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ISSI NewsletterOnline Special Feature: Brazilian Science and Free Information Access



Sommunica publica

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Since the 1990's, Brazilian scientific output has increased notably. Such increase is easily observed within the ISI database (see Figure 1).

Although these numbers are widely presented on official reports, it is known that they are as not as

much representative for the whole scientific output of the country. The under representation of Brazilian journals in the ISI database, language barriers and some "discrimination" against research from developing countries, like Brazil, are always pointed out as factors that push a large fraction of Brazilian output to domestic journals. In fact, it is estimated that around 2/3 of Brazilian publications are in domestic journals, mostly written in Portuguese, with local circulation and not available on internet.

In order to access the "Brazilian invisible knowledge", the Scientific Eletronic Library On-line (http://www.scielo.br/) was founded in the mid 1990's. This initiative was first supported by the Sao Paulo State Agency for S&T and by the Latin American and Caribbean Center on Health Sciences Information. In 2002, the National Council for Scientific and Technological Development joint to such project. The goal of this electronic virtual library, SciELO, is to provide an on-line (continued on page 2)

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free access to full texts published in a selected set of Brazilian scientific journals. The texts are easily found either by accessing the journals' collection or by using the search form. At the present, the database catalogues the full texts of more the 150 Brazilian journals, distributed as Figure 2.

In short and medium terms, SciELO aims to increase the visibility as well as the impact of Brazilian domestic publications. As for monitoring its database, SciELO has created some criterion to evaluate Brazilian journals, in order to select new ones to enter in it or to judge if they can still remain in it. Details can be found at: http://www.scielo.br/stat.biblio/index.php?lang-en

http://www.scielo.br/stat_biblio/index.php?lang=en

To access the new knowledge is for sure an important feature for improving scientific activities not only on national level but on individual level as well. For students and researchers this requisite is fundamental for carrying out their own projects, for understanding the trends on their research subjects or even for finding their peers. The most important domestic journals are already visible for Brazilian in SciELO. But what about the international journals, are they easily reached by Brazilians? The response is yes. Since 2002, the Brazilian Funding Agency for Higher Education has supported a national project named "Portal Periodicos" (http://www.periodicos.capes.gov.br/). The aim of such huge project is to offer freely and rapidly access to full texts of more then 8,000 international journals in all fields of knowledge. As for an example, there are 189 on-line journals available for Brazilian experts and students on the field of science information. This project is available for researchers, professors and students from around 150 Brazilian universities or research institutes. By accessing the website of each journal, these Brazilians are allowed to enter all the accessible issues and to download an unlimited number of papers. To access this service, however, they should be connected on internet from one of the 150 institutions. Special



authorizations can also be requested in order to access it from outside, for example, from home.

Initiatives towards the increase of information accessibility among Brazilians are a clear signal about how worried the federal and state governs and funding agencies are about improving scientific activities in Brazil. Generally speaking, the more qualified are Brazilians, the bigger are the chances to reduce the current gaps among Brazil and developed countries. No one doubts that science and full information access play important roles within this process.

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CONFERENCE NEW/S

The 10th biennial International Conference on Scientometrics and Informetrics [http://www.umu.se/ inforsk/ISSI2005/] will be held at the Karolinska Institute in Stockholm (Sweden), on 25 – 28 July 2005. The meeting is organised under the auspices of the International Society of Scientometrics and Informetrics (ISSI), and co-chaired by Umeå University, Sweden, and University College, Borås, Sweden.

The conference encompasses all relevant topics in scientometrics, informetrics technometrics and webometrics. More than 120 full papers, research-inprogress papers and posters have been accepted for presentation.

The conference is preceded by a Doctoral Forum offering doctoral students the opportunity to present their research projects to senior researchers and to their colleagues. Sixth COLLNET Meeting [http://www.collnet.de] will be held as satellite event on 28 July, 2005.

16th Australasian Conference on Information Systems (ACIS 2005) "Socialising IT: Thinking About the People" – Sydney, 30 Nov - 2 Dec 2005 ACIS is the premier Australasian conference for IS academics, covering technical, organisational and industry issues in the application of IT to real world problems.

Papers submitted to ACIS2005 are fully doubleblind refereed and selected papers will be fast-tracked to high quality IS journals. The conference will be preceded by a doctoral consortium, and research students are also encouraged to submit papers to the special student section of the main conference where they will be given extended feedback.

To be held at the Manly Pacific Hotel across the street from beautiful Manly Beach. Manly is 10 Km from Sydney CBD by Ferry across spectacular Sydney Harbour. Manly lies on a peninsular between the harbour and the Pacific Ocean, and has over 2 Km of scenic beach, as well as a harbour pool and aquarium. Al fresco dining is available at reasonable prices at a wide variety of cafes and restaurants. In Sydney, December is early summer; the weather is warm and usually fine and sunny with an average maximum temperature of 26C.

Important Dates:

Full Paper Submission:	13 Jun, 2005
Accept/Reject Notification:	2 Sep, 2005
Camera Ready Copy:	
Doctoral Consortium:	28-29 Nov, 2005
Main Conference:	30 Nov-2 Dec, 2005

ACIS is timed to run just before ICIS on 11-14th December in Las Vegas. Delegates from Europe are advised to consider combining the two conferences on a round-the-world ticket.

Conference Tracks

Authors are encouraged to submit papers that fit broadly into the following tracks, although papers on other related topics will be considered.

• IS Theory, Practice and Methods (theories unique to IS, applications of other disciplines to IS, IS development methods, case studies of IS development and use) • IS and Education (educating with IT and educating about IT) • Intercultural perspectives on IS (cultural issues in IS design and adoption, indigenous and other minority voices, IS in cultural preservation and renewal) • IS and Community Services (health, government, sport, community groups) • IT, Creativity and Collaboration (interactive art, supporting design, artists and technologists working together) • IS and Global Collaboration (supporting international research, development, business and learning) • IS and Mobile Devices innovation, adoption, knowledge sharing, work practices • IS and Business Strategy (governance, change, new ways of doing business, developing relationships within the business) • Integrity of IS (security, ethics, legal issues)

Paper Format

Authors are invited to submit original and unpublished papers for consideration for ACIS2005, nominating a theme-related track. All papers will be double-blind refereed. Maximum paper length is 10 A4 pages (Times Roman 10pt) in total. A template for paper preparation can be found at the web site given below.

Oral presentations will be 20 minutes plus 10 minutes for questions. There will be a special track for papers by current PhD students (single author only). The same paper requirements apply, but 20 minutes oral presentation will be followed by 20 minutes discussion by the group.

website: http://depts.it.uts.edu.au/is/ACIS2005 e-mail: jim@it.uts.edu.au

WOLFGANG GLÂNZEL & RONALD ROUSSEAU:

Erdös Distance and General Collaboration Distance

For those among you who are not particularly acquainted with mathematics we recall that Paul Erdös (Pál Erdős in Hungarian) is the most proficient mathematician ever. His publication list contains more than 1500 items, which is more than Euler's. Erdös was born in Budapest in 1913 and died in Warsaw in 1996. Because he had more than 500 collaborators mathematicians started counting the Erdös distance (E-distance for short), defined as the length of the shortest collaborator link to Erdös. Erdös himself has E-distance zero; those mathematicians that have at least one article published in collaboration with Erdös have E-distance 1; those that collaborated with a collaborator of Erdös have E-distance 2 and so on.

Clearly if one's E-distance is 4 or more it becomes difficult to find out the exact value. Luckily, since the end of last year MathSciNet has a special feature allowing one to find out immediately. Actually much more is possible as one can find out the shortest collaboration distance between any two mathematicians who have at least one article in MathSciNet. One can reach this feature by doing an author search and then clicking the "MR CD" button. Of course, it is possible that there is no collaboration link between the two scientists. Out of curiosity we introduced the names of a number of informetricians or well-known scientists in our field (such as Benoit Mandelbrot and Herbert Simon). Remember that a prerequisite is that this colleague must have been active as a mathematician. We introduced the following names: A.L. Barabasi, J. Bar-Ilan, A. Bookstein, O.L. Burrell, C.H.Q. Ding, L. Egghe, H. Eto, W. Glänzel, S.D. Haitun, F.F. Leimkuhler, B.B. Mandelbrot, M.E.J. Newman, D. de Solla Price, R. Rousseau, A. Schubert, H. S. Sichel, H.A. Simon, M. Thelwall, and A.I. Yablonsky. All this scientist are present in the MathSci database. Yet some of them have no collaborators, or just one who in turn had no collaborators: these are Eto, Haitun, Price, Sichel and Thelwall. Consequently they have no Erdös number within mathematics. Of course, going out of the field of mathematics might give them an Erdös number. For example: as Mike Thelwall has a joint article with Ronald Rousseau, his Erdös number is at most four.

Results are presented in the following Table. Shortest paths passing via Erdös are shown in bold. E-distances are shown in square brackets after the name of the scientist.

	R AL	ΒJ	ВА	ВQ	DC	ΕL	GW	LF	MB	IN M	K K	SA	2 H
Barabasi, AL [4]	0	5	7	7	6	6	2	7	2	5	6	1	6
Bar-Ilan, J [3]	5	0	5	7	6	6	5	7	5	5	6	5	5
Bookstein, A [3]	7	5	0	7	7	6	6	9	6	6	6	6	7
Burrell, QL [5]	7	7	7	0	7	6	7	8	6	6	7	7	7
Ding, CHQ [4]	6	6	7	7	0	5	6	8	6	5	4	6	6
Egghe, L [4]	6	6	6	6	5	0	6	8	5	6	1	6	6
Glanzel, W [3]	2	5	6	7	6	6	0	8	3	5	6	1	6
Leimkuhler, FF [6]	7	7	9	8	8	8	8	0	6	8	7	8	8
Mandelbrot, BB [3]	2	5	6	6	6	5	3	6	0	4	6	2	4
Newman, MEJ [3]	5	5	6	6	5	6	5	8	4	0	5	5	6
Rousseau, R [3]	6	6	6	7	4	1	6	7	6	5	0	6	7
Schubert, A [3]	1	5	6	7	6	6	1	8	2	5	6	0	6
Simon, HA [4]	6	5	7	7	6	6	6	8	4	6	7	6	0
Yablonsky, Al [4]	6	6	7	7	7	7	6	8	6	7	7	7	5

Table 1 "Pseudo-Erdös distances" among informetricians

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Note that this table is of course symmetric. Recall that it is said that just six steps separate us from any other person on the planet (for an acquaintances network). Clearly for this subset of informetricians-mathematicians shortest collaboration distances range from 1 to 9.

The following Figure finally visualizes the pseudo-Erdös distances in a two-dimensional projection of our informetric network. Distances Mandelbrot has the shortest average distance to other authors in the group (<5), Leimkuhler the longest (finite) one (>7). The average distance among all authors of in the group is about 6. This again substantiates the small world property since we have to keep in mind that all distances are established through the authors' mathematical work alone. Paths connecting authors might otherwise become essentially





therefore do not proportionally show the length of the above paths. The group consisting of Thelwall, Eto, Haitun and Sichel is symbolically separated from all other authors of the group since their distance to all authors is infinite. Also Derek de Solla Price belongs to this group of isolates. Authors connected by dotted lines have the shortest link with each other via Erdös. Leimkuhler and Bookstein, on one hand, and Rousseau/ Egghe and Schubert/Glänzel/Barabási, on the other hand, form diametrically opposite authors. shorter if all publications are taking into account as this piece co-authored by Rousseau and Glänzel illustrates.

The authors wish to thank Dr. Patrick Glenisson for providing the graphic presentation of the network of informetricians and Alesia Zuccala who suggested R.R. to have a closer look at MathSciNet.

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http://www-history.mcs.st-and.ac.uk/history/ Mathematicians/Erdos.html



RAFAEL BALL, DIRK TUNGER: Bibliometric Analyses – Data, Facts and Methods Basic Knowledge in Bibliometrics for Scientists, Science Managers, Research Institutions, and Universities (in German) Forschungszentrums Jülich GmbH, 2005, 81 pp. ISBN: 3-89336-383-1

BOOK REVIEW

Background

Germany is one of the leading countries in scientific research, and has to stand a stiff competition with its European neighbours UK and France, on one hand, and with USA and Japan, on the other hand. According to the *Science Citation Index Expanded*[™] of Thomson – ISI (Philadelphia, PA, USA), Germany has the world's fourth largest publication output in the sciences: At present German scientists publish more than 8% of the world's scientific papers. Germany's gross domestic expenditure on R&D exceeded EUR 53 billion in 2003 making up 2.5% of GDP.

Besides the stiff international competition, above all decreasing public funds for research, increasing outsourcing and the demand for more transparency brought quantitative methods of research evaluation into the centre of interest. Scientific institutions have to demonstrate their productivity, efficiency and competitiveness in research. Moreover, statistics on publications and citations have already become components of national funding formulas (cf., Butler, 2004, Debackere & Glänzel, 2003). As a consequence, bibliometric methods gained increasing importance not only in the evaluation of research but also in allocating funds. Two reasons for their growing importance are obvious in this context: the efficiency and objectivity of science indicators and, of course, the possibility of their standardisation and comparability.

However, lacking experience in practice on the part of users outside the community has sometimes lead to uninformed use of bibliometric results, and has brought bibliometrics in discredit. Moreover, possible repercussions based on policy use and misuse of bibliometric data might distort scientists' communication behaviour, and might make the acceptance of bibliometrics as evaluation tools among the concerned scientists even more difficult (cf. Glänzel & Debackere, 2003). Science managers and scientists, who see themselves as objects (some even as victims) of evaluation, have recognised this deficiency (Ball, 2003). Users also complain that bibliometricians should focus more on applicability of their results, and issue quidelines for the use of indicators (cf. Frick, 2004). However, pitfalls can hardly be understood and limitations in application cannot properly be communicated without the possession of necessary background information. Sophisticated methodology developed by bibliometricians during the last two-three decades, and communicated in a specific technical jargon is contrasted by the demand for robust, comprehensible and easyto-use indicators on the part of science policy. As a consequence, the gap between bibliometric research and application by users has deepened.

The handbook

In order to contribute to bridging this gap, the Central Library of the Research Centre Jülich has taken up this key-problem by publishing a small handbook entitled "Bibliometric Analyses – Data, Fact and Methods" in German language. On not more than 80 pages Rafael Ball and Dirk Tunger communicate bibliometric basic knowledge and elementary techniques with scientists and potential users in scientific institutions, science policy and research management. The primary objective of this unique endeavour is to assist users in conducting their own bibliometric analyses and in preparing methodologically sound and reliable studies. The organisation clearly supports this objective. The first chapter Unfortunately, the strength of the book also implies some shortcomings. The methodological part in Chapter 5 is based on research conducted at the Central Library in Jülich. This relatively extensive part results in a slightly illbalanced presentation of methodology. The reader misses other important issues such as an appropriate description and discussion of bibliometric indicators and their use for the evaluation of research. The extremely short description of basic indicators, partially based on CWTS' terminology, remains superficial. The interested reader might wish to learn more about problems in using bibliographic databases for bibliometric studies, about the correct use and limitations of ISI impact factors, about pitfalls in



following the introductory part provides a concise and comprehensible but nonetheless profound introduction to the history and background of bibliometrics. This is followed by an overview of main variants of bibliometric analyses. Chapters 4 and 5 form the methodological centre of the book; basic knowledge necessary to conduct these analyses is presented here. All techniques are illustrated by examples. As throughout the book, important facts and interesting details are highlighted here in special textboxes. After brief reflections on the role of libraries and future perspectives in bibliometrics, the rest of handbook turns into a user's manual. Useful checklist and templates for planning and designing bibliometrics analyses as well as a "troubleshooting" section with suggested solutions are presented here. The book is concluded by a concise overview of literature, relevant scientific journals, a list of research groups with contact addresses and a short glossary.

subject classification based on journal assignment, about the choice of appropriate citation windows in citation analyses, etc.

Without any doubt, the book is addressed to scientists and decision makers in Germany. It is not the German language alone that emphasises this target group; the book is also an immediate reaction on the ongoing discussion in Germany (cf. Ball, 2003, Ball & Tunger, 2005). Nonetheless, it is somewhat disappointing to find so little information about the experience gained by bibliometric centres and research groups outside Germany. Many of them are operational for two or three decades. ISI in Philadelphia (USA), ISSRU in Hungary, CWTS in the Netherlands, CINDOC in Spain, OST in France, the research groups in Scandinavia, REPP in Australia and NISTADS in India – just to mention some of them – have developed versatile bibliometric tools, and have prepared numerous evaluative studies supporting

decision-making in science policy. I sincerely hope that the authors intend to publish an extended, more comprehensive English version of this book drawing on the experience gained by those research groups. Bibliometricians as well as users all over the world await with interest an English edition of guidelines such as these, where the focus is not anymore exclusively on Germany.



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"You're a selfish bastard, Lewis..! Those stem cell lines were meant for people who've LOST an organ!"

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INTRODUCING THE DEREK DE SOLLA PRICE AWARDEES OF 2005

- interviews by Balázs Schlemmer –

The awarding ceremony of the Derek de Solla Price Memorial Medal has become an essential part of the programme of ISSI conferences since the founda-

tion of the Society in 1993. The Price Medal was conceived and launched by Tibor Braun, founder and Editor-in-Chief of the international journal Scientometrics, and is periodically awarded by the journal to scientists with



outstanding contributions to the fields of quantitative studies of science.* This year's awardees are PETER INGWERSEN (Royal School of Library and Informa-

tion Science, Centre for Informetric Studies, Copenhagen, Denmark) and HOWARD D. WHITE (College of Information Science and Technology, Drexel University, Philadelphia, USA).

Congratulations to the award-winners!

PETER INGWERSEN

■ Little boys usually want to be truck drivers or famous soccer players. It is hardly conceivable that a child decides that he would deal with scientometrics when he grows up. How did it all begin then? How did you get in contact with scientometrics? (And by the way, what did you, as a child intend to become when you would grow up?)

PI: When I was a child I wanted to become a geologist (like my father) and deal with chronological issues and methods concerning the age of various objects. Instead I became originally educated as information scientist/librarian and started immediately after graduation at the Royal School of LIS as lecturer in indexing and cataloguing. Early on I wanted to do research and was lucky to have some good colleagues with research experience with whom I made projects in the late 1970s. The topic was basically interactive information retrieval, in particular the user-librarian interaction processes. Since then, my major track of research is actually in information retrieval - and I have always been interested in online searching. Some of the basic databases to use were the citation databases. Since a colleague of mine, Finn Hjortgaard Christensen, a mathematician, was interested in doing bibliometrics, we worked together from 1994 on what we called 'online bibliometrics'. You use all your retrieval skills to extract information in time series from the citation databases - mainly on Thomson/Dialog. So one can probably detect a link back to my interest in chronological matters. We also discovered that there were other researchers in retrieval who also did bibliometrics/scientometrics, such as Abe Bookstein, Jean Tague, Miranda Pao, and Don Swanson. This bridging is obvious, since you cannot do scientometric analyses without retrieval knowledge. Unfortunately, my colleague died some years ago, but I continued the track and did in addition move into webometrics from 1996 on, working together with interested and highly capable students. Do you still remember what were the main findings of your first professional publications? What was your first publication, actually?

PI: Yes indeed, my first real journal article was published in Journal of Documentation in 1982, and presented the results from the above mentioned project on librarian-user interaction. In present day terms it dealt with cognitive styles of searchers, their knowledge types and levels and why things go wrong during end-user searching in libraries, e.g. people do not understand the classification systems and alike. The article has been used a great deal during the 1980s by other researchers in information science.

And what was your most important publication? (Not necessarily the one with the highest citation impact, but the one, which is your personal favourite just because of the complexity and/or beauty of the research.)

PI: In the retrieval track it is my book, Information Retrieval Interaction from 1992, and a follow-up article in Journal of Documentation (199ISSI Newsletter: on cognitive perspectives for information retrieval. In the scientometrics track it is probably the short article on the calculation of Web Impact Factors I published in 1998.

When I started scrutinizing your homepage I immediately



* You can learn more about the award and award winners on the ISSI website: http://www.issi-society.info/price.html

spotted that you had worked for the European Space Agency. Having an astronaut amongst the scientometrists - wow! It seemed to be a very promising and exciting start. Of course, the cruel reality was a little bit less extraordinary. What exactly did you do at ESA?

PI: I went there as a research fellow and worked at the Online Service Division of the Agency. We acted as a scientific online host in sharp competition with Dialog. I still remember the difficulty we had in order to obtain the citation databases from ISI. My job was to mount and design the database structures for online files like Inspec, Chemical Abstracts, Pascal, etc. and also make the documentation. Later I designed the online help system as a kind of hypertext system. I was also part of the team that invented the Zoom command 1982-84, that made available frequencies of search keys. Originally the facility could be used for weighting purposes, but essentially one could apply it to scientometric analyses as well, e.g., obtaining a ranked list of most productive authors, journals etc. in a set of references - like nowadays in the Rank command by Dialog.

After ESA in Italy you have lived abroad several times. In 1987 you worked in the United States and in 1996 you were a visiting professor in Tokyo, Japan. What impressions and experiences do you have about these two fundamentally differing countries? Have you undergone cultural shocks? PI: In the US I worked at Rutgers University which is located in New Jersey outside New York - a 40 minutes train drive. So I had the more rural as well as the cosmopolitan USA at my fingertips. I did not experience a cultural shock, I mean, that part of the US is close to European ways of life - just multiplied in action. In Japan, I lived close to Keio University, which is a bit away from the Tokyo city center. That was quite a difference to Europe, but a very positive experience. I lived in a flat and did my cooking, so I had to buy the food stuff myself. That was interesting when you only know three sentences in Japanese!

■ Then finally, let us take a closer look at the man behind science. How do your colleagues and/or students characterize you? And how do you refine the picture?

PI: You will have to ask them, e.g. Birger Larsen (blar@db.dk) with whom I have done some scientometric projects over the recent years.
5 books, 5 CDs and 5 movies you would take to a desert

island...

PI: Tolkien: Silmarillion, Hemingway's collected works. Of CDs it might be Wagner's the Ring and Sibelius and of movies, some Marlon Brando films and Citizen Kane, definitively, but also a couple of Bogart/Bacall movies would be nice - given that the island has electricity and CD/DVD players!

■ What was the most embarrassing situation during your professional career? And what was the funniest one?

PI: Most embarrasing was when I discovered that I had miscalculated in an analysis after the article was published. Of course, the reviewers should have seen it but ... The funniest one. I don't know really - but it was quite funny when at a conference dinner back in 1992 in Copenhagen in Tivoli gardens, Denmark was playing Holland in the semifinals of the European Soccer Championship. We had the servants to bring me the news of goals so I could transmit them over the loudspeaker to the many interested colleagues at the dinner. We won and the Dutch got free beer for the rest of the night by everybody on the street in Copenhagen; and Tivoli was empty except for the American colleagues who did not care for soccer.

Howard D. White

■ If someone takes a glance at your publication list, he or she will get the impression that you are not the kind of scientist who devotes his whole life to a certain topic. A quite labyrinthine route must have led from the first fields of interest to scientometrics. How did it all begin? How did you get in contact with scientometrics?

HDW: My doctoral dissertation at UC Berkeley was on social science data archives, particularly their relation to traditional research libraries. But my interests have always been diverse (one might say broad and shallow rather than narrow and deep). I published several items on data archives in the late 1970s while beginning my teaching career at Drexel University. At the same time I learned to do online searching on real systems (Dialog, SDC) as opposed to the small experimental systems we'd had at Berkeley a few years before. I'm naturally a novelty-seeker, and as I began to prepare my case for tenure, I shifted away from data archives (about which I really couldn't say much more) to certain avant garde aspects of online searching, such as co-cited author retrieval. This choice grew naturally out of Drexel's proximity to the Institute for Scientific Information in Philadelphia. It also reflected the indirect influence of my Drexel colleague Belver Griffith, who had pioneered co-citation mapping with his friend Henry Small of ISI. Belver was a close friend of Derek Price, who would come down to visit us from Yale and who was very much interested in the co-citation project. At the same time, Charles Meadow, another professor at Drexel (and then the editor of what is now JASIST), had created an online retrieval laboratory in which

new things could be tried. So this was the backdrop against which I wrote the papers *Cocited Author Retrieval Online: An Experiment with the Social Indicators Literature* and 'Bradfordizing' Search *Output: How It Would Help Online Users.*

Moreover, at the 1979 conference of the American Society for Information Science in Minneapolis—the conference at which Price and others spoke in a special session on "The Revolution in Mapping Science"—I learned an in-house Dialog command (*.Intersect*) from Charles Bourne, who had moved to Dialog from UC Berkeley. This "secret" command opened up new possibilities for online datagathering, because it allowed one to obtain co-citation counts in ISI



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databases for a dozen or more pairs of authors at a time. I saw immediately that the .Intersect command would enable me to create matrices for input to the clustering and multidimensional scaling routines that Belver already knew well. It would thereby open the mapping of ISI data to outsiders with access to programs like SPSS; hitherto only insiders like Henry Small had been able to map data, using special programs available only at ISI. The first fruit of this new capability was the paper I published in 1981 with Belver as co-author, Author Cocitation: A Literature Measure of Intellectual Structure, which initiated Drexel-style author co-citation analysis (ACA) and became one of my most highly cited works. The writing in that paper was about 95% mine, but, because I had written it under Belver's tutelage. I was afraid he would want to be first author. However, unlike some professors I had known at Berkeley, he was good about giving proper credit and allowed me that position. He also sent the paper in draft to Derek Price, and I was delighted to learn that Derek thought very highly of it. Belver and I went on to several more ACA papers, and I appeared as the first speaker on a panel on scientometrics that Derek organized for the 1980 conference of the American Association for the Advancement of Science in Toronto. I have always likened that to being the band that opens for a really big showbiz act-in this case Price himself.

Do you still remember what were the main findings of your first professional publications? What was your first publication, actually?

HDW: My first professional publication was *Profundity in Aphorisms*, published in 1960 in *ETC.:A Review of General Semantics*. I wrote it as a student in a 1959 course on semantics at San Francisco State University; my teacher, Richard Dettering, gave it to the editor, S. I. Hayakawa, who was then a professor at S.F. State. I argued that aphorisms are really metalinguistic comments on language rather than imperatives for action or true descriptions of the world. Aphorisms seem profound because, not needing an extensive linguistic context in which to be understood, they dispel (but also subsume) huge amounts of verbiage. I am still drawn to speculations like this; for example, I see a line between my early interest in aphorisms and my present interest in algorithmic summarization techniques. I think Charles Bernier's ideas about "terse literatures" should be better known in information science.

■ And what was your most important publication? (Not necessarily the one with the highest citation impact, but the one, which is your personal favourite just because of the complexity and/or beauty of the research.)

HDW: I'm fond of *Authors as Citers over Time*, which appeared in 2001 in the *Journal of the American Society for Information Science*. I wish readers in the informetrics community would build on my work with OCLC holdings counts in *Brief Tests of Collection Strength*. There are some good popularization of ideas in my ARIST reviews *Bibliometrics* and *Visualization of Literatures* and in my chapters of the book *For Information Specialists; Interpretations of Reference and Bibliographic Work*.

■ Let's still continue with your articles, but take a look behind the scientometrics too. When I checked your publication list on your homepage, I found a lot of interesting topics you had dealt with. I selected two of them that can be easily understandable also for non-librarians. Firstly, library censorship. I know, it is not easy to summarize this debate for those who did not follow it, but please, try to reveal what it was all about. HDW: At Berkeley, I hung out with guantitative sociologists and learned to do secondary analysis of machine-readable social data. (That is what data archives, my thesis topic, are set up to facilitate.) When I got to Drexel I obtained a big survey on American attitudes toward pornography that researchers at Temple University had done for the National Commission on Obscenity and Pornography in 1970. There was a question in it about whether, as a non-legislative way of controlling pornography, librarians should "keep objectionable materials off the shelves." About 80% of the American public said yes. I was interested in the characteristics of the 20% who said no. They turned out to be well-educated liberals of the sort who figure prominently in public library clienteles. This I wrote up as Library Censorship and the Permissive Minority in the Library Quarterly in 1981. So far as I know, no one had published an empirical report like that in the library press before. (I must also be the first person ever to use the word "masturbation" in the Library Quarterly's august pages.) A few years later I reanalyzed the questions in the General Social Surveys that have to do with whether one approves of the removal of books by controversial authors from public libraries. The controversial authors are a communist, an atheist, a racist, a right-wing militarist, and a homosexual. Ordinarily these questions about possible censorship are merged with others as indicators of attitudes toward civil liberties (they come from Samuel Stouffer's research on that topic in the 1950s). I was the first, I think, to single them out for their relevance to the library world. The resulting article was called Majorities for Censorship, published as a cover story in Library Journal in 1986. The title is meant to be ironic; in the overall American public there are no majorities for censorship of any of the author types. The only subpopulations in which majorities do support library censorship are the usual bastions of reaction, such as the elderly, people with low levels of education, Southerners, and Baptists.

■ Why do you think it was such an important issue in the United States? And what has changed since you dealt with it in the second half of the eighties?

HDW: Library censorship is always a hot topic in the U.S. because there are so many attempts at it, some of them successful. In library schools you can always get a discussion going by bringing it up; the ethical issues fascinate students. However, almost no one among library & information science researchers does secondary analysis of existing surveys, or at least no one has followed up my studies with others like them. Therefore, I don't know whether anything has changed. I suspect that the overall trend is toward greater liberalization of attitudes, but also more strident support of censorship on the part of sizable minorities. Secondly, a research about the national evaluation of school libraries. Who ordered this research and for what purpose?

HDW: I was asked by the American Association of School Librarians to give a data-based account of what the staffing, expenditures, and collections of exemplary media centers would look like. To do so, I did a secondary analysis of a large survey conducted by the National Center for Educational Statistics; the sample consisted of about 3,500 library/media centers in American public elementary and secondary schools. My results were published as an appendix to the 1988 book *Information Power; Guidelines for School Library Media Programs*. However, for political reasons school librarians tend to resist anything resembling quantitative standards; they do not want to give anyone the power to judge them substandard on any count. My figures seem to have had little impact, and data similar to them have not, I think, been published again.

■ What were your main findings? Did you find anything unexpected? And what were the consequences (if there were consequences at all)?

HDW: On my own I reworked the same data for an article called *School Library Collections and Services: Ranking the States;* it appeared in 1990 in the *School Library Media Quarterly*. It showed broad regional effects in various kinds of library excellence (and non-excellence). One thing that I, a former Californian, had not expected was the abysmal state of school libraries in California—probably the result of funding cutbacks following the passage of Proposition 13 in 1978. Stephen Krashen of USC has cited my paper in Web publications that link poor school libraries to the poor reading scores of California children.

■ Then finally take a closer look on the man behind science. How do your colleagues characterize you? And how do you refine the picture?

HDW: My colleagues might characterize me as a nice guy, a bit wifty but amusing, rather inclined to avoid conflict, surprisingly creative over a long career. To this I might add, "Just another Antonio Banderas look-alike."

■ 5 books, 5 CDs and 5 movies you would take to a desert island... HDW: Books: Thomas Mann's Doctor Faustus, Nabokov's Ada, Richard Powers's The Gold Bug Variations, Shakespeare, the Bible. CDs: Bach's Goldberg Variations, the late string quartets of Beethoven, Mahler's Rückert Songs, Strauss's Der Rosenkavalier, Stravinsky's Symphony of Psalms

Movies: On the Waterfront, Dr. Strangelove, Ferris Bueller's Day Off, Kieslowski's Three Colors trilogy (especially Blue), Wit.

■ What was the most embarrassing situation during your professional career? And what was the funniest one?

HDW: *Embarrassing.* I've been lucky; all I can think of offhand are things like teaching a class with my sweater inside out (girl at break: "Oh, Dr. White..."). More generally, given that I work in informetrics, it's embarrassing not to be a mathematician. I majored in English and am basically a literary type.

Funny. Back about the time I wrote my first paper in 1959, I was riding to San Francisco State University in the rear of a very crowded streetcar on the M-Ocean View line. Up ahead of me a woman was sitting in one of the side seats; because the people all around me blocked my view, all I could see were her legs and the hardcover book she was holding, Rilke's *The Notebooks of Malte Laurids Brigge*. I thought, "Wow, look at those great legs, and she's reading a really highbrow book that I've been reading, too. I've got to check her out." So I got up and bit by bit made my way up the aisle through the dense crowd until I could finally get a look at her. It was my wife.

TRIPLE HELIX 5 CONFERENCE

The recent international Triple Helix Conference was the fifth one in a series of biennial conferences that had started 8 years ago to analyze the interaction between University, Government and Industry and its influence on the economic development of specific regions.

The Conference, organized by Fondazione Rosselli, was held in Turin, Italy, from 18-21 May 2005 and dealt with the Capitalization of knowledge and its cognitive, economic, social and cultural aspects.

About 400 participants – academics, policy makers and practitioners – from the whole word were brought together to discuss and interact on all issues related to the triple helix concept. The aim was to allow debate and exchange of ideas, methodologies and outcomes, in order to innovate and influence practice and policy making. You can read more about the conference on its website: http://www.triplehelix5.com/

Here you can find a little pictorial report about the conference, the social event and Turin.



plenary conference room between two presentations



scrutinising the conference programme in the buffet



Bart van Looy (Incentim, Belgium) presenting in the session 'knowledge creation'



crossword definition: Turin's river, starts with 'P', 2 letters



buffet tables waiting for hungry tribes of conference participants



20 May: Juventus has become Italy's Champion for the 28th time



scientific chit-chat with Martin Meyer (SPRU, UK)



white roses close to the University Botanical Garden



luxurious conference dinner in the building and backyard of the City Archives



Wolfgang Glänzel (SOOS, Belgium) is presenting



Michel Zitt (INRA, France) is presenting



tipical Italian passage with decorative hammered gate



the pride of Turin: Mole Antonelliana



monastry on the bank of the river 'Po'



bizarre modern sculpture covered by acrylic nails



Triple Helix poster in front of the conference building



late afternoon Italian mood