets of their own and had to involve the central library administration. For our colleagues in the administration and the finance department these ideas of soft seating environment were new and unfamiliar – even if they were based on best evidence. Our request for funding for furniture was therefore met with skepticism. In addition, our library was dealing with a very tight budget, and we knew that we would not get to buy fancy Danish design-chairs (and yet we hoped for it).

For some time we faced confusion and some frustration about the further steps of the project. We were no longer able to recognize who was in charge of the project and its implementation – the project group, the strategic leader, the head of administration or the finance managers, and time flew while we were waiting for clarification about the budgets and type of chairs.

Eventually, we took delivery of a sofa, comfortable chairs and three small tables. The students' favorites were two grey wing chairs where they almost could hide. Together with the old subject catalog the area has an inviting atmosphere (*Figure 1*). The students



Figure 1. Soft seating at the Medicine and Dentistry Library in Bergen, the “breathing-hole”/”Pustehullet” (copyright Regina Kűfner Lein)

also like the flexibility of the room, being able to move around the chairs to accommodate larger or smaller groups. Still there was space for more chairs, and we hoped for the next years budget.

Two years with the new furniture

Looking back on the project about two years after the implementation, the conclusion is that the furniture work out as planned. The library users choose this new area when they want to sit down comfortably and read most of the day. We call it the “breathing hole” (Norwegian “Pustehullet”) due to its qualities as a recreational area within the library. Recent observations in our library (February 2016) showed that about 70%-80% of the places are occupied during a normal workday (even more during exam times).

What we have seen is that the quality of the furniture in a library has to be thought about according to everyday use by many different people. Soft seating automatically needs to be cleaned more often than furniture without fabrics or upholstery. Also, static electricity can be a problem when using synthetic materials, and they work like magnets on long hair etc. When furnishing with soft seating, one should take the cleaning services of the institution into consideration in order to make sure hygiene is taken care of appropriately.

Further plans for the area

The faculty of Medicine and Dentistry has decided to transform group rooms adjacent to the library

into a modern skills center for students. Due to lack of space in their area, faculty plans now include a substantial part of the library’s area. Plans are that even more of our shelving will be removed, and instead group rooms will be established. Also, the library’s computer room will be moved to a new area, much of it part of the breathing hole/Pustehullet. The new plans for our library show that we will lose quite a lot of the space that we had gained earlier by removing bookshelves. Due to the faculty’s plans we have to re-think the entire library, and not only the area defined earlier.

The evidence based project still gives us the possibility to use the results in discussions and meetings with both library management and faculty. The architect’s drawings have been remodeled due to our input, which we based on the EBP-project. Soft seating has been requested, and also the need for varied furnishings in the library. Quite a few of our ideas have been taken into consideration in the planning phase. Still, the library will lose about two thirds of the students’ working spaces during the building period (not included all the places that won’t be used due to building noise), and a yet to be confirmed number of places in the new library.

N.B.: the planning phase of the skills-center-project is not yet over, so we do not have the possibility to make further comments on what our library is actually going to be like in future.

Evaluation of the new area and the project

Evaluation is an essential part of the evidence-based working method. However, until now we have not evaluated the new sitting area through a student survey. The first year we still hoped for more furniture as we did not consider that new area for finished. As mentioned in the previous chapter, the faculty had other plans for adjacent areas which also included the library, and therefore we had to put any further acquisition of new furniture on hold for the time being.

As the results of the project at the Medicine and Dentistry Library in Bergen have shown, we were able to keep up to quite a short timeframe, at least in the first phase of information gathering. Especially satisfying was that we could use different methods for user feedback, and the fact that both social media and old fashioned flip-over gave quick responses on users’ needs and preferences. To use

several ways for feedback from users is highly recommended (8, 9).

Few persons were involved in the beginning, which truly was essential for working efficiently in that phase. However, we learned that we should have involved other colleagues from administration and the finance department earlier in the project for smoother implementation of our findings and more realistic expectations of time frame and possible achievement in the project. In our case there were also other external factors like construction and architectural considerations that were not easy (or not at all possible) to overcome.

Conclusions

We found that it in fact is possible to use evidence-based practice in a busy everyday working situation. The additional time we spent working evidence-based was minimal and manageable, and the results can be reused in another context or project.

As a conclusion for this project, and new projects to come, we will have to plan differently, and include relevant people in an earlier phase. We expect this might make the implementation process easier. Overall, we will try to use evidence-based methods more often for decision-making in other projects in our library.

*Submitted on invitation.
Accepted on 15 February 2016.*

REFERENCES

1. Booth A, Brice A. Evidence-based practice for information professionals : a handbook. London: Facet Pub.; 2004. xvi, 304 p.
2. Kullerud M, Gjuvsland E, Bakka PH, Arnesen E. Resultater fra brukerundersøkelsen 2009 [Results from the user survey 2009]. Bergen: Universitetsbiblioteket i Bergen, internal report; 2009.
3. Applegate R. The library is for studying: Student preferences for study space. *Journal of Academic Librarianship*. 2009;35(4):341-6.
4. Walton G. Learners' Demands and Expectations for Space in a University Library: Outcomes from a survey at Loughborough University. *New Review of Academic Librarianship*. 2006;12(2):133-49.
5. Hermanrud E. Kinderegg til studentene. *Bibliotekforum*. 2012(3):26-9.
6. Ludwig L. Health sciences libraries building survey, 1999-2009. *J Med Libr Assoc*. 2010;98(2):105-34.
7. Massis BE. In the library: quiet space endures. *New Library World*. 2012;113(7/8):396-9.
8. May F. Methods for Studying the Use of Public Spaces in Libraries. *Canadian Journal of Information & Library Sciences*. 2011;35(4):354-66.
9. Carrigan E. Navigating User Feedback Channels to Chart an Evidence Based Course for Library Redesign. *Evidence Based Library & Information Practice*. 2012;7(1):70-81.

Qualitative research methods: interviewing as a way of learning and knowing

Johanna Rivano Eckerdal

Senior lecturer, Information Studies, Department of Arts and Cultural Sciences, Lund University, Lund, Sweden

Abstract

This paper is based on the keynote talk that I gave on the EAHIL+ICAHIS+ICLC 2015 Workshop in Edinburgh. A starting point for the talk was the theme for the Workshop: "Research-minded: supporting, understanding, conducting research". Some features of qualitative research are presented and a number of methods are mentioned before zooming in on interviewing, discussing some aspects of that method with examples from my own work. As a conclusion the importance of understanding the limitations of research both for researchers and those taking part of the results is emphasised.

Key words: qualitative research; reproductive health; contraceptives; information literacy; information seeking behaviour

Introduction

In this paper I will sketch some of the features of qualitative research and mention a number of methods before I move on and zoom in on interviewing, discussing some aspects of that method and present examples from my own work. I will conclude by emphasising the importance of understanding the limitations of research both for researchers and those taking part of the results. I will start by telling you how I became interested in research.

I worked as a librarian in an upper secondary school in Malmö, a city in southern Sweden. We librarians held a series of learning activities for pupils to attend during their 3 years at the school, activities with the aim of strengthening their information literacy. It struck us, it struck me very much, that many of them were not interested in the possibilities that we offered to deepen their knowledge and skills in information seeking and use. How come that the pupils were not interested to learn more about these, as I saw it, very important issues? I had this question on my mind and I could not find any research addressing it.

I was also interested in looking into information literacy in an area outside the educational and workplace settings since studies of it in everyday life were and still are scarce.

These were the starting points for my decision to enter a PhD program. I believe that being open to reflect about one's work is a fruitful starting point for research; to be willing to question routines and everyday behaviour as well as changes that you experience in those routines and practices, asking questions about them and wanting to learn more.

I set up a number of requirements that I wanted the project to meet. Taken together, I found that sexual health and more specifically how information sources are evaluated before young women choose a contraceptive met those requirements. And in order to know more about young people's own perspective I chose ethnographic methods in my project.

Methodology

Whenever referring to methodology a commonly made division is the one behind this talk: that of distinguishing qualitative from quantitative methods.

This is in many cases an unhappy separation as it gives the impression of two approaches in opposition. But these approaches may as well complement each other. What method you use depends on the aim and the questions you have set up, for the knowledge obtained with each method differ. A combination of both qualitative and

Address for correspondence: Johanna Rivano Eckerdal, Information Studies, Department of Arts and Cultural Sciences, Lund University, Box 192, 221 00 Lund, Sweden. E-mail: Johanna.rivano_eckerdal@kultur.lu.se

quantitative methods can be a very useful design for a project. I have recently been part of a study of staff-less libraries in Southern Sweden, in which a web-survey was combined with semi-structured interviews. The web-survey was sent to all staff working at staff-less libraries in the region; four of them were also contacted and asked to take part in individual interviews. In these interviews understandings of more depth than in the survey were possible (1). But more often the approach is either quantitative or qualitative in a research project.

Qualitative methods are chosen when a project is set out to explore an issue in depth and to know more about meanings and understandings of a topic for people (2). Qualitative methods include interviews, focus groups, observations, observant participation, shadowing, and when material is obtained in online-environments: netnography, diaries, analysis of texts in documents of various kinds and analysis of images and more (3, 4).

The theoretical starting point and how knowledge is viewed within that theoretical perspective often influence the vocabulary used to describe the process. Consider the wording used to describe the process of obtaining empirical material for a project. You can talk about gathering or harvesting material. This brings with it a view about the material as if it is out there in the real world and the researcher is someone who collects or harvests it. In that view the researcher may be replaced without the material being changed in any major way. Another way of phrasing it is to talk about how the material is produced or generated in a process in which the researcher is involved in a project that leads her/him to interact with the surrounding world in certain ways. These interactions shape the material that is produced, the researcher having an impact on that production. If the researcher is replaced the material will inevitably change too. I join this latter view of how a researcher engages in knowledge production when the empirical material is generated.

Interviews

Interviews are perhaps the most used method under the qualitative method umbrella. There are several forms of interviews from

structured interview to life-historical conversations (5). A common form is the semi-structured interview in which the researcher uses an interview-guide during the interview. The guide is often divided into themes that the interviewer is interested to cover during the interview, but the sequence in which the themes and questions are asked is not fixed. The interviewer allows the interview to develop as a conversation and introduces new themes once any one theme is covered.

There are different understandings of the interview, and the roles that the interviewer as well as the interviewee have during the interview. Steinar Kvale has presented two useful metaphors for thinking about different approaches to interviewing (5). He talks about the interviewer as a miner or as a traveller. The metaphors relate to the distinction I made earlier between harvesting and producing empirical material and circle around the questions of what knowledge is and how it is possible to gain knowledge. The miner sets out to find the truth that is somewhere out there, hidden precious metals deep down in the ground. So it takes a lot of effort to know where to dig. The traveller is on a journey and as in this quote: “wanders through the landscape and enters into conversations with people he or she encounters” (5, p. 48).

Discussions about what kind of knowledge is possible to gain from interviewing have led to criticism towards the method. Today many researchers point to the importance of acknowledging the context. What is said during an interview is to a high degree shaped by being formulated in the interview situation. So what does that specific conversation say about other situations, about the situations that are the topic of the interview? Is it at all possible to get to know how something is outside the interview situation? Roger Säljö (6) has pointed out the difference between thinking and talking. We do not necessarily say what we think, but in everyday way of talking and also in research this distinction is often neglected. It is what people say that we can study. Consequently the distinction between thinking and communicating is important. It is communication that is possible to research (6).

So what we can call the standard practice of interviewing has been debated and criticised. And I believe that there are important questions to solve

if you want to use interviews. The only feasible way, both ethically and practically, for me to study how young women evaluated information sources about contraceptives was to interview them. I have presented elsewhere in detail how I designed my project to meet the criticism raised towards the method (7).

Narrative research interviews

The narrative research interview methodology presented by Elliot Mishler's provided an important basis both theoretically and practically (8). Mishler acknowledges that interviewing is problematic but instead of rejecting the method he presents several aspects to bear in mind when interviewing.

Mishler's narrative research interview focuses on the interview as a form of discourse (8, p. 35-36). Nowadays interviews are recorded. Afterwards, the researcher listens to the recording and writes it down as text, a transcript is created. Mishler defines the act of transcribing as an interpretation (8, p. 48), that is an analytical act. Once the transcript is created the analysis continues. With an understanding of interviews from a narrative point of view, interview questions are not viewed as stimuli that trigger typical behaviours of the respondents (8, p. 54). Instead, the interview is understood as a joint construction by interviewer and interviewee (8, p. 117). The questions asked and the answers given are negotiated during the interaction. The transcript allows the researcher to follow how the understanding evolves during the interview.

The interviewer has the power to steer the conversation and also to decide over the analysis afterwards. Mishler acknowledges this imbalance in power and proposes that the interviewer should invite the interviewee to participate in the interview and take active part in creating the outcome of the conversation (8, p. 117). In my study I included three kinds of visual tools to enhance the participation of the interviewees: the creation of a map (9), a deck of cards with information sources and an information source horizon (10, 11). Conducting the interview as proposed opens up a potential for the interview to become empowering for the interviewees and to create opportunities for learning (8, p. 117); a situation in which interviewer and interviewee together learn more about the topic of the conversation. In my project, the interviews

made it possible for me to learn more about how the young women I met reason around use of contraceptives and the role information had in that reasoning.

The analytical gaze

The doings of qualitative research do also involve the analytical process of making sense of it as research: how the empirical material tells you something about the question you asked when starting your research endeavour. This means that the analytical gaze you use has an effect on what kind of knowledge that is gained in the research project. Theoretical starting points and tools are often described with the use of visual metaphors as different theoretical perspectives. We can go along with that metaphor and talk about theories as presenting certain lenses that you use and, depending on the lens chosen, the picture or pictures that are developed during the research project will differ: some things will be clearly developed while other things will be blurred into the background. This is part of doing research.

Understanding and supporting research

I do think that this is important to have in mind when considering the aspects of understanding and supporting research: research have always limitations, the world that we live in is a complex place and to be able to conduct research at all you have to make choices: choices of what questions to ask, what population to investigate, what theoretical tools to use and what methods to adopt: All these choices mould the produced knowledge. To be able to grasp the complexity of the world in its whole is not the aim of any single research project. Yet each project adds another piece to the large, ever changing picture that we have. But if we expect research to give complete and definitive answers for everything we will be disappointed. Instead, I argue that researchers should be transparent about the choices that they make while conducting their research to allow for anyone who wants to take part of the results to get their expectations at the right level.

When working with research results as many of you do I hope that these insights into the doings of research and my reasons for choosing specific tools and methods may be useful for understanding and

supporting qualitative research endeavours that are perhaps not the mainstream ones within the medical field today.

Conclusions

I have mentioned a number of qualitative methods but mainly focussed on interviewing and pointed at some benefits as well as weaknesses of the method, giving you examples from my research to show you how I designed a study that allowed me to keep the interview format while recognizing its drawbacks. I have concluded by returning to qualitative methods and research in general and how the limitations of research are important to bear in mind for researchers and those taking part of the research. My understanding of the aim for us all, working within the library and information studies field, be it as researchers, information specialists, librarians or in other roles, is to help people do the things they need and want to do. And within this understanding, I think that research conducted with qualitative methods has a lot of valuable knowledge to offer for us all to learn from, for making us better equipped in our different roles. So let us all be open-minded to questions in our daily lives that needs attention and let us engage in them!

*Received on 5 February 2016.
Accepted on 15 February 2016.*

REFERENCES

1. Johansson G, Lindberg E, Rivano Eckerdal J. Meröppna bibliotek – en verksamhetsform för alla? Institutionen för kulturvetenskaper, avdelningen för ABM, Lunds universitet: Lund; 2015. [<https://lup.lub.lu.se/search/publication/5035199>] Swedish.
2. Denzin NK, Lincoln YS. Introduction: The discipline and practice of qualitative research. In: Denzin NK, Lincoln YS, editors. Handbook of qualitative research. 2nd ed. Thousand Oaks: Sage; 2000. p. 1-28.
3. Mason J. Qualitative researching. 2nd ed. Los Angeles: Sage; 2002.
4. Czarniawska B. Shadowing and other techniques for doing fieldwork in modern societies. Malmö: Liber; 2007.
5. Kvale S, Brinkmann S. InterViews: learning the craft of qualitative research interviewing. 2nd ed. Los Angeles: Sage; 2009.
6. Säljö R. Talk as data and practice – A critical look at phenomenographic inquiry and the appeal to experience. Higher Education Research & Development. 1997;16(2): 173-90.
7. Rivano Eckerdal J. Empowering interviews: narrative interviews in the study of information literacy in everyday life settings. Information Research. 2013;18(3): paperC10.
8. Mishler EG. Research Interviewing: context and narrative. Cambridge, Mass: Harvard University Press; 1986.
9. Elovaara P, Igira, FJ & Mörtberg C. Whose participation? Whose knowledge? Proceedings of the ninth conference on Participatory design: Expanding boundaries in design. Vol. 1. New York: ACM; 2006. p. 105-114.
10. Sonnenwald DH, Wildemuth BM, Harmon GT. A research method to investigate information seeking using the concept of information horizons: an example from a study of lower socio-economic student's information seeking behaviour. The New Review of Information Behaviour Research. 2001;2:65-86.
11. Savolainen R, Kari J. Placing the Internet in information source horizons: a study of information seeking by Internet users in the context of self-development. Library & Information Science Research. 2004;26(4):415-33.



15th EAHIL Conference 6-11 June 2016 Seville, Spain

We invite you to keep updated on The 15th Conference which will be held in Seville (Spain) in early June 2016 (June 6-11) visiting our website: <http://www.bvsspa.es/eahil2016/>

These are the Continuing Education Courses which will be held on Monday 6th and Tuesday 7th:

Knowledge, Research, Innovation ... **eHealth**

CONTINUING EDUCATION COURSES	
Research4Life & Internet-based Information Resources for Health & Science Professionals in Low and Emerging Income Countries	Lenny RHINE Gaby CARO
Searching Clinical Trials.gov, the WHO portal and other trials registers and regulatory sources to improve the reliability of systematic reviews	Carol LEFEBVRE
Improving efficiency and confidence in systematic searching: A new way of searching bibliographic databases	Wichor BRAMER Gerdien DE JONGE
More appeal to systematic searching: a middle way to satisfy library directors, library clients and the search theory	Maurizio GRILLI
Navigating International Veterinary Medicine Information: An Introduction for Health Sciences Libraries	Esther CARRIGAN Heather K. MOBERLY
From Bibliometrics to Altmetrics: a new concept of Impact	Valeria SCOTTI
Community Managers tools for Health Sciences Libraries	Elena PASTOR
Rigour, results and relevance – What there is to know about critical appraisal!	Mala MANN
Mendeley: using reference manager software to help organizing the institutional scientific research	Silvia LOPES
Opportunities and Limitations of Bibliometrics in Research Evaluation: Planning Reports and Showing Results	Alicia F. GOMEZ
The inevitability of Open Access. Why librarians have to foster it	Pilar TORO
Increasing the visibility of impact of health science librarians & libraries	Aoife LAWTON

Oral and poster presentations will focus on topics such as metrics, innovation, open access, scholarly dissemination, cooperation, research, education, technology, management & leadership. There are 62 oral presentations and 54 posters not only from European countries but also American, South African, Asian... There will be a worldwide representation at the Seville Conference.

The Local Organizing Committee is still working hard for providing all the participants with the most affordable and amazing time. They managed to obtain a wide range of sponsors and exhibitors and this will allow them to offer you a cheaper registration fee. We can confirm the following ones, by now:



15th EAHIL Conference 6-11 June 2016 Seville, Spain

- **Diamond sponsors:** Wolters Kluwer, Elsevier
- **Platinum sponsors:** Springer, Wiley, ProQuest
- **Gold sponsors:** EBSCO Health, McGraw-Hill Education, Accucoms, BMJ
- **Exhibitors:** NEJM Group, Subito, KARGER, Primal Pictures, CABI, SAGE, eLicensing David Charles, The JAMA Network, Third Iron, Jove, Oxford University Press, Future Science Group, ACS Publications.
- **Partners:** Health Regional Ministry (Government of Andalusia), i+D Andalusian Foundation, Rebisalud, University of Seville, Pablo de Olavide University Foundation

And many others have shown their interest in participating.

RENFE, the national company for railway, granted the Organization with a 30% price discount on tickets for all the train arriving at Seville Santa Justa station whose destination is the EAHIL Conference. Participants should ask for their bonus when registering

We also thought on your free time, when you need to disconnect from “working sessions”: take a look to the specific discounts at restaurants, bars and spectacles for EAHIL Conference attendants.

Remember that registration will be opened from March 1, 2016 to April 30, 2016; don't forget that early registration will end on March 31, 2016.

Updated information on the meeting will be uploaded at due time to the websites of EAHIL and BVSSPA, as well as on social media channels.

Come to Seville and don't miss this opportunity to share your expertise and knowledge with colleagues from all around the world. You won't forget this 30th anniversary of the EAHIL which is celebrated together with the 10th anniversary of the Andalusian eHealth Library!



 <http://www.eahil2016.com>

 @EAHIL2016

 seville@eahil2016.com



Letter from the President



Marshall Dozier

Information Services
University of Edinburgh
Edinburgh, UK
Contact: marshall.dozier@ed.ac.uk

Dear Colleagues,

With this first issue for 2016, I send you wishes for a successful year!

I've written a letter with two parts: first, I'll highlight a few important EAHIL matters for this year; then in a more adventurous spirit, I'd like to tell you about some work we have been doing at my institution with Wikipedia editing.

EAHIL Conference and Elections in 2016

The key event this year will be the conference in Seville in June (www.bvsspa.es/eahil2016/). As a member of the IPC, I visited Seville and the conference hotel – I know it will be an excellent venue in a beautiful city, and that there will be a great variety of presentations and posters on topics relevant to our current and future work. Veronica Juan and Pilar Roque and their teams have been doing an excellent job, and I look forward to seeing you in Seville!

Elections for President and Board will happen in the next few months, and outcomes announced at the General Assembly in Seville. Please see the dedicated pages in this issue for information on nominations and voting. The new terms for newly elected members will begin in January 2017.

Later this year, we will have nominations and voting for Council members for each country where there are vacancies. The outcomes will be announced in late autumn and the new Councillors will begin their term in January 2017.

We hope to receive a nomination form from you!

Wikipedia for information literacy

At the University of Edinburgh, we are currently in the last stages of preparation for our second multi-day Wikipedia “editathon”. An “editathon” is like a marathon, but instead of running for a long time, we are writing and editing Wikipedia articles.

We had our first editathon in February 2015, and it was a great success: over the course of four consecutive afternoons, about 80 people came to join in (some came back on successive days, some only came for one day). We had a great mix of people, from first-year undergraduate students to emeritus professors, and there was a real “buzz” of activity – identifying articles or topics that needed work, finding suitable resources, learning how to write in the preferred Wikipedia style, talking about exciting connections found between topics... On the back of that and subsequent events, we have now also appointed a Wikimedian in Residence who will be with us for a year to help us raise awareness, work on cultural change, and embed activities in curricula.

Why are we engaging with Wikipedia in this way? Here are some of the reasons:

Wikipedia is probably the largest open educational resource currently available. As a matter of principle, we are interested in improving access to information and learning, so engaging with Wikipedia is one way of achieving this broader aim.

Wikipedia is heavily used by students and academic staff as a source of information (even if they don't admit it). So, it is very important to try to ensure that the quality of the information in Wikipedia is high – as good as we can make it.

Most interesting to me, and possibly to you, Wikipedia is a valuable tool for contextualising and improving information literacy. Wikipedia is often criticised for the fact that just about anyone can edit it – so how reliable are its contents? Instead of treating this as a problem to be avoided, though, we can turn this into an opportunity for critical engagement and development of skills in information handling.

Critical engagement: it takes students some time to become knowledgeable enough in a new area to disentangle various perspectives on a particular topic, especially if the topic might be contentious. Students need to become aware that information is never completely neutrally presented in that at a minimum, there is selection of what to present, and there may be degrees of interpretation or framing that influence the presentation of a topic. A quick way of getting students to have some insight into the negotiations of interpretation and representation that go on 'behind the scenes' of a Wikipedia article is to get them to look at the 'Talk' tab for a topic that interests them. There, the authors of the page will discuss, sometimes with a lot of vigour, the way the article is written.

Skills development: good articles in Wikipedia are clearly written in non-technical language, well supported with references, well-illustrated with images, and well-linked with related topics. Writing in this way enhances students' communication skills, and gets them to think about use of appropriate supporting literature – both are directly relevant to good academic practice. In using images in Wikipedia, it is essential to become aware of copyright and learn about Creative Commons licences in particular. Seeing and making links between relevant topics not only helps students to contextualise their learning on a new topic, but it can help them to develop media and digital literacy skills too! Those are just a few ways in which students (and staff?) can develop their skills by working with Wikipedia.

Are you tempted to have a go yourself? Here are some support materials listed below. Do you already have Wikipedia-related activities at your institution? Let's talk!

Tips for organising a Wikipedia editathon: Wikipedia have a very good page of guidance for How to run an edit-a-thon that can be used as a planning tool and checklist of tasks, at https://en.wikipedia.org/wiki/Wikipedia:How_to_run_an_edit-a-thon.

A few resources that you might find helpful for getting started

- Fletcher N, Cardy J, Gray A, Cummings J, Mabbett A, Byrne J, Wikimedia Belgium. How to work successfully with Wikipedia: A guide for galleries, libraries, archives and museums. https://commons.wikimedia.org/wiki/File%3AWMBE-How_to_work_successfully_with_Wikipedia.pdf
- Wikimedia Foundation. Editing Wikipedia: A guide to improving content on the online encyclopedia. https://commons.wikimedia.org/wiki/File%3AEditing_Wikipedia_brochure_EN.pdf
- Wikimedia Foundation. Instructor Basics: How to Use Wikipedia as a Teaching Tool https://commons.wikimedia.org/wiki/File%3AInstructor_Basics_How_to_Use_Wikipedia_as_a_Teaching_Tool.pdf

All best wishes,

Marshall

News from EAHIL

EAHIL President and Executive Board elections 2016

Call for nominations

We seek nominations for the election of EAHIL President (2017-2018) and Executive Board members (2017-20). We will have vacancies for four Executive Board members in addition to the President role. EAHIL also co-opts the two un-elected candidates with the highest number of votes as co-opted Board members for a two-year period.

Deadline for nominations 15 April 2016

The official nomination form is available on the EAHIL website <http://eahil.eu/>

Nomination forms require the signatures of two nominators and must also be counter-signed by the candidate. Both nominators and candidates must be current full voting members of EAHIL. When completed, the forms should be received not later than 15 April 2016 11:59 Central European Time, preferably scanned and sent by email to EAHIL-secr@list.ecompass.nl or to: EAHIL Secretariat, attn.: Election Committee, PO Box 1393, NL-3600 BJ Maarssen, The Netherlands.

What's involved with being President or a member of the Board?

The Board has developed a set of role descriptors to help with understanding the sorts of activities and time commitments involved - these descriptors are available on the EAHIL website <http://eahil.eu/>. Please feel free to contact any member of the current Board if you would like to have an informal chat about the work. Do think seriously about standing for election – EAHIL's future depends in part on having a vibrant, active Board to help guide its affairs, and membership of the Board will also give you a valuable opportunity to develop your professional skills.

Voting process

Voting will be open from 2 May - 27 May 2016 to EAHIL members in good standing registered as a member not later than on 1 May 2016.

The outcomes of the election will be announced at the General Assembly in Seville on 10 June 2016.

In order to vote in this year's elections, you need to have an active membership record by 1 May 2016, with an up-to-date email address. Please get ready now to vote by updating your membership record by visiting <https://fd8.formdesk.com/EAHIL/membership> Note that "registered visitors" is the wording used by Formdesk for registered EAHIL members.

For the voting all members should receive an email providing a direct link to the new membership database. In the email, you will be asked first to update your record, and after submitting your record you will be forwarded to the voting form.

If you have any problems, questions or find any errors please contact Suzanne Bakker <supervisor@eahil.eu>.



EAHIL

European Association for Health Information and Libraries

PRESIDENT AND EXECUTIVE BOARD ELECTION 2016 NOMINATION FORM

* Please clearly mark what is applicable and strike out the other option

I, EAHIL member	I, EAHIL member
Address:	Address:
City:	City:
Country:	Country:
Email:	Email:
Date:	Date:
Signature:	Signature:

hereby nominate as a candidate for President* / Executive Board member* in the 2016 EAHIL election:

.....

Candidate for EAHIL President* / Executive Board membership*:

Name:.....

Job title:

Institutional address:

City & Country:

Phone: Fax:

Email:

Candidate's agreement:

I agree to be a candidate in the 2016 elections and am willing and able to serve on the Executive Board of EAHIL for 2017-2018 (President) or 2017-2020 (Board members) respectively.

Date:..... Signed:

This form, when completed, should be sent not later than **15 April 2016**:

preferably scanned and sent via email to: EAHIL-secr@list.ecompass.nl

or to:

EAHIL Secretariat, attn.: Election Committee, PO Box 1393, NL-3600 BJ Maarssen, The Netherlands.

www.eahil.eu



WHAT IS EAHIL?

The European Association for Health Information and Libraries (EAHIL) is an active non-profit professional association uniting and motivating librarians and information officers working in the medical and health science libraries in Europe.

Founded in Brighton, UK in 1987, EAHIL seeks

- to encourage professional development
- to enable exchanges of experience amongst its members
- to improve cooperation among health care libraries
- to strengthen links with medical and health libraries in Eastern and Central Europe
- to raise standards of provision and practice in the healthcare and medical research libraries
- to keep health librarians and information officers professionally informed
- to encourage mobility and continuing education
- to represent health librarians at European level, particularly at European institutions and WHO

THE JOURNAL OF EAHIL

The Journal of EAHIL (JEAHIL) is the quarterly official journal of the Association, available online. Printed copies on request.

JEAHIL publishes

- original articles
- reviews
- theme issues
- news from EAHIL
- meeting reports
- special interest groups reports
- opinion and discussion papers
- news from other medical library associations (such as US MLA)

MEMBERSHIP OF EAHIL

Membership of EAHIL is free for European biomedical information professionals (librarians and similar people).
Application of membership use: www.formdesk.com/EAHIL/membership
New members, please check the button "New visitors"

HOW TO PUBLISH IN JEAHIL

Original manuscripts should be submitted to Chief Editor Federica Napolitani at federica.napolitani@iss.it; *Instructions* and a *Checklist for Authors* are available at www.eahil.eu

RECENT THEME ISSUES

- Research support and scientific communication
- The librarian of the future: education, skills, expectations
- Use of mobile and technologies in medical libraries
- Marketing and impact of libraries

FUTURE THEME ISSUES

2016

June: Open science 1: open access

September: Memories from Seville

December: Education and training for medical librarians

2017

March: no theme issue

June: Open science 2: research data

EAHIL CONFERENCES

EAHIL 2016 Conference, "Knowledge, Research, Innovation...eHealth" 6-11 June 2016, Seville, Spain



MeSH: what's new for 2016

Alessandra Ceccarini

Settore Documentazione, Istituto Superiore di Sanità, Rome, Italy
alessandra.ceccarini@iss.it

Another year has elapsed and new MeSH for 2016 are now available for our activities.

A general trend to simplify search features while enhancing accuracy and specificity of results has led to NLM 2016 MeSH major changes and ongoing projects, as reported in the NLM Tech Bull. 2015 Nov-Dec;(407):e9.

Vocabulary changes for 2016 MeSH consist in the addition of 434 new descriptors and 4 publication types, replacement of 17 descriptors with more up-to-date terminology, deletion of 9 descriptors and 1 qualifier (subheading).

Here follows an outline of major changes:

- deletion of the subheading “Diagnostic Use”;
- creation of the MeSH descriptor “Diet, Food, and Nutrition” in the G07 tree, that conveys the semantic areas of the descriptors “Diet” and “Nutritional Physiological Phenomena” and their narrower terms, now deleted. A second tree location for “Food and Beverages” and its child terms was also created to help performing searches where vegetables or animals are considered for their nutritional values;
- a large number of chemicals has been introduced, chemicals of more common use in prescriptions have been moved from Supplementary Concept Records to Descriptors list;
- tree changes to reduce duplicate descriptors listed in different places in the same tree;
- simplified wording of annotation that reflects changes for 2016;
- addition of 481 scope notes to already existing MeSH, within an ongoing NLM project to write scope notes for all headings.

This may be checked by those who translate scope notes into their languages.

For more complete information please visit

https://www.nlm.nih.gov/pubs/techbull/nd15/nd15_mesh.html
and related links therein.

Due to worldwide emergency, the NLM has also added to PubMed on January 28, 2016 two New MeSH descriptors: Zika Virus Infection and Zika Virus, as announced on a special page devoted to the issue

<https://disasterinfo.nlm.nih.gov/dimrc/zikavirus.html>



The last editions of the printed Permuted MeSH, Annotated Alphabetic List and MeSH Tree Structures (2003)

US Medical Library Association report for EAHIL



Carol Lefebvre

MLA Representative to EAHIL
Independent Information Consultant
Lefebvre Associates Ltd, Oxford, UK
Carol@LefebvreAssociates.org

Focus on MLA '16: 'Mosaic: Mosaïque - Be Part of the Big Picture' (Mosaic '16), Toronto, Canada, 13-18 May 2016

<http://www.mlanet.org/meeting>

The **next US Medical Library Association (MLA) Annual Meeting** will be held as a joint meeting of MLA, the Canadian Health Libraries Association/Association des bibliothèques de la santé du Canada (CHLA/ABSC), and the International Clinical Librarian Conference (ICLC) in Toronto from May 13-18, 2016. The conference is being described as “the largest gathering of medical librarians and health information professionals in the world”. Even if you cannot plan to attend in person, please see below for information on attending ‘remotely’ via the **e-Conference** options.

A link to a PDF of the **Preliminary Programme** and a one-page ‘**Schedule-at-a-Glance**’ are available as PDFs from: <http://www.mlanet.org/meeting>

Plenary speakers promise, as ever, very interesting presentations, including the usual array of interesting plenary speakers from beyond the library and information world.

Ben Goldacre will deliver the **John P. McGovern Award Lecture**. Ben is very well-known in the field of evidence-based health. He is described in the conference programme as: “an award-winning writer, broadcaster, and medical doctor who specializes in unpicking scientific claims made by scaremongering journalists, government reports, pharmaceutical corporations, public relations companies, and quacks. He was trained in medicine at Oxford and London, and currently works as an academic in epidemiology. Goldacre wrote the weekly “Bad Science” column in the Guardian from 2003–2011. His book, *Bad Science: Quacks, Hacks, and Big Pharma Flacks* (4th Estate, 2010), has sold over half a million copies worldwide, reached #1 in the paperback nonfiction charts, and has been published in 31 languages. In his second book, *Bad Pharma: How Drug Companies Mislead Doctors and Harm Patients* (4th Estate, 2012), Goldacre puts the \$600 billion global pharmaceutical industry under the microscope to reveal flaws throughout the ecosystem of evidence-based medicine. In October 2014, he published his collected journalism in a volume, titled *I Think Youll Find Its a Bit More Complicated Than That* (4th Estate)”.

M.J. Tooley will deliver the **Janet Doe Lecture**. M.J. is associate vice president, Academic Affairs, and executive director, Health Sciences and Human Services Library, at the University of Maryland–Baltimore, where she has worked in various library positions since 1986. She was president of MLA from 2005–2006 and was elected a Fellow of the association in 2009. She has also served on MLA’s Board of Directors (1998–2001) and as the chair of the 2004 National Program Committee. In 1997, she received the MLA Estelle Brodman Award for the Academic Medical Librarian of the Year.

Ellen Jorgensen will deliver the **Closing Keynote**. She is co-founder and director of Genspace, a non-profit community laboratory dedicated to promoting citizen science and access to biotechnology. In 2011, she initiated Genspace's award-winning curriculum of informal science education for adults, and in 2014, Genspace was named one of the World's Top 10 Innovative Companies in Education by *Fast Company* magazine. She has a doctorate in molecular biology from New York University, spent thirty years in the biotech industry, and is currently adjunct faculty at New York Medical College, the School of Visual Arts, and Cooper Union. Jorgensen's talk, "Biohacking: You Can Do It, Too," at TEDGlobal 2012 has received over a million views.

Networking Events offered as part of the 'Meeting Registration' package are listed on the '**Schedule-at-a-Glance**' and include:

Welcome Reception and Opening of the Hall of Exhibits

New Members/First-Time Attendees Reception (hosted by CHLA/ABSC)

International Visitors' Reception

Presidents' Awards Dinner

<http://www.mlanet.org/meeting>

Registration is open at the link below this paragraph.

There is a discount for EAHIL members through EAHIL's association with MLA. The Meeting Registration package is 539 US dollars (reduced from 809 US dollars). For those of you for whom, even with these discounts, the travel costs remain prohibitive, there is an '**Individual e-Conference**' rate of just **149 US dollars** (reduced from 225 US dollars). All these rates apply until 31 March 2016, after which higher rates apply.

Additionally, **Institutional e-Conference Licences** are being offered for those who wish to share video and audio presentations with staff and colleagues at training sessions. (Note: The 'Individual e-Conference' rate is just what it says – individual! Not for sharing with your colleagues!)

<http://www.mlanet.org/p/cm/ld/fid=427>

Continuing Education courses will take place on Friday 13 May and Saturday 14 May. (There will be no CE courses on the following Wednesday this year.)

There will, as ever, be a very wide range of courses, typical of MLA annual meetings. You do not have to register for the conference to register for these courses. There are suites of courses on popular topics allowing delegates to sign up for a number of related courses and these are marked by a special icon in the programme. These suites of courses include:

(CHIS) Consumer Health Information Specialization Program: presenting the latest resources and ideas in the consumer health information field, approved for MLA's Consumer Health Information Specialization Program.

(EBP) Evidenced-based Practice: emphasizing the librarian's role in the practice of evidence-based health care.

(ES) Expert Searcher Training Initiative: emphasizing librarians' roles as expert searchers in health care and biomedical research.

(M) Management Track: addressing topics relevant to library administration for current managers and individuals with an interest in management.

<http://www.mlanet.org/p/cm/ld/fid=429>

Lightning Talks

Once again, the conference is offering the opportunity for “*Lightning Talks*”. These are five-minute presentations on new research or service implementations, using just three slides! Submissions closed at the end of February this year, i.e. prior to publication of this article. Please bear this in mind for future years, as this later deadline for these presentations (c. 5 months after the standard deadline for oral presentations and posters) can be beneficial for international visitors who may not have their funding confirmed well enough in advance to commit to submitting under the general call for abstracts.

The **Mosaic '16 Blog** will provide coverage of a range of topics including programme sessions, plenary sessions, exhibition activity and social events, before, during and after the meeting at: <http://www.mlanet.org/p/bl/et/blogid=65>

Additionally, you can follow the meeting on **Twitter** with the hashtag #mlanet16 and follow the MLA more generally on **Facebook** at: <https://www.facebook.com/MedicalLibraryAssn>

Future MLA annual meetings - dates for your diary:

MLA Seattle, Washington, 26-31 May 2017

MLA Atlanta, Georgia, 18-23 May 2018

MLA Chicago, Illinois, 3-8 May 2019

Membership of MLA

MLA offers **International Membership** to individuals at a reduced rate. This category applies if you work or have worked in a health- or health information-related environment and live outside the US or Canada. The current annual subscription rate for International Membership is **130 US dollars**.

<http://www.mlanet.org/p/cm/ld/fid=447>

News and publications from MLA

The latest issue of the **Journal of the Medical Library Association (JMLA)** (Volume 104(1) January 2016) is now available (open access) at:

<http://www.ncbi.nlm.nih.gov/pmc/journals/93/latest/>

Open access to back issues of the JMLA (and its predecessors back to 1898) is available from: <http://www.ncbi.nlm.nih.gov/pmc/journals/93/>

Preprints of forthcoming issue of the Journal of the Medical Library Association (JMLA) are available (for members only) by selecting **JMLA Journal** then **JMLA Preprints** under the **Publications** option when you login to the MLA web site with your username and password.

MLA News is MLA's members-only newsletter, featuring the latest resources, professional advice, and association news. It is published ten times per year and is accessible under **Publications** when you login with your username and password. **MLA-FOCUS** is MLA's members-only email newsletter, published at least twice a month.

Early invitation to ICAHIS 9, 2017, Budapest



Éva Orbán

Veterinary Science Library, Archives and Museum, Budapest, Hungary
orban.eva@aotk.szie.hu

As it was agreed upon by participants of ICAHIS 8 in Edinburgh, the next International Conference of Animal Health Information Specialists will be held in Budapest next year. As many of you know, Budapest is one of the most beautiful cities of Europe situated by the river Danube with a history and relics ranging from antique Roman ruins, to a 19th century castle area built upon medieval foundations, from beautiful Baroque churches to Art Deco houses and much more. It is not only the friendly atmosphere of the city but also its vivid art and science life which you may find attractive. Among others there is an abundance of music events in wonderful modern music halls for classical music as well as small pubs for jazz.

The campus of the University of Veterinary Science is an integral part of the city story. It was designed by Imre Steindl (designer of the Hungarian Parliament building) and built in 1881. But this was not the beginning of veterinary education in Hungary which celebrates its 230th anniversary in 2017. A completely renewed exhibition of the history of veterinary training and veterinary practice will be opened for the occasion. The Veterinary Science Library, Archives and Museum, hosting ICAHIS 9, is responsible for taking care of veterinary history as well as providing modern information services for all the different user groups engaged in animal health.

ICAHIS is always a wonderful opportunity for veterinary librarians – a rare species – to meet, share ideas and reinforce their identity. But we are sure our experiences may be of use for anybody dealing with health information. Though the programme is not shaping up yet, we already have some ideas under the headings

“professionalism and fun”. Our colleagues will take a short intro with them to the EVLG SIG meeting to Seville to stimulate your appetite. More details to come in autumn.

Please, take a note in your calendar: come to ICAHIS 9, 2017, Budapest, Hungary!



The reading room of the Veterinary Science Library, Archives and Museum



The picturesque veterinary campus with the library



Girl playing with her dog



The river Danube with the house of Parliament on the left

National Library of Medicine report for EAHIL



Dianne Babski

Deputy Associate Director, Library Operations
National Library of Medicine
National Institutes of Health
US Department of Health and Human Services
dianne.babski@nih.gov
<http://www.nlm.nih.gov/>

NLM Resources Related to Zika Virus Outbreak



Aedes aegyptis mosquito. Photo courtesy of CDC/
Prof. Frank Hadley Collins.

monitoring network of sylvatic yellow fever. It was subsequently identified in humans in 1952 in Uganda and the United Republic of Tanzania. Outbreaks of Zika virus disease have been recorded in Africa, the Americas, Asia and the Pacific. The virus is transmitted by an infected *Aedes* mosquito. About 1 in 5 people experience symptoms which may include a mild, flu-like illness, joint pain, rash, headache, or conjunctivitis lasting between 2-7 days.

In response to this amplified health concern, we have created a new Zika Virus information resource page located at <https://disasterinfo.nlm.nih.gov/dimrc/zikavirus.html>.

Users will find information about the virus and infections, pregnant women, health care providers, epidemiology, detection and diagnosis, maps, travel, and surveillance and control. There are also information resources in Portuguese and Spanish, and social media. Patient focused information in English and Spanish is available from MedlinePlus, <https://www.nlm.nih.gov/medlineplus/zikavirus.html>.

To facilitate literature retrieval, two new Medical Subject Headings were added to the 2016 version of MeSH; Zika Virus and Zika Virus Infection. MEDLINE/PubMed Indexing for these headings began January 28, 2016.

As you know, the World Health Organization declared a Public Health Emergency of International Concern (PHEIC) on 1 February. There have been observations in Brazil of clusters of babies born with microcephaly in areas with a Zika virus outbreak. Health authorities and agencies are now investigating the potential connection between birth defects and the virus.

According to the US Centers for Disease Control and Prevention, the Zika virus is an emerging mosquito-borne virus that was first identified in Uganda in 1947 in rhesus monkeys through a

Disaster Information Management Research Center
IMPROVING ACCESS TO DISASTER HEALTH INFORMATION

SIS Home | About Us | Site Map & Search | SIS News | Contact Us

SIS Home > DIMRC Home > Disasters > Infectious Diseases > Zika Virus

Zika Virus Health Information Resources

- ▶ General Information
- ▶ Pregnant Women and Zika Virus
- ▶ Information on Zika for Health Care Providers
- ▶ Epidemiology
- ▶ Laboratory Detection and Diagnosis of Zika Virus
- ▶ Maps
- ▶ Travel
- ▶ Surveillance and Control of Mosquito Vectors
- ▶ Resources on Zika Virus Infection in Portuguese
- ▶ Resources on Zika Virus Infection in Spanish
- ▶ Social Media
- ▶ Disclaimer

Disaster Information Management Research Center (DIMRC) Zika Virus Resources Web Page

MeSH Heading	Zika Virus
Tree Number	B04.820.250.350.995
Annotation	infection = ZIKA VIRUS INFECTION
Concept 1 (Preferred)	Zika Virus
Scope Note	An arbovirus in the FLAVIVIRUS genus of the family FLAVIVIRIDAE . Originally isolated in the Zika Forest of UGANDA it has been introduced to Asia and the Americas.
Term	Zika Virus
Term	Virus, Zika

MeSH Browser Snapshot of Zika Virus MeSH term

MeSH Heading	Zika Virus Infection
Tree Number	C02.081.990
Tree Number	C02.782.350.250.990
Concept 1 (Preferred)	Zika Virus Infection
Scope Note	A viral disease transmitted by the bite of AEDES mosquitoes infected with ZIKA VIRUS . Its mild DENGUE-like symptoms include fever, rash, headaches and ARTHRALGIA . The viral infection during pregnancy, however, may be associated with other neurological and autoimmune complications (e.g., GUILLAIN-BARRE SYNDROME ; and MICROCEPHALY).
Term	Zika Virus Infection
Term	Fever, Zika
Term	Zika Fever
Term	Zika Virus Disease

MeSH Browser Snapshot of Zika Virus Infection MeSH term



View of the entryway of the National Library of Medicine

Feedback for the Future Direction of NLM

In February 2015, a Request for Information (RFI) was issued by the NLM Working Group of the Advisory Committee to the National Institutes of Health Director. The working group was convened by Dr. Francis Collins to consider current activities and recommend future directions for NLM. The responses to the RFI were considered by the working group and figured strongly in their report and recommendations (<http://acd.od.nih.gov/nlm.htm>). The responses covered a full range of NLM program areas, citing more than 200 specific products, services, projects, features, policies and programs. The over 600 respondents represented a broad spectrum of communities we serve both nationally

and internationally.

One wrote, “Over the past fifty years, the National Library of Medicine has taken on the role of a national library with success; it is now an international leader because of the services and resources that it provides to all users.”

Responses encouraged NLM to lead, coordinate and continue our involvement in the standards bodies and embrace open international standards in publishing, metadata and terminologies. Several respondents stressed NLM impact both nationally and internationally to systematically collect and conserve our electronic cultural heritage in historical collections.

We appreciate all of our international partners, colleagues and friends who responded to the RFI. We fully expect this valuable feedback to be revisited by our new Director as he or she develops their vision for NLM’s future.

[Collected during January to February 2016]

**Benoit Thirion**

Chief Librarian/Coordinator
 CISMef Project Rouen University Hospital, Rouen, France
<http://www.cismef.org/>
 Contact: Benoit.Thirion@chu-rouen.fr

The goal of this section is to have a look at references from non-medical librarian journals, but interesting for medical librarians. Acknowledgement to Informed Librarian Online

FREE ACCESS

- 1. Kumar R. Use of E-resources by the medical students of MM University, Ambala: A case study**
 DESIDOC Journal of Library & Information Technology vol. 36, no 1, 2016

*This paper reports usage and experience of e-resources medical students at Maharishi Markandeshwar University, Ambala Haryana. This study tries to verify and value the purpose, frequency, reasons of using and place of students access to e-resources. A well structured questionnaire was administered to the 100 medical students. The response rate was 78% (45 from postgraduates and 33 from undergraduates students). The result of study reveals that most of PG and UG students state that e-resources are informative as well as update the medical knowledge. Search engine and medical research reports are used highly among the students. Further study shows that undergraduate students use e-resources daily and spent more time as compared to PG students. It is found that maximum students are aware and use e-resources of library. The satisfaction of medical students is not high with regard to e-resources. Study also reveals that PG students feel that e-resources are time consuming and face slow downloading whereas UG students face virus, slow downloading and feel more expensive of using e-resources. <http://publications.drdo.gov.in/ojs/index.php/djlit/article/view/8959>
<http://publications.drdo.gov.in/ojs/index.php/djlit/article/view/8959>*

- 2. Nicolaisen J et al. The focus factor: a dynamic measure of journal specialization**

Information Research: An International Electronic Journal vol. 20, no 4, December 2015
*Introduction. We present a new bibliometric indicator to measure journal specialisation over time, named the focus factor. This new indicator is based on bibliographic coupling and counts the percentage of re-citations given in subsequent years. Method. The applicability of the new indicator is demonstrated on a selection of general science journals and on a selection of medical journals. The reference lists of each journal are compared year by year, and the percentage of re-citations is calculated by dividing the number of re-citations with the total number of citations each year. Analysis. To validate re-citations as caused by specialisation, other possible causes were measured and correlated (obsolescence, journal self-citations and number of references). Results. The results indicate that the focus factor is capable of distinguishing between general and specialised journals and thus effectively measures the intended phenomenon (i.e., journal specialisation). Only weak correlations were found between journal re-citations and obsolescence, journal self-citations, and number of references. Conclusions. The focus factor successfully measures journal specialisation over time. Measures based on either simple citation analysis or bibliographic coupling are found to be close relatives. Measures based on journal self-citation are found to be only weakly correlated with the focus factor. Measures based on co-citation analysis remain to be studied and compared.
<http://www.informationr.net/ir/20-4/paper693.html>*

3. Funnell P. Drop-in sessions as an effective format for teaching information literacy: a case study in the Medical and Dental Libraries at Queen Mary University of London

Journal of Information Literacy vol. 9, no 2, 2015

Information literacy (IL) skills are increasingly becoming acknowledged as vital lifelong skills, necessary to thrive in education, research and the workplace. IL is taught in a variety of formats in higher education. The purpose of this study is to examine the use of drop-in sessions as an effective format to meet the need for ongoing IL teaching. Although research has previously been carried out on various formats of IL teaching, there is little research specifically investigating the effectiveness of drop-in sessions. This study aims to add to the current body of knowledge by examining the experience of providing drop-in IL sessions at the Medical and Dental Libraries at Queen Mary University of London. These sessions have now been running for five years and data has been gathered from attendance statistics, evaluation forms and follow-up questionnaires in order to evaluate their effectiveness for teaching IL skills. The study shows that drop-in sessions can provide the desired one-to-one, personalised, hands-on teaching, delivered in an informal environment. Good attendance figures, high levels of satisfaction and the perceived positive impact on IL skills demonstrate that drop-in sessions can be used as an effective format for IL teaching. The study provides evidence of good practice for those looking at how best to provide ongoing IL teaching.

<http://ojs.lboro.ac.uk/ojs/index.php/JIL/article/view/PRA-V9-I2-4>

ABSTRACTS ONLY

1. Thavamani K et al. Directory of Open Access Journals: A bibliometric study of public health journals, 2003-2012

International Journal of Library Science v. 14, no. 2, 2016

This paper presents a bibliometric study of Public Health focused journals represented in the Directory of Open Access Journals (DOAJ). A total of 219 Public Health Journals were examined related to a number of issues: subject specific distribution of Public health journals, interdisciplinary aspects, country of origin, language used and other language characteristics, numbers of titles first appearing in given years, publication fees, the existence of license agreements, and the types of organizations having journals in the Directory that focus on libraries.

[http://www.ceserp.com/cp-jour/index.php?journal=ijls&page=article&op=view&path\[\]=4086](http://www.ceserp.com/cp-jour/index.php?journal=ijls&page=article&op=view&path[]=4086)

2. Black S. Psychosocial reasons why patrons avoid seeking help from librarians: A literature review

The Reference Librarian vol. 57, no 1, 2016

Patrons avoid asking librarians for help for a variety of psychosocial reasons. These include academic goal orientation; degree of self-regulation; perceived threats to autonomy or self-esteem; desire to avoid being stereotyped; perceptions of librarians; and feelings of confusion, fear, or anxiety. Educational psychologists and college student services professionals have published research on help seeking that is directly relevant to library patrons' behaviors. This review summarizes literature on the educational psychology of help seeking, help seeking in college student services, interpersonal dimensions of library reference services, library anxiety, the effect of librarian behaviors on patrons' perceptions of help received, and preliminary findings on help seeking in online settings.

<http://www.tandfonline.com/doi/full/10.1080/02763877.2015.1096227>

3. Mongeon P et al. The journal coverage of Web of Science and Scopus: a comparative analysis

Scientometrics January 2016, vol. 106, no 1, pp. 213-228

Bibliometric methods are used in multiple fields for a variety of purposes, namely for research evaluation. Most bibliometric analyses have in common their data sources: Thomson Reuters' Web of Science (WoS) and Elsevier's Scopus. The objective of this research is to describe the journal coverage of those two databases and to assess whether some field, publishing country and language are over or underrepresented. To do this we compared the

coverage of active scholarly journals in WoS (13,605 journals) and Scopus (20,346 journals) with Ulrich's extensive periodical directory (63,013 journals). Results indicate that the use of either WoS or Scopus for research evaluation may introduce biases that favor Natural Sciences and Engineering as well as Biomedical Research to the detriment of Social Sciences and Arts and Humanities. Similarly, English-language journals are overrepresented to the detriment of other languages. While both databases share these biases, their coverage differs substantially. As a consequence, the results of bibliometric analyses may vary depending on the database used. These results imply that in the context of comparative research evaluation, WoS and Scopus should be used with caution, especially when comparing different fields, institutions, countries or languages. The bibliometric community should continue its efforts to develop methods and indicators that include scientific output that are not covered in WoS or Scopus, such as field-specific and national citation indexes.
<http://link.springer.com/article/10.1007/s11192-015-1765-5>

4. Hsiehchen D et al. Detecting editorial bias in medical publishing

Scientometrics January 2016, vol. 106, no 1, pp. 453-456

As publications are the principal method of distributing research, journal editors serve as the gatekeepers of emerging knowledge. Here, we provide a "case-control study" to examine the role of editorial bias in the New England Journal of Medicine, a major medical journal, by investigating author demographics of case reports that are either under editorial or meritorious selection. Our results indicate that editorial bias promoting the publication of authors from select high performance countries is declining, although there is increasing editorial preference for university-based authors. These findings are relevant to efforts aiming to increase transparency in scientific publishing.

<http://link.springer.com/article/10.1007/s11192-015-1753-9>

5. Glover ST et al. Interlending and document supply in the NHS: a North West case study

Interlending & Document Supply 2016, vol. 44, no 1

the North West of England carried out by health libraries in the National Health Service (NHS). NHS libraries provide a service to NHS staff and students on clinical placement and provide access to the latest published evidence contained in specialist periodicals and textbooks. Design/methodology/approach: Data were analysed over an extended period from 1 April 2005 to 31 March 2015. These data are provided annually in the form of a statistical return and are collated regionally. Data were obtained by all library services for both document supply activity and inter-library loans. Findings: During the period of the analysis, there has been a significant drop in activity for both document supply and inter-library loans. In 2005/2006, there were 45,147 articles supplied via document delivery networks, this had fallen to 8,642 in 2014/2015. Similarly, in 2005/2006, there were 5,627 inter-library loans supplied, this has also fallen to 3,732 in 2014/2015. Originality/value: The observed drop in document supply and inter-library loans across the NHS North West occurred during the time of significant change in how NHS staff and students access the latest evidence. In 2005/2006, many NHS libraries were still investing in print journals and textbooks. Over the past 10 years, there has been a substantial increase in access to consortia purchased online journals in addition to a growth in the availability of open access content.

<http://www.emeraldinsight.com/doi/abs/10.1108/ILDS-11-2015-0037>

6. Rowley J et al. Peer-based information literacy training: Insights from the NICE Evidence Search Student Champion Scheme

Library & Information Science Research vol. 37, no. 4, October 2015, pp. 338-345

There is a widespread acknowledgement that with ever-increasing levels of access to digital information sources, students need to be supported in the development of their information literacies. Academic libraries and librarians have taken the lead in the development of information literacy programmes. Whilst there has been much sharing of good practice, there has been less consideration of alternative models of the outcomes of information literacy programmes. To contribute to addressing this gap, this article reports on an evaluation of

student peer delivery of an information literacy scheme in the specific context of a medical and health information portal. The Student Champion Scheme (SCS) is an initiative designed to promote the use of a national specialist health and social care information portal, Evidence Search, amongst students in the health professions, and thereby to further embed evidence-based practice. The SCS run by NICE (National Institute for Health and Care Excellence, UK), uses a model of training, in which student champions are first trained by NICE staff, and then the champions train their peers. This study evaluates the scheme on the basis of secondary data gathered by NICE during the evaluation processes associated with two annual cycles of the SCS, together with focus groups with champions, and interviews with prospective university-based co-facilitators of the scheme. Findings suggest that the scheme is successful in promoting use of the portal, Evidence Search, and in developing advocates amongst champions. The evaluation offers a range of insights into the benefits and challenges associated with such a scheme, whose interest and implications extend beyond this specific scheme. To be successful the quality of peer training and peers' identification with and belief in the value of both the training they deliver, and specific information sources is pivotal. In addition, training is strengthened by contributions from librarians and academics, and a climate in which all participants are clear about their specific contribution. It is recommended that academic libraries should seek to develop a range of differentiated information literacy programmes, each with specific objectives, to suit different audiences, and undertake regular evaluation as a basis for improvement and innovation.

<http://www.sciencedirect.com/science/article/pii/S0740818815000857>

7. Luo L. Consumer health reference interview: Ideas for public librarians

Public Library Quarterly vol. 34, no 4, 2015 pp. 328-353

This two-stage study seeks to help public librarians become better prepared, and more confident and competent, when answering medical/health questions. At the first stage, eleven barriers that public librarians often encounter in the consumer health reference interview were identified through a comprehensive literature review, and at the second stage, input from professional consumer health librarians on how to overcome the barriers was gathered via a qualitative survey. Findings of the study provide concrete and practical strategies that will help public librarians more successfully conduct the reference interview to assist library users in their health information-seeking journey.

<http://www.tandfonline.com/doi/full/10.1080/01616846.2015.1106897>

8. Hessler KE. Health literacy and law: Empowering libraries to improve access to consumer health information and ACA compliance

The Serials Librarian: From the Printed Page to the Digital Age vol. 69, no 3-4, 2015

Low health literacy in the United States is both dangerous and costly. Increasing health literacy is of even greater importance following the passage of the Affordable Care Act, which created millions of new health care consumers, each with particular health information needs. Public libraries are ideally positioned to provide access to high quality information tailored to fulfill health queries, but, unfortunately, low health literacy exists on both sides of the reference desk. This article highlights the greatest challenges in health reference today and reflects on approaches to improve health-related training, outreach, and programming in American libraries.

<http://www.tandfonline.com/doi/full/10.1080/0361526X.2015.1105767>

9. Lumsden CJ et al. Do medical students assess the credibility of online or downloadable medical reference resources?

International Journal of Digital Literacy and Digital Competence vol. 6 no 3, 2015

This study was designed to elucidate how medical students assess the credibility of online resources and downloadable applications as well as describing trends in resource usage. Methods: 72 students participated in the study and completed an equestionnaire. This was based on a framework by Kapoun which summarises steps that users of online resources should take to ensure credibility using key domains; accuracy, authority,

objectivity (where the reader questions the provenance of the material), currency and coverage (questioning appearance, reliability and accessibility of a document). Results: There were variations in the reported use of parameters of credibility with objectivity and currency being the most used widely used credibility measures. The study group were significantly influenced by the cost of resources using free resources if possible. Responses revealed that most of the study group were using open-access sites over commercially-based peer review resources. Conclusion: The widespread availability of mtechnology has increased the accessibility of online medical resources. Medical schools should review what information is provided to students and consider equipping students with the skills to successfully evaluate resource credibility as part of their core curricula.
<http://www.igi-global.com/article/do-medical-students-assess-the-credibility-of-online-or-downloadable-medical-reference-resources/128287>

10. Nel MA, Fourie I. Information behavior and expectations of veterinary researchers and their requirements for academic library services

The Journal of Academic Librarianship vol. 42, no 1, January 2016, pp. 44-54

Increased pressure for quality research at South African universities, and limited research done on the information needs of veterinary science researchers and the role of veterinary libraries supporting them, motivated a case study at the Faculty of Veterinary Science, University of Pretoria (South Africa). The study aimed to determine what the information needs, information seeking behavior and information use behavior of veterinary researchers are, and how these needs are being met by the library. Quantitative and qualitative data were collected from researchers as well as information specialists by means of questionnaires, focus group interviews and a citation analysis. Findings and recommendations are based on descriptive statistical analysis of the quantitative data and thematic analysis of the qualitative data. The study found that the information needs of researchers are influenced by the research environment and expectations for research output. Most needs for information and support services are met. Collection building practices, library space, and awareness of services offered by information specialists need attention. Findings reveal considerable gaps between researchers' expectations from information specialists and their own perceptions of roles to fulfill. The paper contributes to the limited literature on the information behavior of veterinary researchers and library services supporting their needs.

<http://www.sciencedirect.com/science/article/pii/S0099133315002396>

11. Kang K. Evaluating the patenting activities of pharmaceutical research organizations based on new technology indices

Journal of Informetrics vol.10 no.1, February 2016

Several citation-based indicators, including patent h-index, have been introduced to evaluate the patenting activities of research organizations. However, variants developed to complement h-index have not been utilized yet in the domain of intellectual property management. The main purpose of this study is to propose new indices that can be used to evaluate the patenting activities of research and development (R&D) organizations, based on h-type complementary variants along with traditional indicators. Exploratory factor analysis (EFA) is used to identify those indices. By applying the proposed framework to pharmaceutical R&D organizations, which have their patents registered in the United States Patent Trademark Office (USPTO), the following three indices are obtained: the forward citation, impact per unit time, and patent family factors. The ranking obtained from the new indices can represent the productive capacity of the qualified patent, patent commercialization speed, and patent commercialization effort of research organizations. The new proposed indices in this study are expected to contribute to the evaluation of the patenting activities of R&D organizations from various perspectives.

<http://www.sciencedirect.com/science/article/pii/S1751157715300559>

Tense, nervous headache? Relax, you're a librarian!



Sarah Stamford

Retired librarian
librarymatters99@gmail.com

Usually this column is edited by myself or invited guest editors. This time I'm proud to reprint a blog post over which I stumbled by chance. It's a wonderful piece from Sarah Stamford. Even if this text was posted on the blog on 18 June 2011, I believe it is still very valuable for coping with stress. Oliver Obst

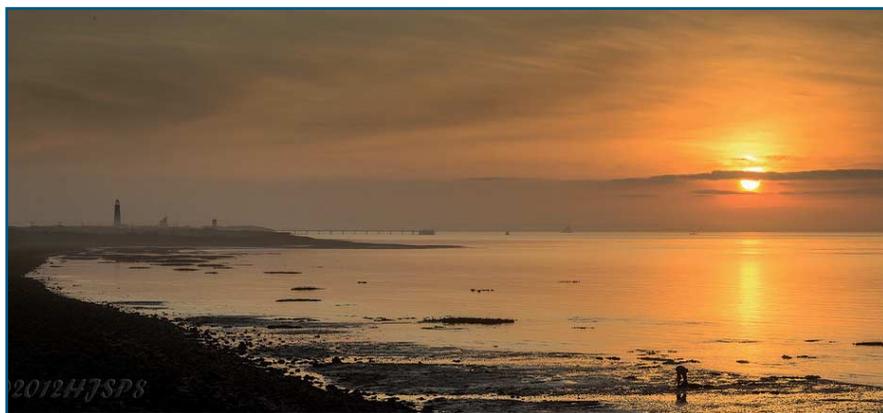
We've reached the end of another academic year. The library is silent, the desks abandoned, just the piles (and piles, and piles) of paper, odd socks and dried up felt pens remain to remind us of the exam period. A colleague told me recently her GP had identified that her blood pressure was too high and asked her what she did for a living. As she replied, he looked at the reading from her cuff and said "As soon as you started talking about your job I noticed your blood pressure shot up".

Now, you're thinking, surely running a Library can't be stressful? It's not like being a surgeon, or a social worker, or even a top footballer, any of whom would know a lot more about being under pressure than a librarian. So, what creates stress in our job? Here are a few thoughts, based on my experience at Cambridge. Is it to do with expectations? It seems to me that librarians exhibit two characteristics. We are organisers, and at heart we remain perfectionists, Kontrolmeisters obliged to operate systems which have to be 100% consistent and accurate. Then we are also descended from generations of Keepers of the Knowledge; so we're disappointed when our collection fails to supply a key book for an eager student, or get him into the online Ohio Journal of Tagmemics or whatever. Especially if he departs saying "It's cool, I'll use Google instead".

Keeping up with our professional development can be daunting. "Live in multiple worlds", "Re-invent your career", "Find out what your stakeholders value", "Benchmark your service". Librarianship is changing faster than Wayne Rooney's hairline because we are churned up in major, intersecting changes – see Dymvue's post *Libraries at the crossroads* (1). Yes, we need to develop new skills and to apply them appropriately but, in Cambridge especially, we're often limited in what we can achieve not just by the resources available, but also because our institutional structure and/or technology dictates the shape of developments, rather than being able to establish processes the other way round. Perhaps also, because we can see what we might be able to achieve in different circumstances we tend to undervalue the work we do now. In fact, we don't always realise how much we are appreciated. (Is your blood pressure rising? Don't worry, I'm nearly done. An interlude is called for: here is a calming picture of the sea) (*Figure 1*).

Back to the post. I guess I have enjoyed just about every minute I've spent working in libraries, but I also think I have an advantage in having previous convictions, at the BBC, in publishing, advertising, at IBM, and so on – even for a short while at the gloriously named Film Cooling Towers (1929).

The experience I gained in those jobs (and some of them were stonkingly mundane) taught me some useful



Sunset at Spurn Point by HJSP82, <https://www.flickr.com/photos/hjsp8/6345052200/> (CC BY-ND 2.0)

tricks to help me organise my work and my time efficiently, to work in teams and value everyone's contribution, not to over-complicate matters, or to become too dependent on work for my self-esteem; and I'm afraid I've seen colleagues succumb because they foundered in these areas.

There are two bits of advice I've found especially useful.

One, from a producer I worked with in BBC TV was, "Get the script right first". (If you watch the extras DVD of *Middlemarch* you can even see him saying it). He was absolutely right. Whatever you do, get the first bit right because if you don't, the rest of it won't work. It's surprising how many people bash on with something even though they know the groundwork isn't secure, lacking the confidence to admit the mistake, to go back and change it while there is still time. The other piece of good advice I received from a friend, especially applicable to the *Kontrolmeisters* among us, is "You can't do someone else's job for them" *i.e.* if someone else is determined to make a balls-up of something and won't listen to advice, it isn't your responsibility.

Having worked elsewhere also makes me appreciate the good bits about Being a Librarian. I'm lucky enough to have a job with plenty of variety; covering archives, rare books, ebooks, textbooks and odd books like the recently unearthed Church Bells of Leicestershire. I am fortunate in having superb, supportive staff, the College is a well-run and considerate employer, and the students are interesting and engaging. There is nothing to beat the job satisfaction of noticing on the returns trolley a book bought for the Library on the hunch that it would be useful, or the delight of opening up a box of new books, or of retrieving a book from the stacks which has been long ignored, and has finally found someone with an interest in it.

So if you're feeling stressed, adjust your expectations, recognise what is beyond your control, and make a list of the good bits about your job.

Or just blast off a blog post.

REFERENCE

1. Stamford S. Libraries at the crossroads. *Dymvue Blogspot* 7. May 2011 <http://dymvue.blogspot.com/2011/05/libraries-at-crossroads.html>

* Published as a blog post at <http://dymvue.blogspot.it/2011/06/tense-nervous-headache-relax-youurre.html> and reproduced with kind permission from the author

† Someone who behave as a Master Controller

Publications and new products



Letizia Sampaolo

Settore Documentazione,
Istituto Superiore di Sanità, Rome, Italy
letizia.sampaolo@iss.it

One of the marks of a great leader is the ability to get his or her team to pull together and to feel they are a part of something really special (vision). And one of the greatest blessings to a leader is to have that team pull together and support each other. A good team can make a leader feel a great deal stronger.

Once there was a man who was lost while driving through the country. As he tried to read a map while driving, he accidentally drove off the road into a deep muddy ditch. Though not injured, his car was stuck. So the man walked to a nearby farm.

There he saw an old farmer and asked for help. The farmer replied, "Warwick can get you out of that ditch," pointing to an old mule standing in a field. The man looked at the old run-down mule and then looked at the farmer who just stood there repeating, "Yep, old Warwick can do the job."

The man figured he had nothing to lose. The two men and Warwick made their way back to the ditch. The farmer hitched the mule to the car. With a snap of the reigns he shouted, "Pull, Fred! Pull, Jack! Pull, Ted! Pull, Warwick!" And the mule pulled the car from the ditch with very little effort.

The man was amazed. He thanked the farmer, patted the mule and asked, "Why did you call out all those other names before you called Warwick?" The farmer grinned and said, "Old Warwick is just about blind. As long as he believes he is part of a team, he doesn't mind pulling."

Aren't you grateful for teams! We can do so much more together than we can ever do alone.

(posted in Education on February 15, 2016)

"Divided we fall, united we inform" was the EAHIL 2014 Conference motto. Building alliances and making team works work. It was, and still is all about this. Therefore, as usual, here are some suggestions that might help to the purpose. Enjoy the read!

JOURNAL ISSUES

Health Information and Libraries Journal: Contents of March issue 2016

Editorial

Are you a budding academic writer?

M.J. Grant, P. Bonnett, A. Sutton, A. Marshall, J. Murphy, H. Spring

Review Article

Utilizing an integrated information infrastructure for outcomes research: a systematic review.

B. Dixon, E. Whipple, J. Lajiness, M. Murray

Original articles

The importance of leisure reading to health sciences student: results of a survey.

E. Watson

Searching PubMed for a broad subject area: How effective are palliative care clinicians in finding the evidence in their field?

R. Damarell, J. Tierman

Information behaviour of French-speaking speech-language therapists in Belgium: results of a questionnaire survey.

N. Durieux, F. Pasleau, A. Piazza, A-F. Donneau, S. Vandenput, C. Maillart

Regular features

Dissertations into practice

Can twitter improve your health? An analysis of alcohol consumption guidelines on Twitter.

E. Hughes

International perspectives and initiatives

Global publication trends in the Health Information and Libraries Journal, 2014-2015.

J. Murphy

Learning and Teaching in Action

Online learning: the brave new world of MOOCS and the role of the health librarian.

H. Spring

FROM THE WEB

- **Early journals: what's in a name?**

The journal is so much a part of the current apparatus of scholarly communication that one never really thinks where and how the term might have originated. The origins of the word "journal" derive from Old French, Middle English and Late Latin in the fourteen century. However, perhaps the concept of the journal all started under the oriental plane tree in Kos, Greece with Hippocrates, the Father of Western Medicine, discussing medical topics with his students. The complete collection of Hippocrates's writings does not appear to have been undertaken by him alone as there are different writing styles and different medical topics. Thus, the work attributed to Hippocrates that has survived could be the earliest contributions of the journal format in the western world.

In the **Collection** of the **History of Medicine Division** at the National Library of Medicine (<https://www.nlm.nih.gov/hmd/collections/books>), there is a rich and interesting journal collection from the late seventeenth century to 1870 published in many different European languages. Books and pamphlets from the period before 1870 are considered journals when they have a range of content that is linked to a series of dates. Atalanta Grant-Suttie is a Preservation Librarian for the Rare Books and Early Manuscripts Section in the History of Medicine Division at the National Library of Medicine. She recently inventoried this fascinating collection and surveyed its condition. The review revealed a wealth of provenance information in many of the titles, including ownership signatures, former owners,

title changes, bookplates and inscriptions. As the inventory proceeded, examples from over two centuries of journals surfaced that shed light on how the journal format has evolved through many different variations in support of scholarly discourse.

- Identifying the best journal to submit research to can be a difficult process. Therefore, helping researchers to share their research results with the world is key to the progress of their own's discipline and career. However, with so many publications, how can you be sure a particular journal can be trusted? **Think. Check. Submit.** is a campaign to help researchers identify trusted journals for their research. It is a simple checklist researchers can use to assess the credentials of a journal or publisher, through a list of seven main questions. The campaign has been produced with the support of a coalition from across scholarly communications in response to discussions about deceptive publishing. Supporting organizations include:
 - Association of Learned & Professional Society Publishers (ALPSP)
 - BioMed Central
 - Directory of Open Access Journals (DOAJ)
 - INASP
 - International Standard Serial Number organization (ISSN)
 - Ligue des Bibliothèques Européennes de Recherche – Association of
 - European Research Libraries (LIBER)
 - Open Access Scholarly Publishers Association (OASPA)
 - Scholarly Publishing and Academic Resources Coalition (SPARC)
 - Springer Nature
 - International Association of STM Publishers (STM)
 - Ubiquity Press
 - UKSG

To help encourage colleagues within your organization to Think. Check. Submit., three new printable posters are now available for download: <http://thinkchecksubmit.org/2015/11/20/posters-now-available/>. Or, if you think your colleagues would benefit best from a video, share a link to the available enlightening video (<http://thinkchecksubmit.org/2016/01/28/help-your-colleagues-grin-the-right-journal-with-our-new-video/>) via email or Twitter with the hashtag #thinkchecksubmit.

- **Find Good Health Information**, a guide for Health Consumers and Patients by the Medical Library Association (MLA)

A 2015 Pew Research Center Study reveals that "73% of all those ages 16 and over say libraries contribute to people finding the health information they need. 42% of those who have gone online at a library using its computers, internet connections or Wi-Fi have done so for health-related searches."

In 2013, the Pew Research Internet Project reported that "59% of U.S. adults say they have looked online for information about a range of health topics in the past year. 35% of U.S. adults say they have gone online specifically to try to figure out what medical condition they or someone else might have."

Whether the health information is needed for personal reasons or for a loved one, millions of health-related web pages are viewed by millions of consumers. Sometimes the information found is just what was needed. Other searches end in frustration or retrieval of inaccurate, even dangerous, information. This is why the MLA decided to offer health consumers and patients a guide. It outlines the collective wisdom of medical librarians who search the web every day to discover quality information in support of clinical and scientific decision making by doctors, scientists, and other health practitioners responsible for the nation's health. It is presented in three brief sections: Getting Started; a set of guidelines developed for evaluating the content of health-related websites; and a final section pointing to other information of interest to consumers searching for health-related information on the web.

- At the beginning of 2016, Jeffrey M. Drazen, Editor-In-Chief of The New England Journal of Medicine, published the note *Notable Articles of 2015 - Free limited-time collection*. “The face of medicine is constantly changing,” he writes. In his communication he describes the exclusive collection of memorable NEJM research and commentary from the past year as selected by NEJM editors. “In the past year, a number of studies published in the New England Journal of Medicine challenged our ways of thinking (...). At NEJM we work to identify, vet, and publish the research that makes a difference in medicine. Each year, from the thousands of submissions we receive, we publish about 200 research articles that we choose because we think they will change the face of medicine. This digital collection represents the cream of the crop, the dozen studies from 2015 that we think will have the biggest influence on medicine. We hope that you enjoy this collection and that you will continue to join us as we log medicine’s journey”. Download the free collection at http://www.nejm.org/nejm-special/?emp=marcomna&utm_source=nejmli&utm_medium=email&utm_content=reg&utm_campaign=notable_articles2015.

E-LEARNING: OPEN ONLINE COURSES

ELearning Superstars (<http://www.elearningsuperstars.com/>) proposes the Massive Open Online Courses (MOOC), which are online courses aimed at a large number of participants via the web. Below are some of the favourite MOOC examples from all over the globe:

- **Literature and Mental Health: Reading for Wellbeing** (<https://www.futurelearn.com/courses/literature>)
The great 18th century writer Dr Samuel Johnson, who suffered from severe bouts of depression, said “the only end of writing is to enable the reader better to enjoy life or better to endure it.”
- **Learn Designing Using Adobe Photoshop from Scratch (Eduonix)**
Photoshop is single most important tool for graphic designers and a course crafted for easy understanding and quick assimilation is brought together

The future of technology in adult learning

No matter how far we progress in formal education, there is always a point at which taught learning becomes optional. With adulthood comes the agency to decide when school or university learning will end. While professional development can mean acquiring new skills, we generally reach a critical point where the frequency with which we learn new information and disciplines slows down. Here is an interesting article published Fri 29 Jan 2016 by London Translations in The Inquirer (<http://www.theinquirer.net/inquirer/industry-voice-blog/2444215/the-future-of-technology-in-adult-learning>).

BOOKS REVIEW

When breath becomes air. Paul Kalanithi. 2016. ISBN 081298840X (ISBN13: 9780812988406). \$15.62 (Hardcover). \$14.86 (Kindle). \$25.47 (Audiobook). New York: Random House. 344 pp.

Oh, well, I do agree. The subject of this book is not the one we expect to find in this journal but it is linked anyway to some of the topics we deal with, like the physician-patient relationship.

This is a profoundly moving, exquisitely observed memoir by a young neurosurgeon faced with a terminal cancer diagnosis who attempts to answer the question what makes a life worth living? How does one live knowing one will soon die? How can a physician ease this transition between life and death? What is the relationship between empathy and hope?

In his book Paul Kalanithi, a chief neurosurgical resident at Stanford who, at 36, had already conducted award-winning basic science research, explores this truth, this certainty of death, through the eyes of both

physician and patient. He raises these questions but pushes beyond them, peeling back the layers of discourse about dying as if performing a surgical dissection. Long a student of literature and philosophy, the question that obsessed him — “How long have I got left?” — figures prominently in his posthumously published memoir that reads more like a panel discussion among Enlightenment philosophers at a modern-day medical conference, than like a litany of the probabilities that might chart the average patient’s journey through disease. Kalanithi is interested in why humans cling to these numbers and whether survival statistics, with their imprimatur of scientific rigor, distract us from the deeper meanings of life.

The nature of prognostication means physicians will sometimes be wrong. And the nature of disease means they will often have no cure to offer. But the nature of hope requires a sort of empathy that is not about feeling what their patients feel, but instead about seeing in them what they can be. Sometimes that means refusing to fall, but sometimes it means falling a bit together.

Of health Research) Network.

Organizational Story Telling for Librarians: Using Stories for Effective Leadership. Kate Marek.

2011. ISBN: 978-0-8389-1079-5. \$50.00 (softcover). Chicago, IL: American Library Association. 105 pp. Kate Marek is a professor at Dominican University’s Graduate School of Library and Information Science, where she teaches in the areas of technology and policy. She has worked as a library consultant and in all types of library organizations, and she writes in the areas of libraries, technology, and teaching. Although her book is not recent, it is worthwhile of being mentioned in this journal. Just as literature can be used for learning, the power of storytelling can be very effective when applied to leadership and management. Library expert and author Marek shows readers how they can use storytelling to communicate vision and values with:

- A primer on how to develop storytelling skills
- Tips on how to use narratives to navigate change and build community
- Strategies for using your library’s buildings and history to communicate shared goals.

Applying solid management principles to a library setting, Marek provides the tools and explains the process of leading and managing through organizational storytelling.

NEWS

Free for All: New York Public Library Enhances Public Domain Collections For Sharing and Reuse. On January 5, 2016 the New York Public Library announced that out-of-copyright materials in NYPL Digital Collections (<http://digitalcollections.nypl.org/>) are now available as high-resolution downloads. No permission required, no hoops to jump through: just go forth and reuse!

The release of more than 180,000 digitized items represents both a simplification and an enhancement of digital access to a trove of unique and rare materials: a removal of administration fees and processes from public domain content and improvements to interfaces — popular and technical — to the digital assets themselves. Online users of the NYPL Digital Collections website will find more prominent download links and filters highlighting restriction-free content; while more technically inclined users will also benefit from updates to the Digital Collections API enabling bulk use and analysis, as well as data exports and utilities posted to NYPL’s GitHub account. These changes are intended to facilitate sharing, research and reuse by scholars, artists, educators, technologists, publishers, and Internet users of all kinds. All subsequently digitized public domain. Collections will be made available in the same way, joining a growing repository of open materials.

To provide further inspiration for reuse, the NYPL Labs team has also released several demonstration projects delving into specific collections, as well as a visual browsing tool (<http://publicdomain.nypl.org/pd-visualization/>) allowing users to explore the public domain collections at scale. These projects suggest just a few of the myriad investigations made possible by fully opening them.

The European Review of Aging and Physical Activity (EURAPA), the official journal of the European Group for Research into the elderly and Physical Activity (EGREPA) is delighted to announce that it has now officially been launched on BioMed Central's platform. It is fully open access from January 2015, disseminating research on issues related to physical activity and aging in the biomedical and behavioral sciences. Authors retain copyright of their work, after a rapid, peer review by experts in the field.

FORTHCOMING EVENTS

May 16 - 18, UK Open University

6th International m-libraries Conference

For further information: <http://www.m-libraries.org/>

May 30 - June 3, Helsinki, Finland

ISEW Library. International Staff Exchange Week for Library Professionals

For further information: <http://www.helsinki.fi/kirjasto/en/contact-us/staff-exchange/>

June 6-11, 2016, Seville, Spain

15th EAHIL Conference Knowledge, Research, Innovation ... e-Health

For further information: <http://www.eahil2016.com>

July 6-8, 2016, Shanghai, China

8th Shanghai International Library Forum. Libraries: Enabling Progress

For further information: <http://www.libnet.sh.cn/silf2016/english/>

October 6-7, 2016, Madrid, Spain

ISA – Interoperability Solutions for European Public Administrations

4th International Open Data Conference

For further information: <http://www.iodc2016.es/en>

2017, Philadelphia, USA

9th International Evidence Based Library and Information Practice (EPLIB9) Conference

INSTRUCTIONS FOR AUTHORS JEAHIL

JEAHIL is the official Journal of the European Association for Health Information and Libraries (EAHIL). It publishes original articles, reviews, theme issues and brief communications in the field of health information and libraries. It also publishes news from EAHIL and from other medical library associations, meeting reports, product reviews, opinion and discussion papers and news items. The aim of the European Association for Health Information and Libraries is to unite and motivate librarians and information officers working in medical and health science libraries in Europe. EAHIL encourages professional development, improves cooperation and enables exchanges of experience amongst its members.

Manuscript submission

Manuscripts should be submitted by the corresponding author electronically to the Chief Editor, Federica Napolitani, federica.napolitani@iss.it, accompanied by a presentation letter. Articles presented for publication on JEAHIL must be original and will be submitted to qualified referees before publication. Authors of submitted papers must accept editing and reuse of published material by EAHIL including electronic publishing on the EAHIL website. Reproduction of articles or part of them should be previously authorized.

Manuscript preparation

- Manuscripts should be written in good English and as concisely as possible to allow a clear understanding of the text. They should be typed double-spaced and with wide margins - font size 12 points, Times New Roman.
- The title should be followed by the complete name of the Authors, by their affiliation in English (town and country included) and by the "Address for correspondence" (author, address, email of the corresponding author).
- The recommended length for original articles is about 1000-2000 words (4-8 A4 pages) with no more than 20-25 references.
- Original articles should be accompanied by an abstract of up to 120 words and should also include key words, up to a maximum number of five MeSH terms (www.nlm.nih.gov/mesh/MBrowser.html).
- Avoid numbering in titles and subtitles; write titles in bold, subtitles in italics. Latin or foreign words should be in italics.
- Abbreviations should be spelled out in full the first time they occur in the text, followed by the shortened term in parentheses.
- All references in the text must be numbered in brackets and listed at the end of the article. They should be written in Vancouver style according to Uniform Requirements for Manuscript Submitted to Biomedical Journals (www.icmje.org/).
- For sample references refer to: www.nlm.nih.gov/bsd/uniform_requirements.html
- For abbreviations of periodicals refer to PubMed Journals Database (www.pubmed.gov).
- Extended quotations and illustrations previously published should be authorized for reproduction in JEAHIL by the Authors and previous Publisher.

Tables and figures

Tables and figures should always be accompanied by a legend, and be understandable without reference to the text. Numbered in Arabic numerals they should be cited in the text in round brackets and be of appropriate size for reproduction.

Submission in electronic format

All manuscripts should be submitted together with an accompanying letter in electronic format. The text should be written in Word or RTF format. Figures and photos (in separate files) should be saved in JPEG, GIF or TIFF and have a resolution of at least 300 dpi.

Please note

These Instructions to Authors are in accordance with the Uniform Requirements for Manuscripts Submitted to Biomedical Journals, published by the International Committee of Medical Journal Editors (www.icmje.org/).

Whilst the Editorial Board endeavors to obtain items of interest, the facts and opinions expressed in those articles are the responsibility of the authors concerned. They do not necessarily reflect the policies and opinions of EAHIL.

Editorial Board

CHIEF EDITOR: Federica Napolitani Cheyne

Istituto Superiore di Sanità, Editorial Service,
Viale Regina Elena 299, I-00161 Roma, Italy

- Tel: +39 06 4990 2945
- e-mail: federica.napolitani@iss.it

Petra Wallgren Björk

Danderyd University Hospital Medical Library, 182 88
Stockholm, Sweden

- Tel: +46 8 123 55746 • Mobile: +46701684733
- E-mail: petra.wallgren-bjork@ds.se

Gerhard Bissels

Wissenschaftlicher Leiter Fachbereichsbibliothek Bühlplatz
Universitätsbibliothek Bern, Baltzerstr. 4, 3012 Bern

- Tel: +41 (0)31 631 49 47
- E-mail: gerhard.bissels@ub.unibe.ch

Fiona Brown

The Lady Smith of Kelvin Veterinary Library, Royal (Dick)
School of Veterinary Studies, University of Edinburgh, Easter
Bush, Midlothian

- EH25 9RG, Scotland, UK
- Tel: +44 131 650 6176
- E-mail: F.Brown@ed.ac.uk

Katri Larmo

Terkko - Meilahti Campus Library, P. O. Box 61
(Haartmaninkatu 4) 00014 University of Helsinki, Finland

- Tel: +358 2941 26629
- E-mail: katri.larmo@helsinki.fi

Oliver Obst

Zweigbibliothek Medizin, Universitaets- & Landesbibliothek
Albert-Schweitzer-Campus 1, Geb. A11, 48149 Muenster,
Germany

- Tel: +49 25183 58550
- E-mail: obsto@uni-muenster.de

Letizia Sampaolo

Istituto Superiore di Sanità, Documentation Service
Viale Regina Elena 299, I-00161 Roma, Italy

- Tel: +39 06 4990 2376
- E-mail: letizia.sampaolo@iss.it

Michelle Wake

UCL School of Pharmacy, 29-39 Brunswick Square,
London WC1N 1AX, United Kingdom

- Tel: + 44 (0)20 77535833
- E-mail: m.wake@ucl.ac.uk

Whilst the Editorial Board endeavours to obtain items of interest, the facts and opinions expressed in these are the responsibility of the authors concerned and do not necessarily reflect the policies and opinions of the Association.

Advertisements

To advertise in this journal, please contact eahil-secr@list.ecompass.nl

Instructions to Authors

Instructions to Authors are available online at www.eahil.eu. For further information please contact Federica Napolitani, Chief Editor of JEAHIL federica.napolitani@iss.it

Editorial layout and pagination: De Vittoria srl, Rome, Italy
Printed by: Drukkerij Peters Amsterdam B.V., The Netherlands
<http://www.drukkerijpeters.nl>

EAHIL Executive Board (2015-2016)

President

Marshall Dozier

Information Services, University of
Edinburgh, Edinburgh EH8 9LJ, United
Kingdom

- Tel: +44 131 650 3688
- E-mail: marshall.dozier@ed.ac.uk

Past President

Peter Morgan

Retired from Medical Library-Univ. of
Cambridge, Addenbrookes Hospital,
Cambridge, United Kingdom

- E-mail: pbm2@cam.ac.uk

Vice-President

Lotta Haglund

The Swedish School of Sport and Health
Sciences, Library, Box 5626, SE-114 86
Stockholm, Sweden

- Tel: +46 8 120 537 00
- E-mail: lotta.haglund@gih.se

Honorary Secretary and Co-opted Board member

Karen Johanne Buset

NTNU University Library, Medical Library,
St. Olavs Hospital HF, NO-7006 Trondheim,
Norway

- Tel: +47 72576683
- E-mail: karen.buset@ub.ntnu.no

Treasurer

Ghislain Declève

Bibliothèque des sciences de la santé,
Université catholique de Louvain, 50 Avenue
Hippocrate, 1200 Brussels, Belgium

- Tel: +32 2 764 50 51
- E-mail: ghislain.decleve@uclouvain.be

Board Member

Maurella Della Seta

Istituto Superiore di Sanità, Viale Regina
Elena, 299, 00161 Rome, Italy

- Tel: +39 06 49903277
- E-mail: maurella.dellaseta@iss.it

Board Member

Tuulevi Ovaska

University of Eastern Finland Library
Kuopio University Hospital Medical Library,
P.O. Box 100, FI-70029 KYS Kuopio,
Finland

- Tel: +358 403553427
- E-mail: tuulevi.ovaska@uef.fi

Board Member (webmaster)

Anna Kägedal

Swedish University of Agricultural Sciences,
Library Box 7071, 750 07 Uppsala, Sweden

- Tel: +46 18 67 2842
- E-mail: anna.kagedal@slu.se

Co-opted Board member

Francesca Gualtieri

Rottapharm Biotech s.r.l., via Valosa di Sopra 9
20900 Monza, Italy

- Tel: +39 0397390224
- E-mail: francesca.gualtieri@rottapharmbiotech.com

EAHIL Secretariat Supervisor

Suzanne Bakker (Observer)

Retired from Central Cancer Library,
The Netherlands Cancer Institute,
Amsterdam, The Netherlands.

- E-mail: eahil-secr@list.ecompass.nl
- E-mail: supervisor@eahil.eu

JEAHIL Editor

Federica Napolitani Cheyne (Observer)

Istituto Superiore di Sanità, Editorial Service,
Viale Regina Elena 299, I-00161 Roma, Italy

- Tel: +39 06 4990 2945
- e-mail: federica.napolitani@iss.it

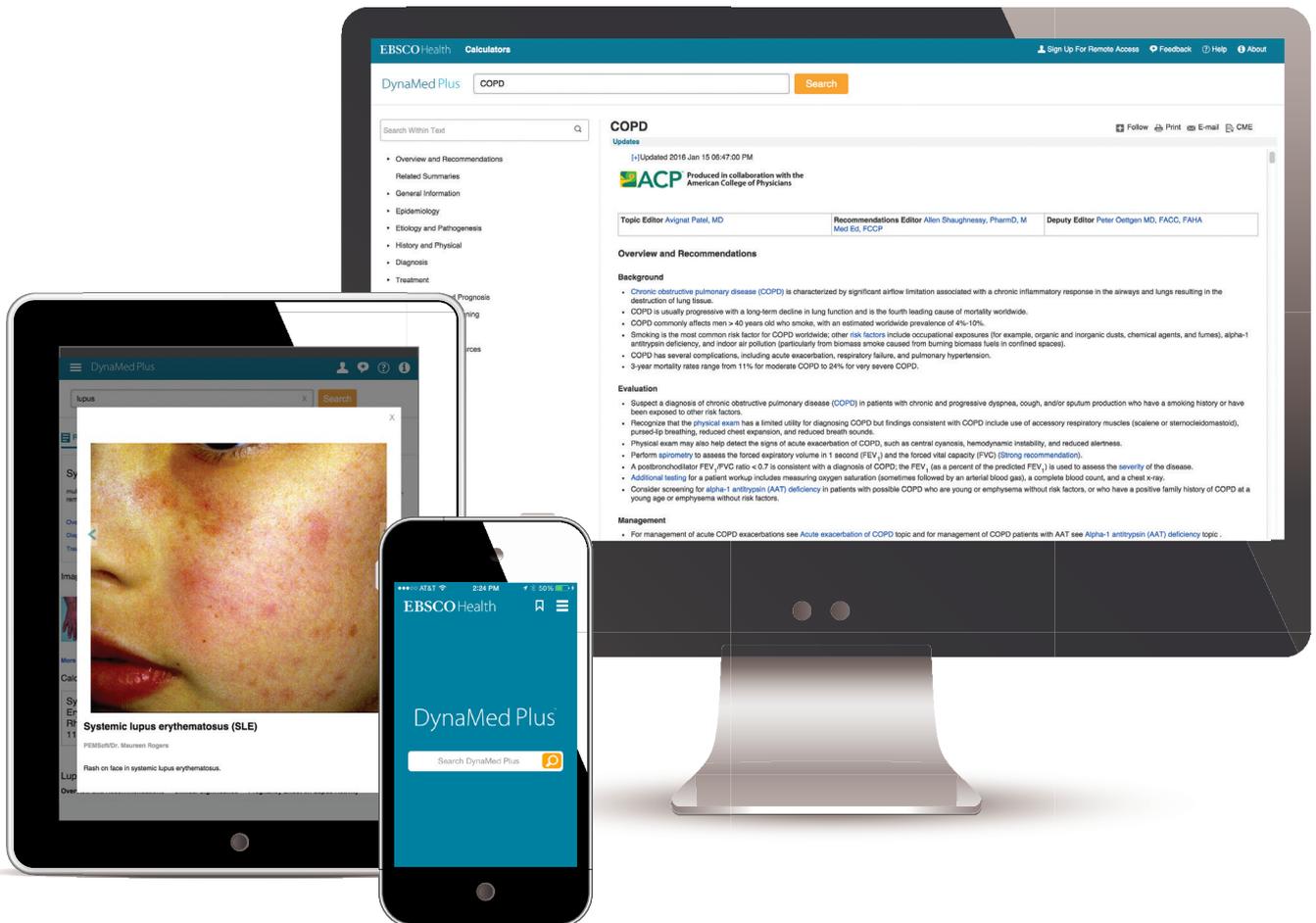
EAHIL Secretariat: P.O. Box 1393, NL-3600 BJ Maarssen,
The Netherlands.
• E-mail: eahil-secr@list.ecompass.nl

IBAN NL08 ABNA 0530364697 - BIC ABNANL2A



© 2015 EAHIL. Some rights reserved

The Right Answers. Every Time.



DynaMed Plus® – the next-generation clinical information resource

- Evidence-based content updated 24/7/365
- Overviews and recommendations
- Robust specialty content
- Over 4,600 graphics and images
- Precise search results
- Expert reviewers
- Mobile access
- Micromedex® Clinical Knowledge Suite drug content (only select products included)