Introduction to Scientific Publishing

Backgrounds, Concepts, Strategies

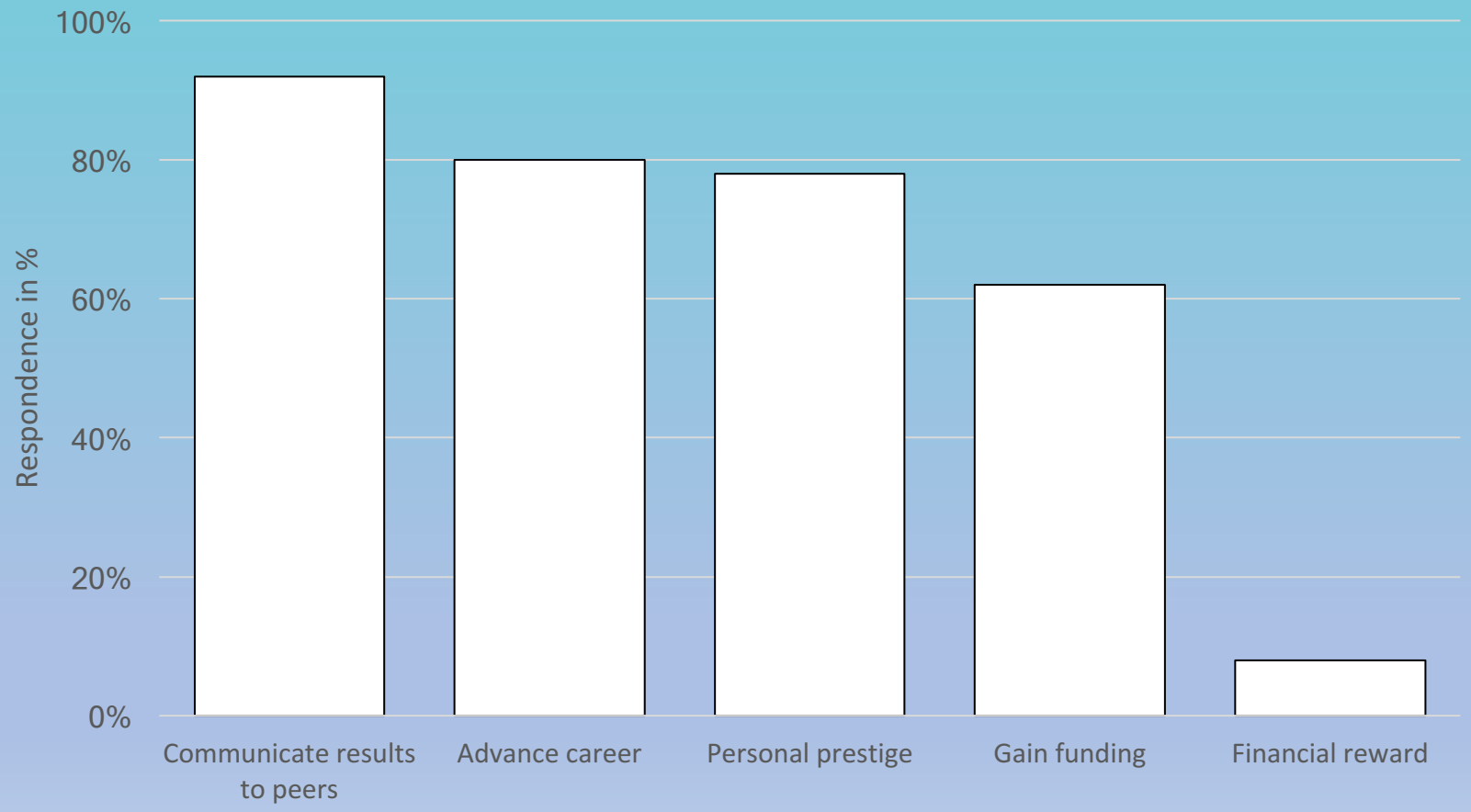
1 Introduction

Why people publish their results?

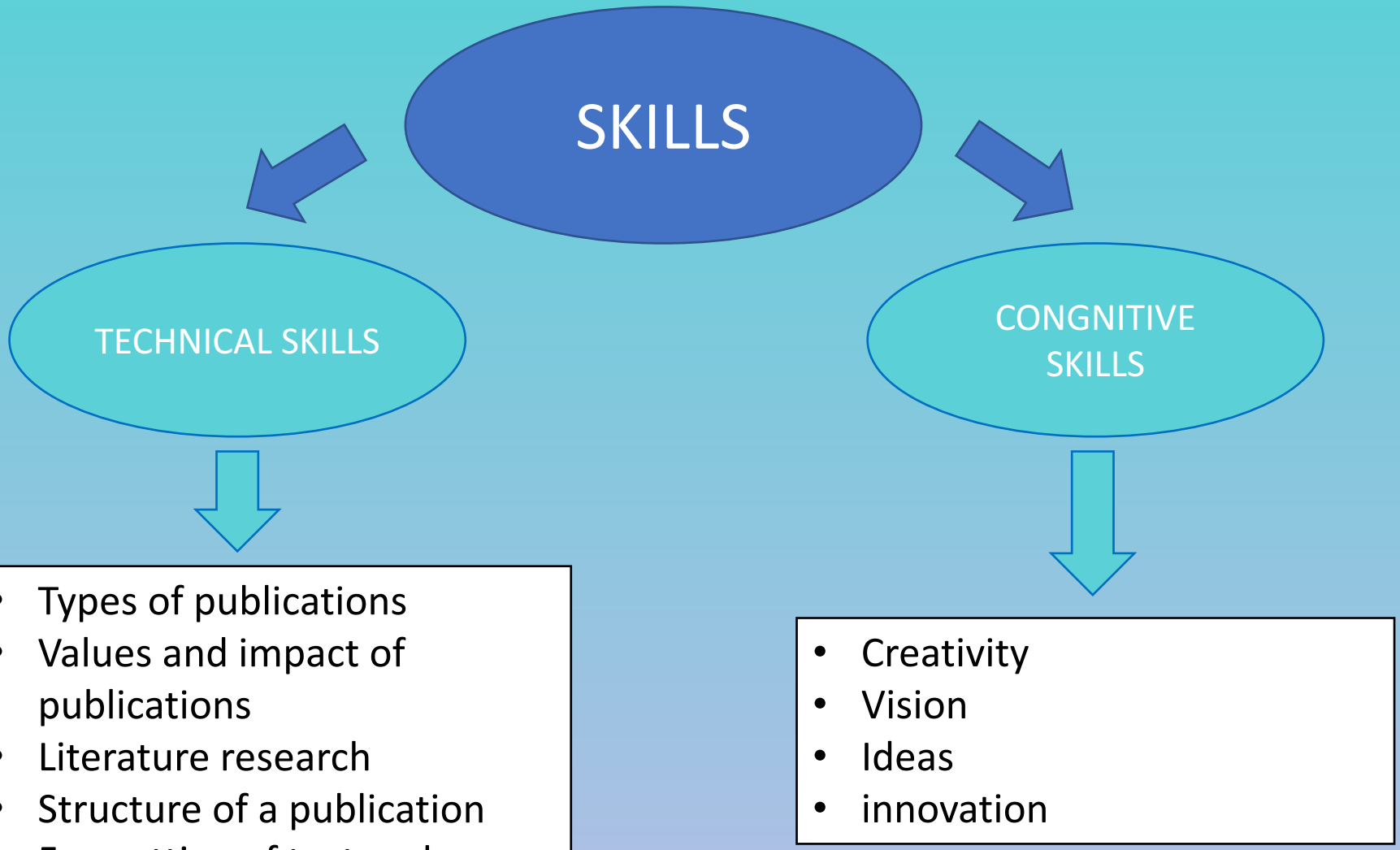
Based on surveys, It can be seen that the primary reason for publishing is to **share the knowledge and results with the peers so that research and development can progress**. Additionally, the following groups of reasons are:

- Advancement of scholarship/society/mankind,
- personal career progress/assessment,
- stamp claim on work, document results, posterity,
- requirement of job,
- feedback from peers and scholarly community,
- personal satisfaction,
- enhancement of the reputation of their institution,
- other.

Scholars' objectives for publishing their work. Data adapted from SwanA, Brown S (2005)



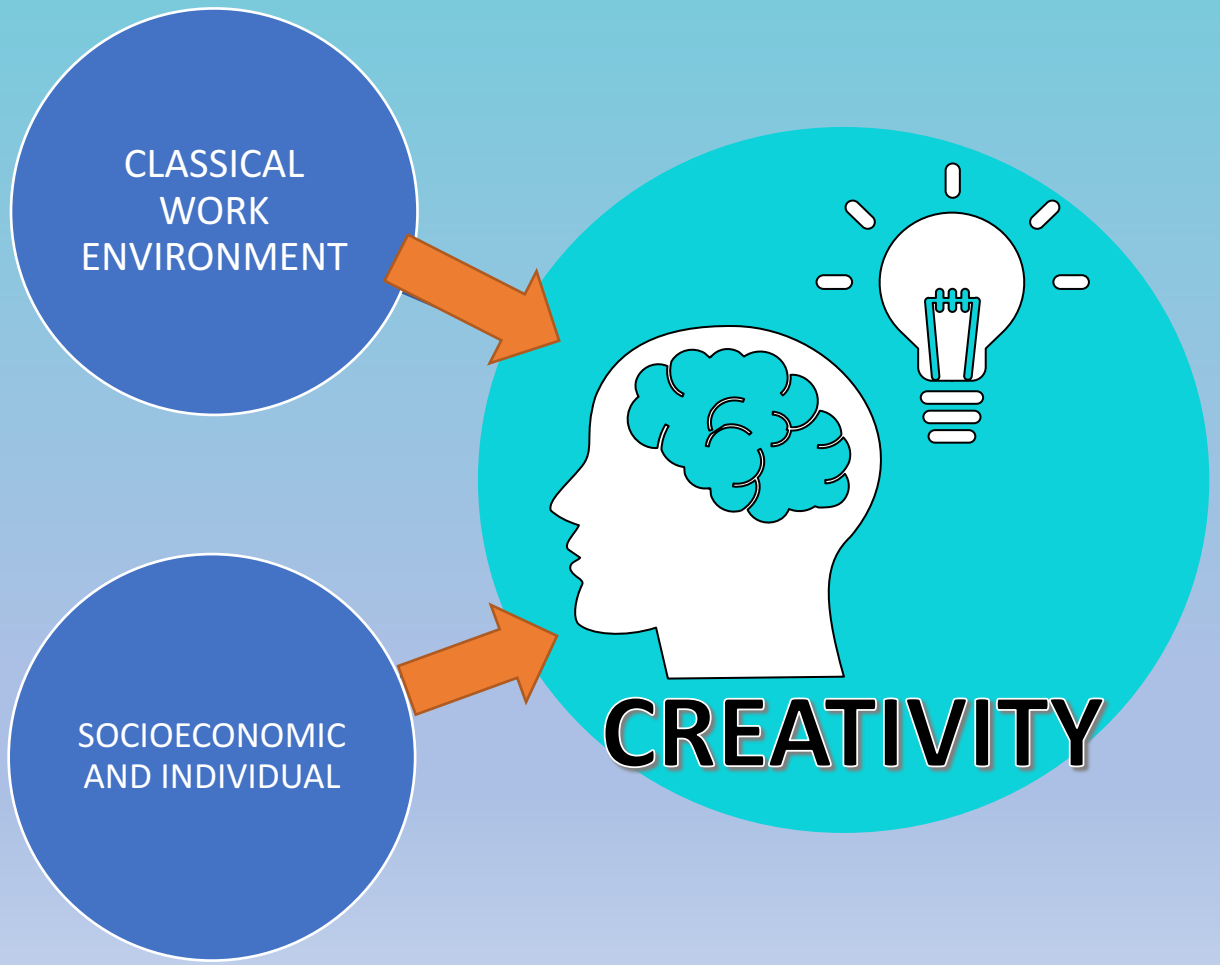
2 Technical and Cognitive Skills in the Context of Scientific Writing


SKILLS
TECHNICAL SKILLS
CONGNITIVE SKILLS
• Types of publications
• Values and impact of publications
• Literature research
• Structure of a publication
• Formatting of text and figures
• English language
• Search for funding
• Basic and applied research
• Creativity
• Vision
• Ideas
• innovation

FACTORS INFLUENCING CREATIVITY

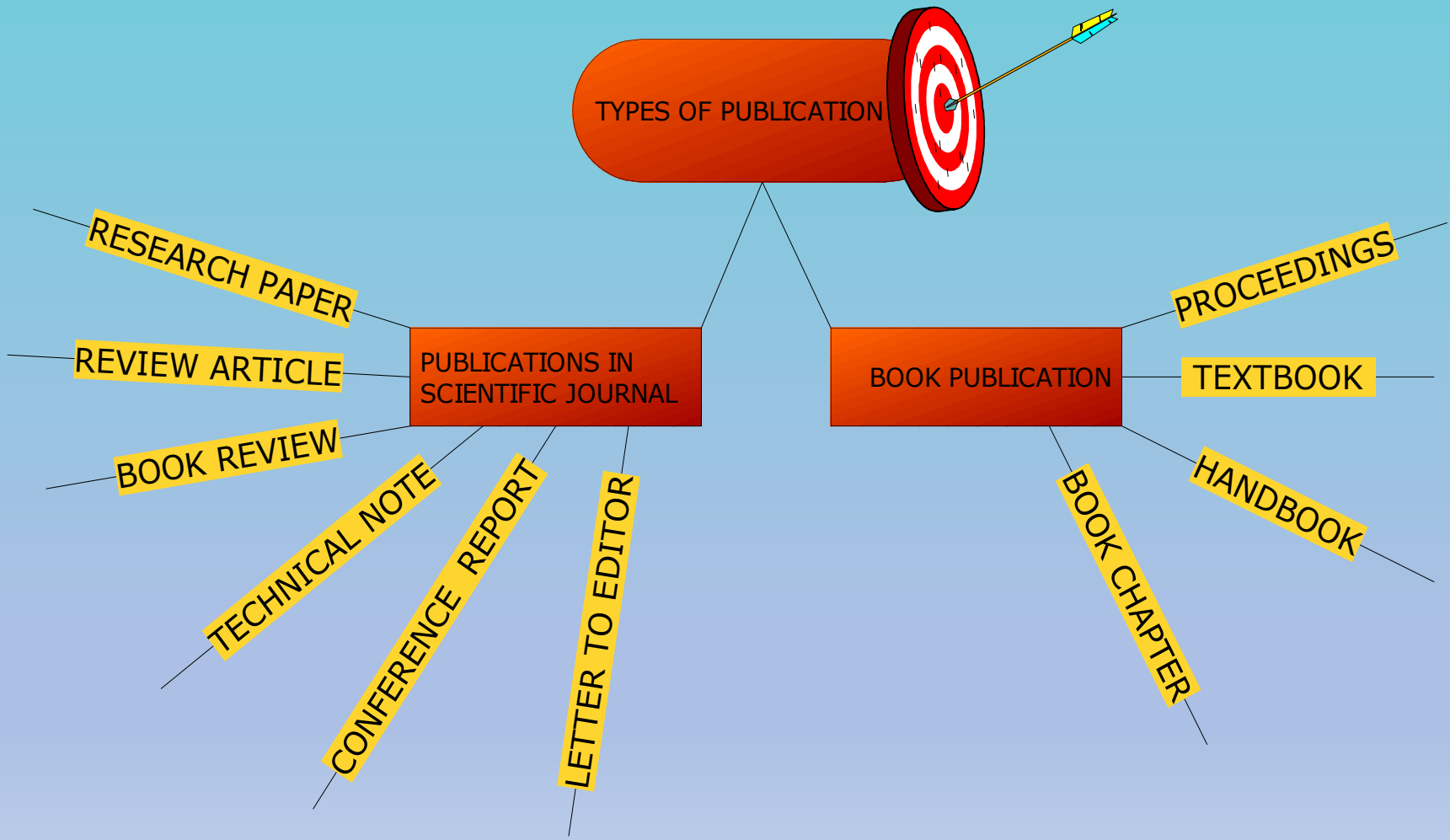
- ENCOURAGEMENT
- AUTONOMY OR FREEDOM
- RESIURCES
- CREATIVE LOCATION
- SECURITY AND SAFETY
- PRESSURE
- ORGANIZATION IMPEDIMENTS

- EDUCATION
- FAMILY
- CREATIVE THINKING SKILLS
- LIVING ENVIRONMENT
- VARIED BACKGROUND
- AGE
- PERSONALITY

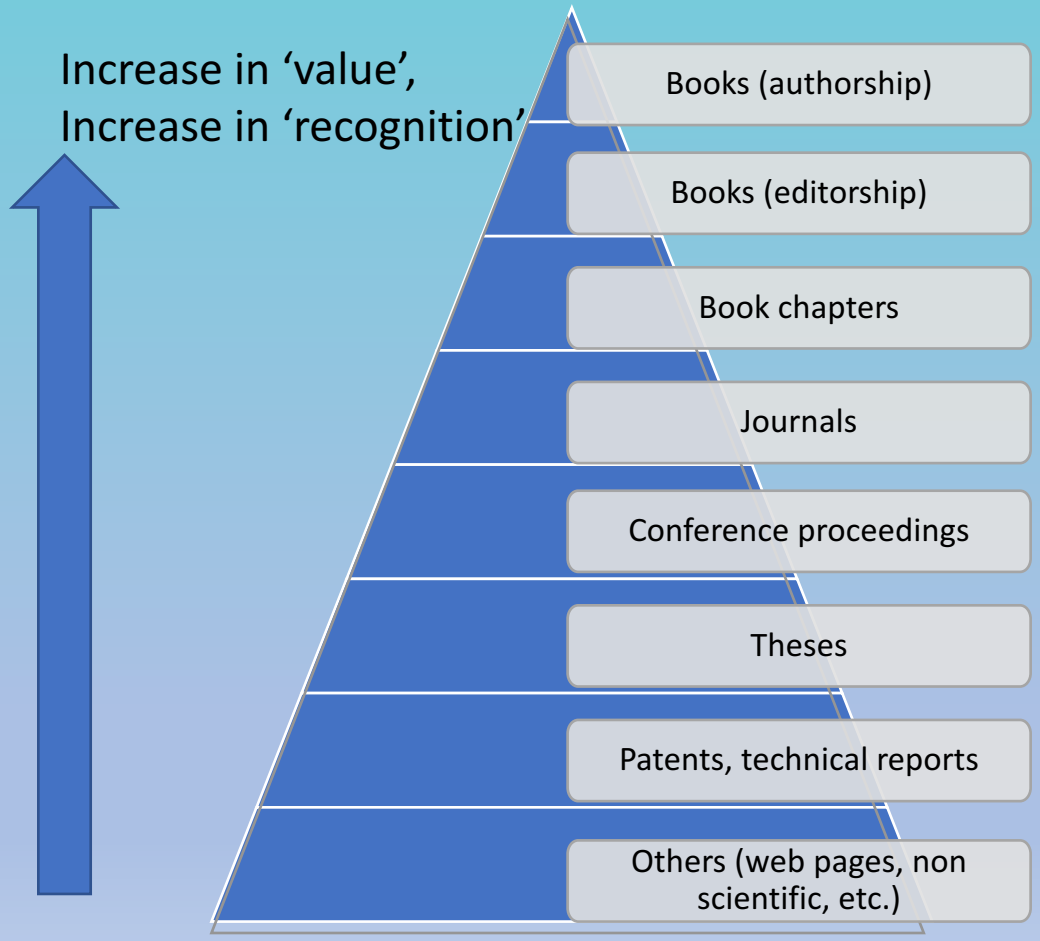


Types of scientific publications

TYPES OF PUBLICATION

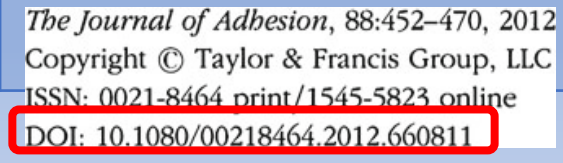


ASSESSMENT OF THE DIFFERENT FORMS OF SCIENTIFIC PUBLICATIONS



- In the industrial context, patents play a much more important role.
- In the academic context, however, there is an increasing focus and recognition of publications in international journals.
- The major goal of conferences is networking, discussions, feedback after presentations in front of international experts and to get an overview on recent trends in certain research fields.

Identification of Publications: ISBN, ISSN, and DOI

ABBREVIATION	FULL NAME AND MEANING	EXAMPLE
ISBN	International Standard Book Number. Unique number for books	
ISSN	International Standard Serial Number. Unique number for printed or electronic serial publications	
DOI	Digital Object Identifier. Character string for identification of objects of any type available in the internet	

4 Publishing Companies, Publishing Fees and Open Access Journal

PUBLISHING COMPANIES

COMPANY	WEBPAGE	NUMBER OF JOURNAL ONLINE
SPRINGER	http://link.springer.com	> 2700
ELSEVIER	http://www.sciencedirect.com	> 2500
WILEY-BLACKWELL	http://onlinelibrary.wiley.com	> 2100
TAYLOR & FRANCIS	http://www.tandfonline.com	> 1600
SAGE	http://online.sagepub.com	> 600

* Major publishing companies for scientific journals

COST OF JOURNAL PUBLISHING

Depending on the journal format, i.e. a paper journal or an electronic journal or both formats in parallel, the publishing costs comprises different items and can be generally distinguished in:

1. FIXED COSTS
2. VARIABLE COSTS

Continue..

FIXED COST

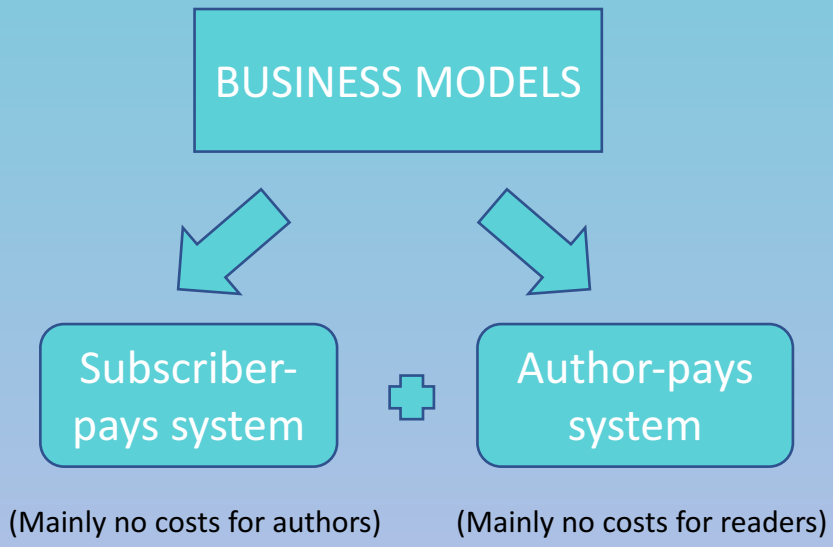
- Selection and review of articles, including rejected manuscripts;
- Web-based manuscript management and tracking system (licenses), including its maintenance and upgrading;
- Page and illustration preparation;
- Copy editing, rewriting, minor language corrections, and proofreading by professional editors; etc.

VARIABLE COSTS

- Printing and binding [only for paper journal];
- Cost of paper [only for paper journal];
- Distribution (including postage, packing, and shipping) [only for paper journal];
- Marketing (solicitin);
- Sales costs; etc.

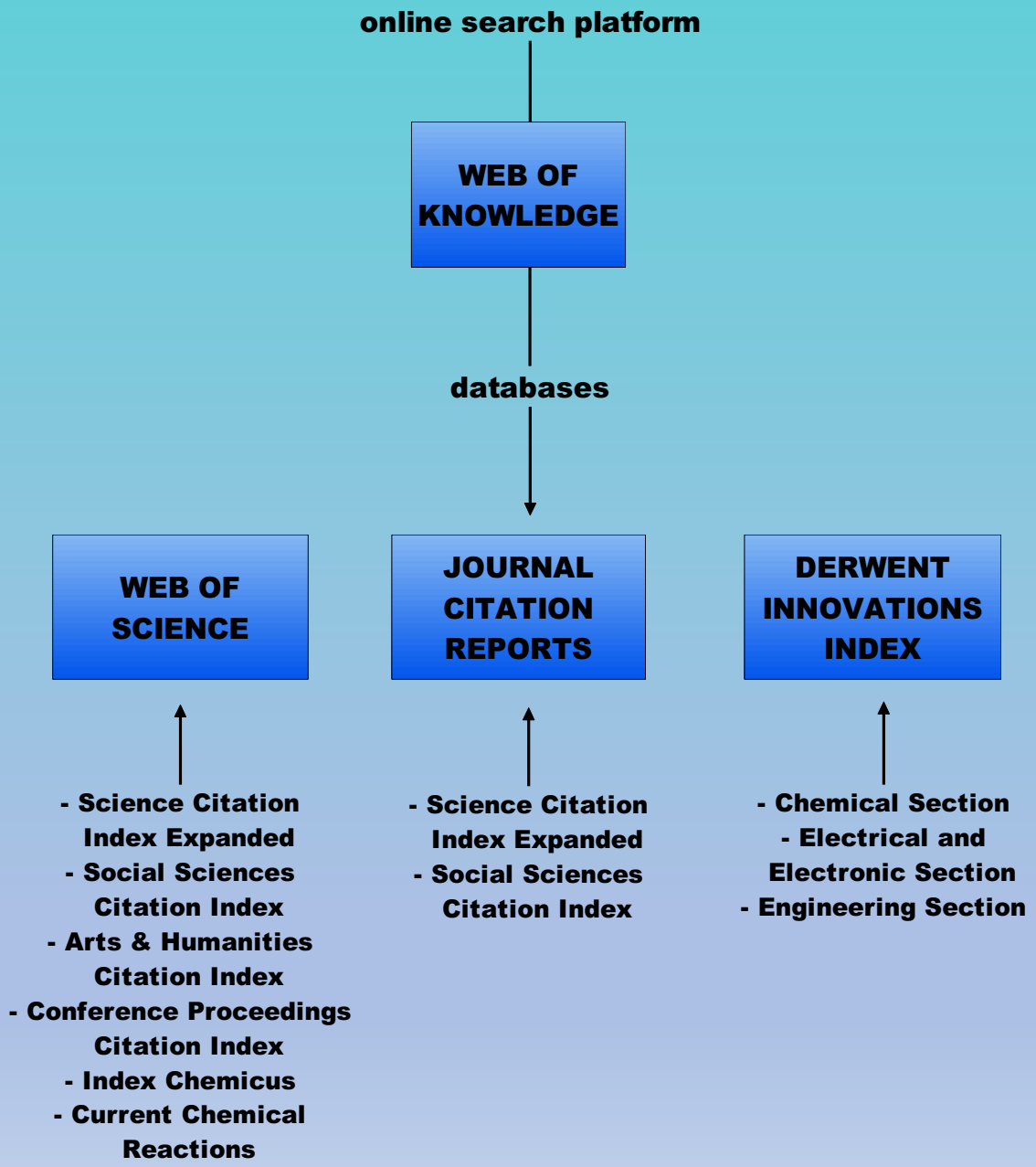
BEARING THE COSTS OF JOURNAL PUBLISHING: BUSINESS MODELS

- Subscriber-pays system where the entire costs are recovered by institutional subscriptions e.g. through university libraries. This model includes the transfer of copyright from the author to the publishing house
- Author-pays system where the entire publishing costs are recovered by submission and/or article processing fees. These fees must be covered by an author or his or her institution on the basis of a submitted and accepted article and not for an entire journal as in the case of the subscriber pays system.
- The significant difference of the author-pays system is that full access to journals is given to everybody without any further subscription or restrictions.



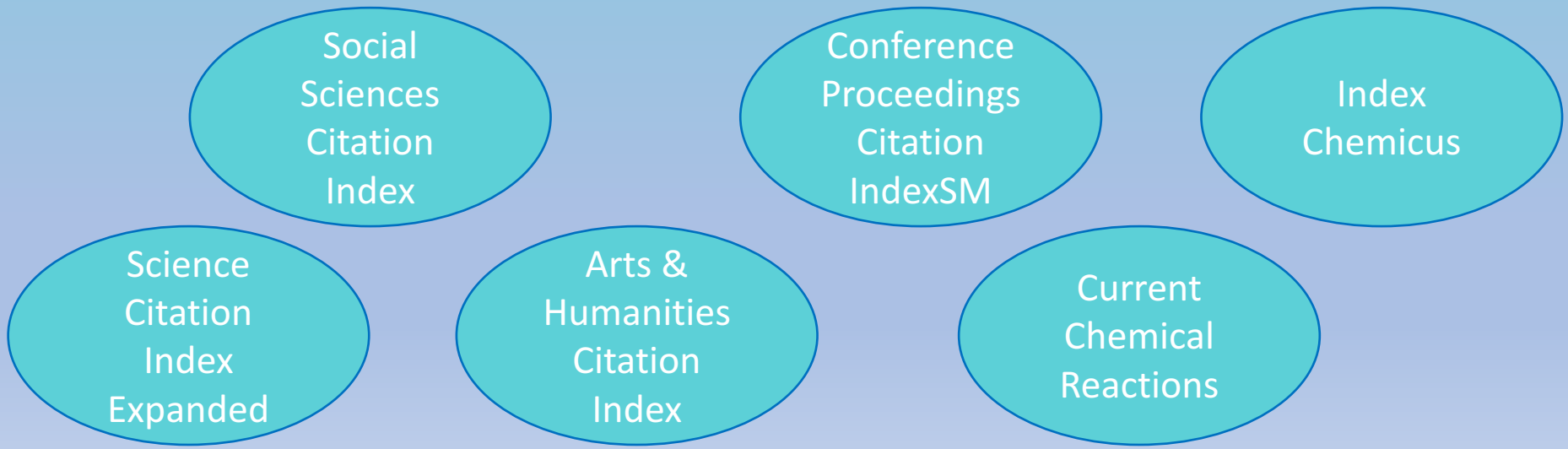
5 Abstract and Index Databases
(Web of Knowledge, Scopus, Google Scholar)

- The organizational structure of the search engine web of knowledge

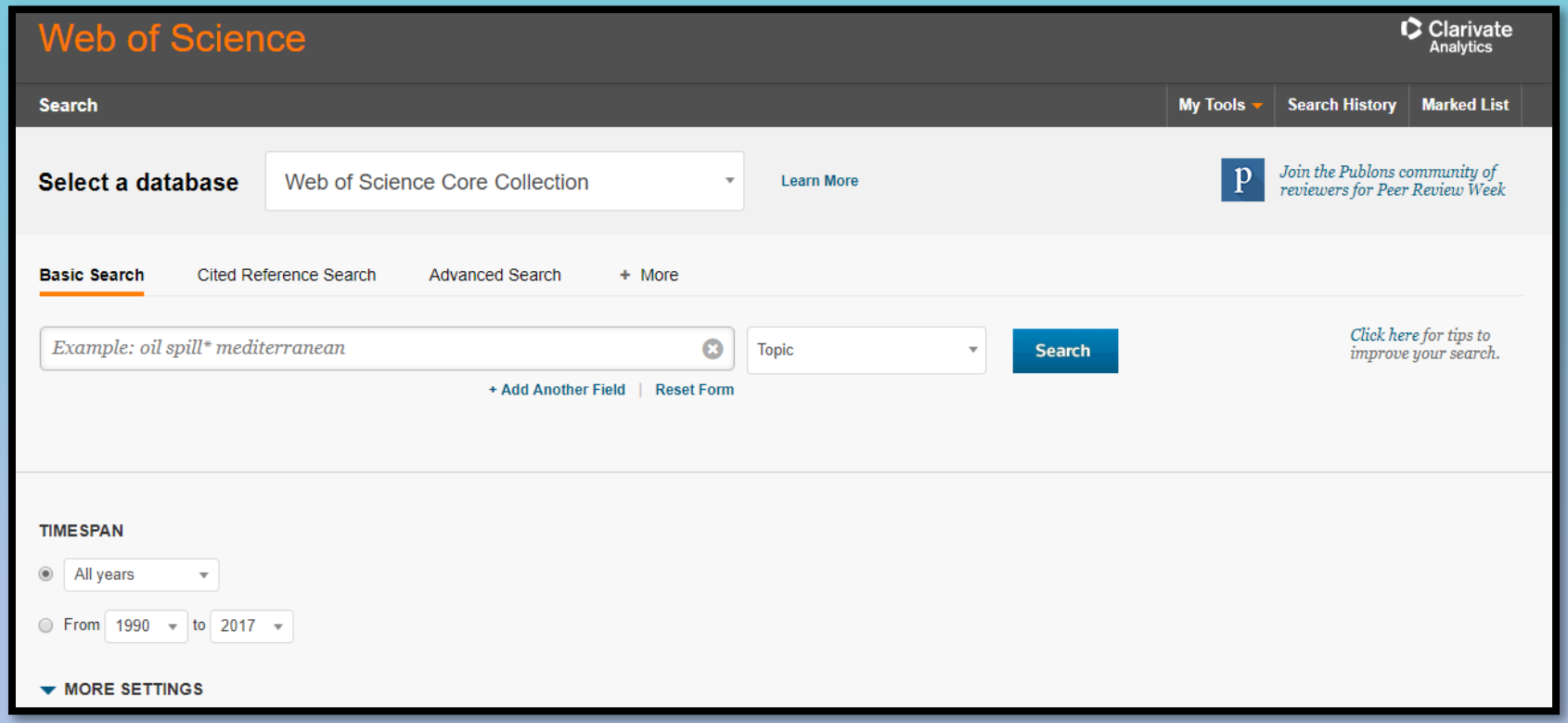


Web of Knowledge

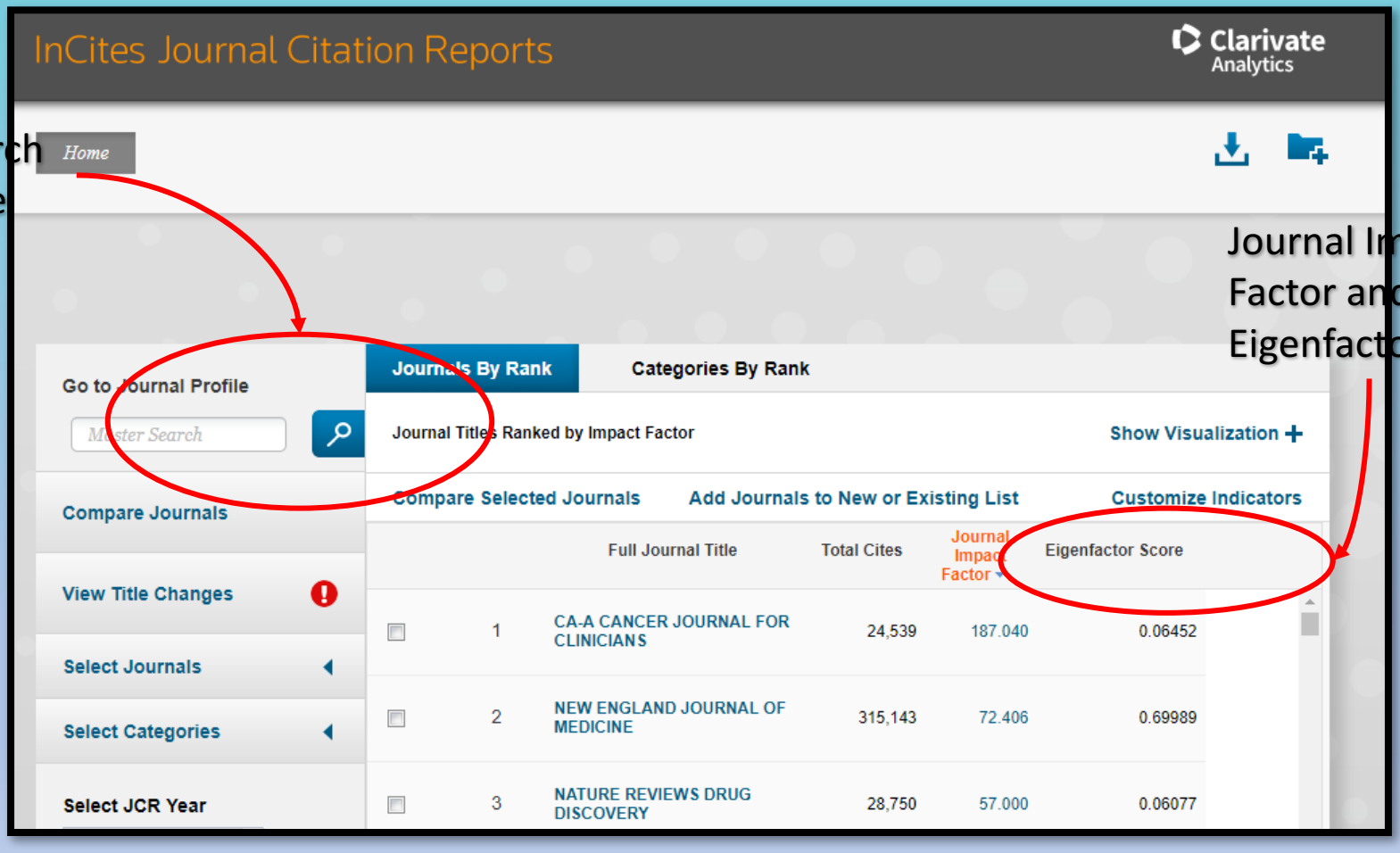
- Web of KnowledgeSM (WoK) is a comprehensive online research platform provided by Thomson Reuters and thus also known as 'Thomson Reuters Web of KnowledgeSM'
- The database Web of Science allows the access to **six different citation databases** and to search and analyse citations and bibliographical data from more than 13000 journals and over 150000 conference proceedings.



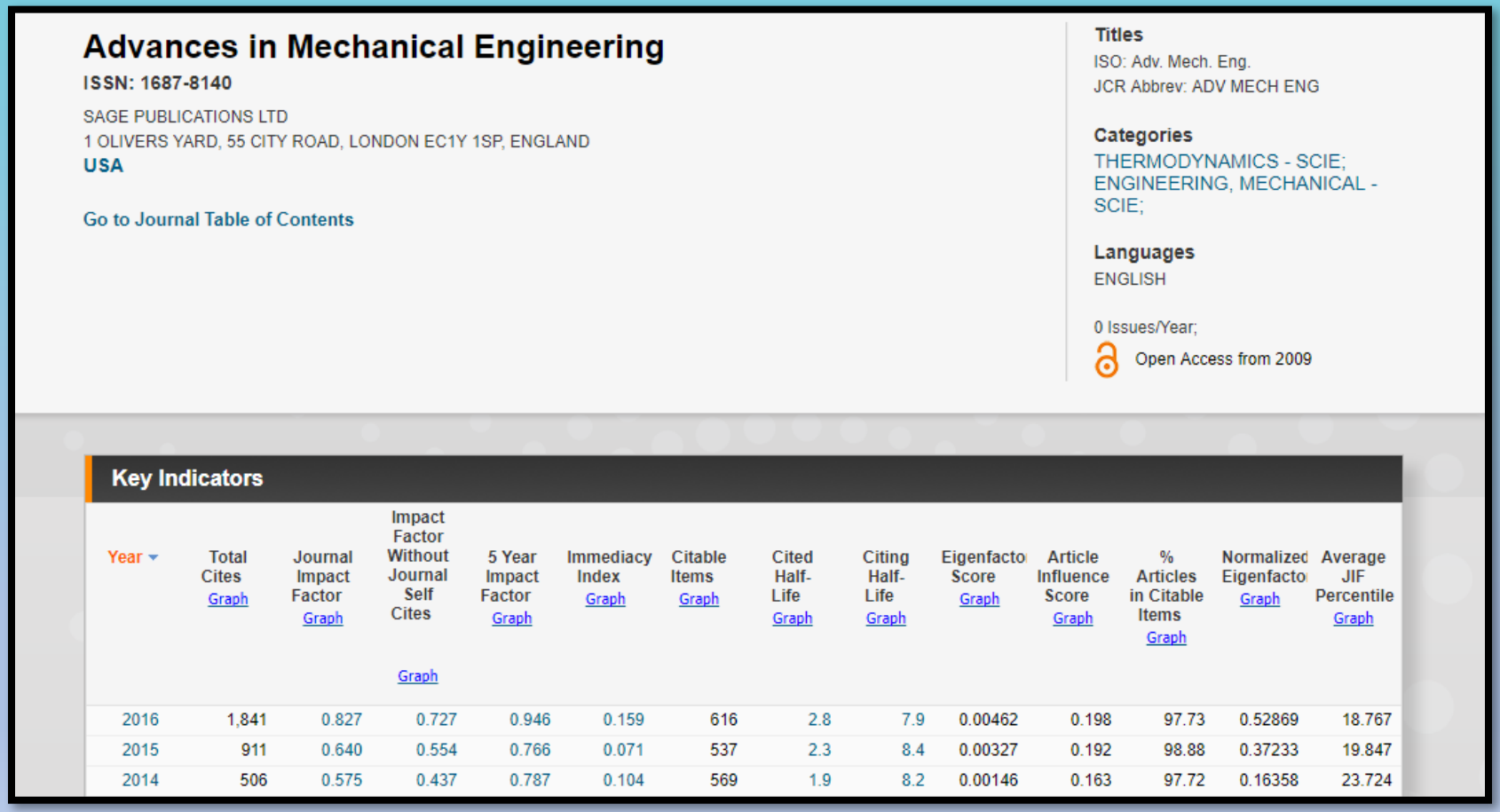
Interface to enter the search engine Web of Science



Starting page of the Incites Journal Citations Reports



Example result of a research in the Journal Citations Reports



Advances in Mechanical Engineering

ISSN: 1687-8140

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USA

Go to Journal Table of Contents

Titles
ISO: Adv. Mech. Eng.
JCR Abbrev: ADV MECH ENG

Categories
THERMODYNAMICS - SCIE;
ENGINEERING, MECHANICAL - SCIE;

Languages
ENGLISH

0 Issues/Year;
Open Access from 2009

Key Indicators

Year	Total Cites Graph	Journal Impact Factor Graph	Impact Factor Without Journal Self Cites Graph	5 Year Impact Factor Graph	Immediacy Index Graph	Citable Items Graph	Cited Half-Life Graph	Citing Half-Life Graph	Eigenfacto Score Graph	Article Influence Score Graph	% Articles in Citable Items Graph	Normalized Eigenfacto Graph	Average JIF Percentile Graph
2016	1,841	0.827	0.727	0.946	0.159	616	2.8	7.9	0.00462	0.198	97.73	0.52869	18.767
2015	911	0.640	0.554	0.766	0.071	537	2.3	8.4	0.00327	0.192	98.88	0.37233	19.847
2014	506	0.575	0.437	0.787	0.104	569	1.9	8.2	0.00146	0.163	97.72	0.16358	23.724

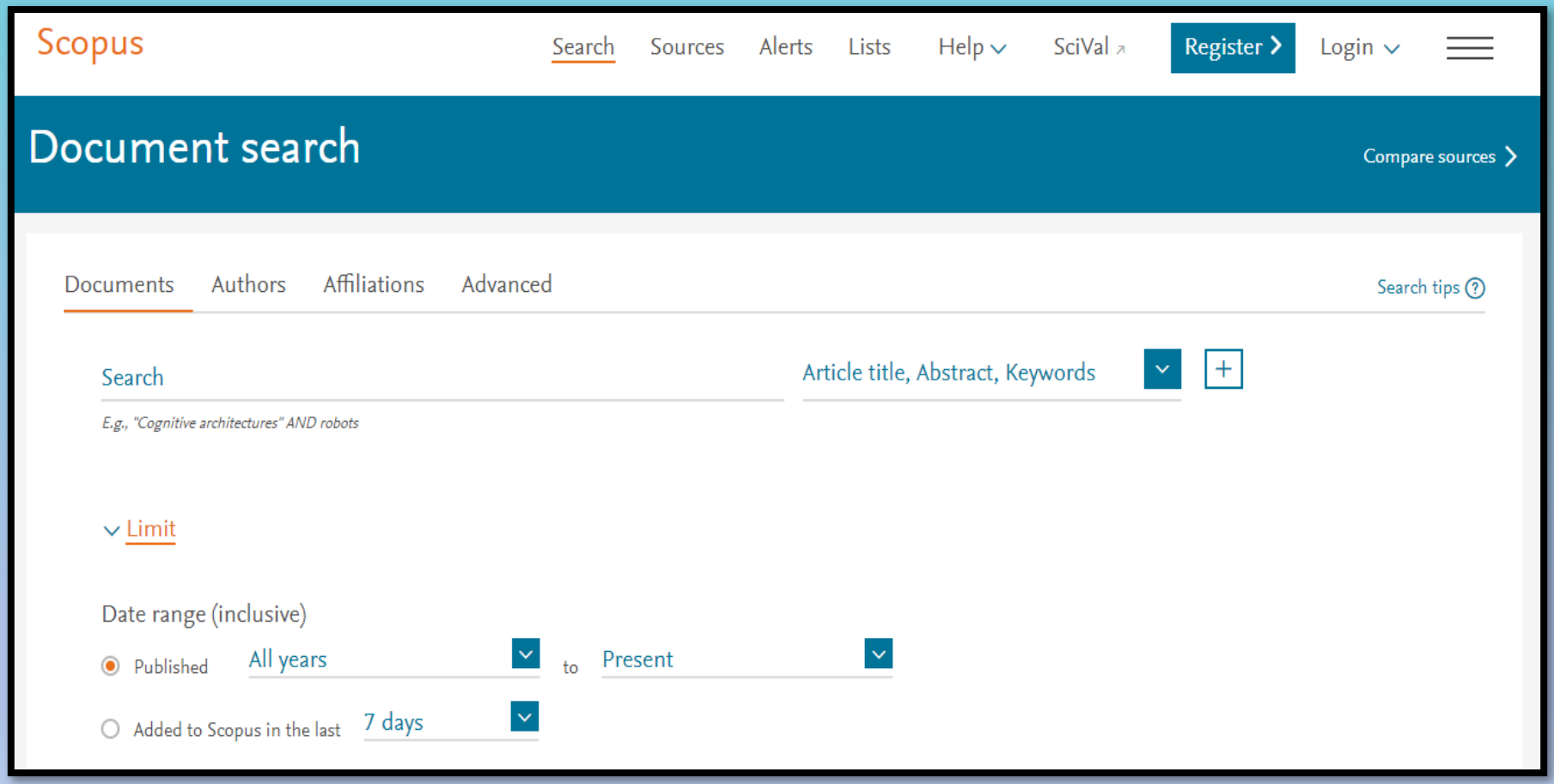
Scopus

SciVerse Scopus was launched in 2004 by Elsevier,9 one of the leading STM publishers. The abstract and index database was definitely designed to break the monopoly of the Web of Knowledge

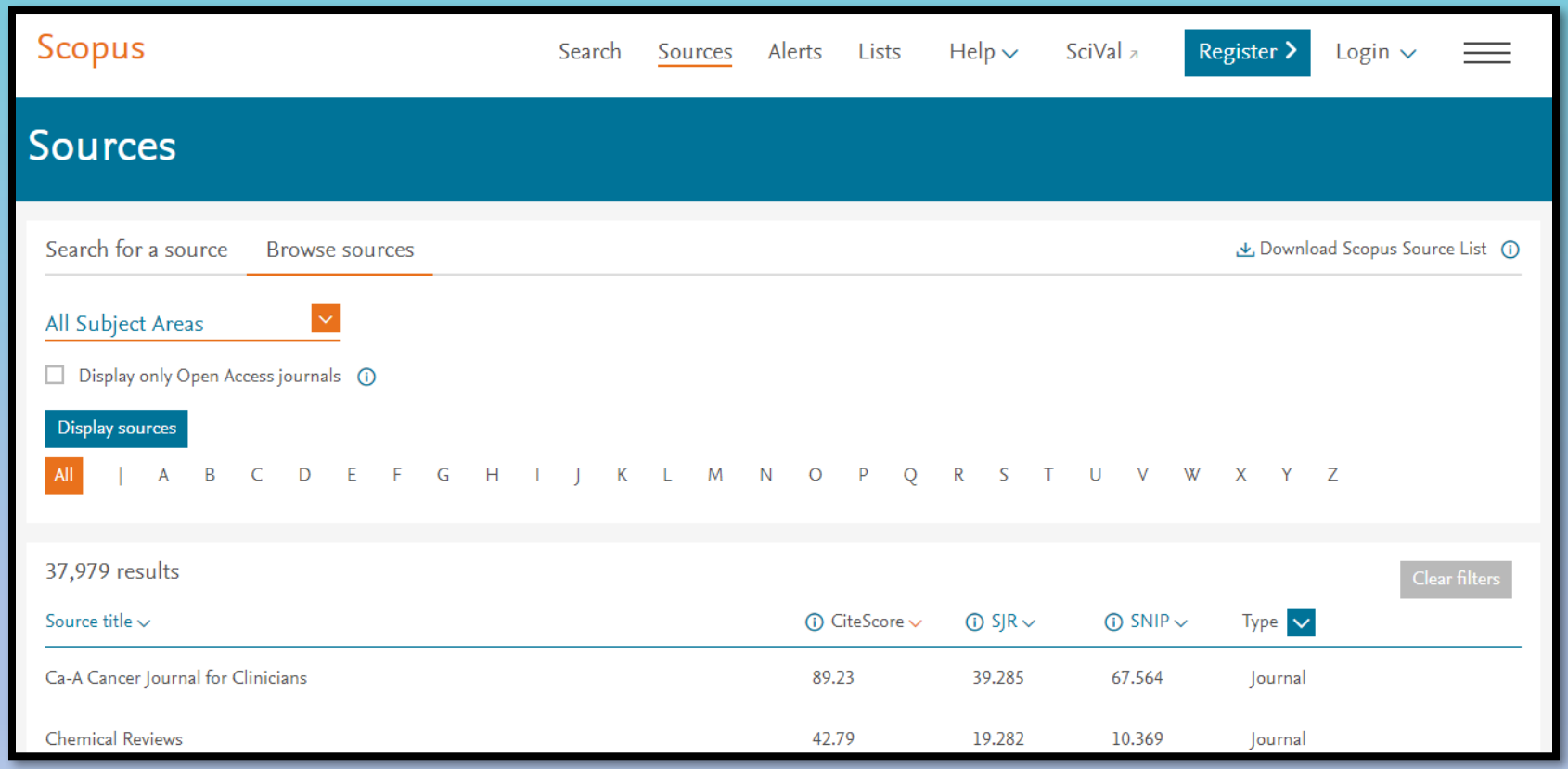
The database comprises the following items [21–23]:

- **18500 peer-reviewed journals.**
- **400 trade publications**
- **340 book series: A serial publication**
- **4.9 million conference papers from proceedings and journals: Special issues of regular journals or dedicated conference books (only full-text papers).**
- **24.4 million patent records from five patent offices.**
- **‘Articles-in-Press’ from over 3850 journals.**

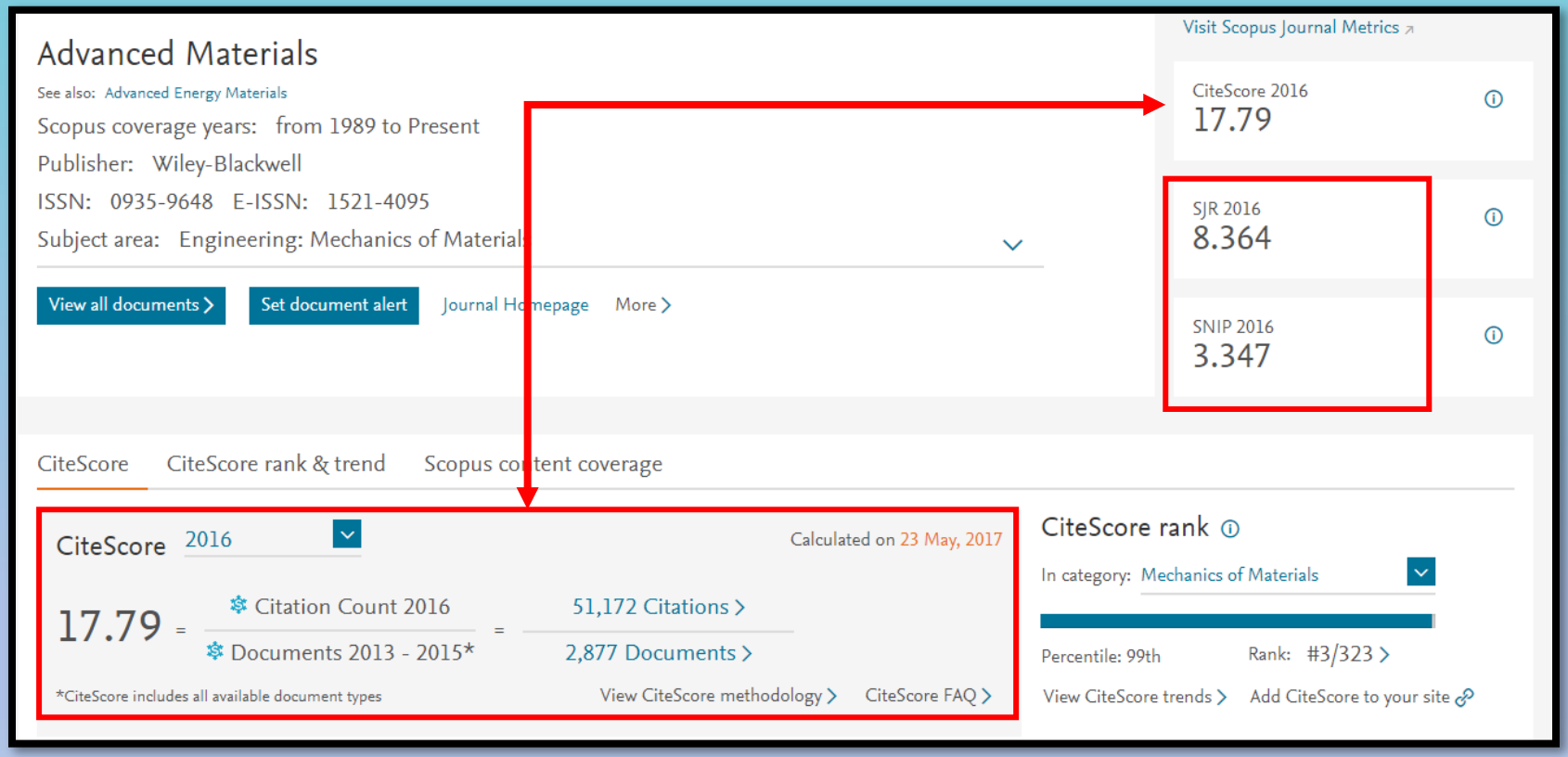
Starting page of the scientific database Scopus



Sources function in the scientific database Scopus



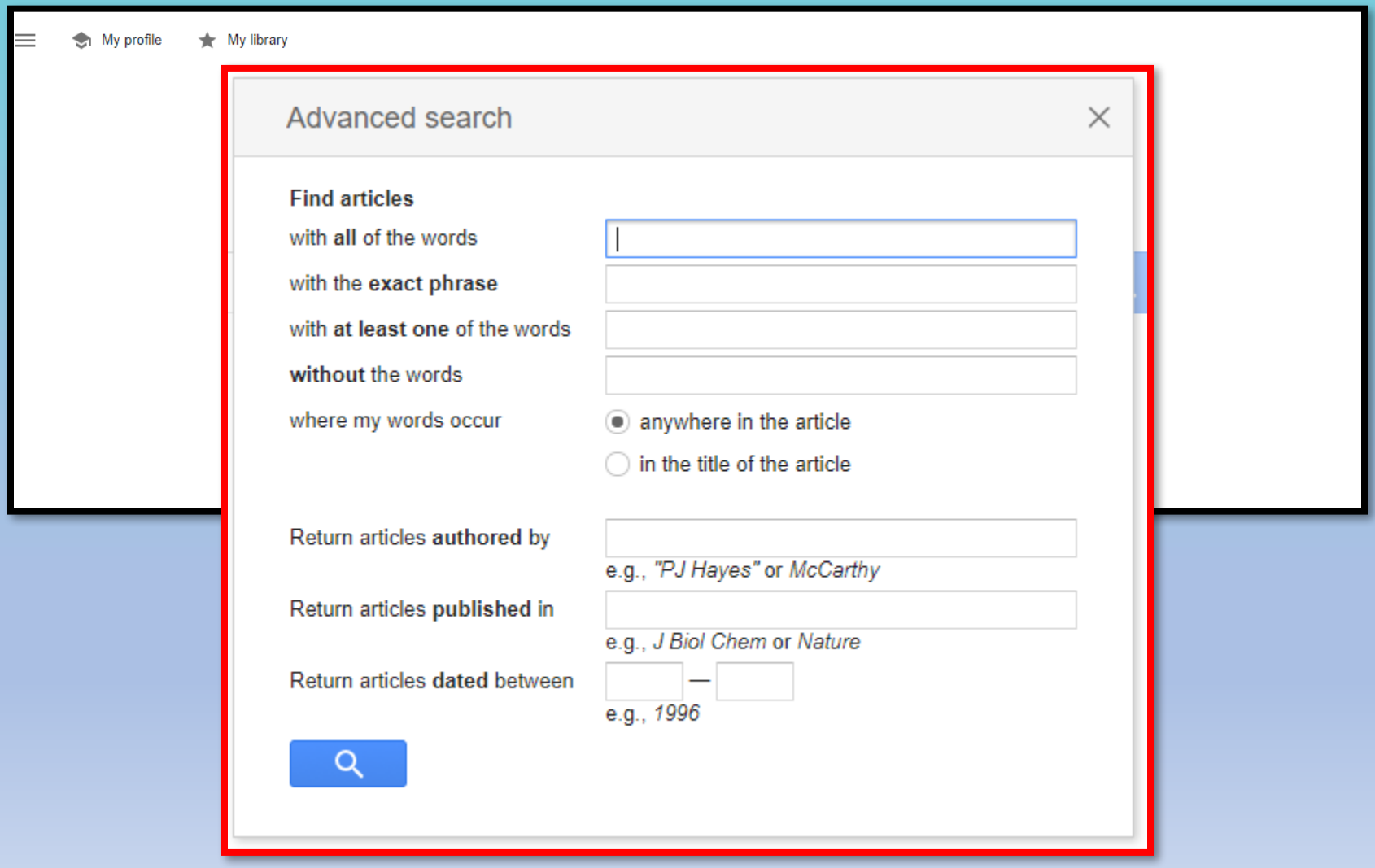
Example of Search result in the scientific database Scopus



Google Scholar

- Google Scholar was introduced in November 2004 and the concept is similar to
- the classical Google web search engine. This means, Google Scholar is not itself
- an abstract and index database but searches for electronic documents from many
- different sources such as academic publishers, professional societies, preprint/reprint
- repositories, universities, and further scholarly organizations

Starting page of the scientific database Google Scholar



Example of a Google Scholar profile

Google Scholar

Ardiyansyah Syahrom

+ FOLLOW

GET MY OWN PROFILE

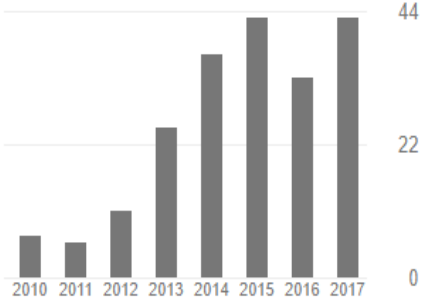
Senior Lecturer of Mechanical Engineering, Universiti Teknologi Malaysia
Verified email at fkm.utm.my - Homepage

Cancellous Bone Trabecular Bone Permeability Porous Structure Biomechanics

TITLE	CITED BY	YEAR
Introduction SC Gad, CB Spainhour Contract Research and Development Organizations, 1-26	102 *	2011
Finite element analysis of idealised unit cell cancellous structure based on morphological indices of cancellous bone MRA Kadir, A Syahrom, A Öchsner Medical & biological engineering & computing 48 (5), 497-505	32	2010
Permeability studies of artificial and natural cancellous bone structures A Syahrom, MRA Kadir, J Abdullah, A Öchsner Medical engineering & physics 35 (6), 792-799	26	2013
Anthropometric measurements of the human distal femur: a study of the adult Malay population F Hussain, MR Abdul Kadir, AH Zulkifly, A Sa'at, AA Aziz, MG Hossain, ... BioMed research international 2013	18	2013

Cited by	All	Since 2012
Citations	264	196
h-index	7	6
i10-index	5	5

VIEW ALL



Co-authors

Comparison of the Databases

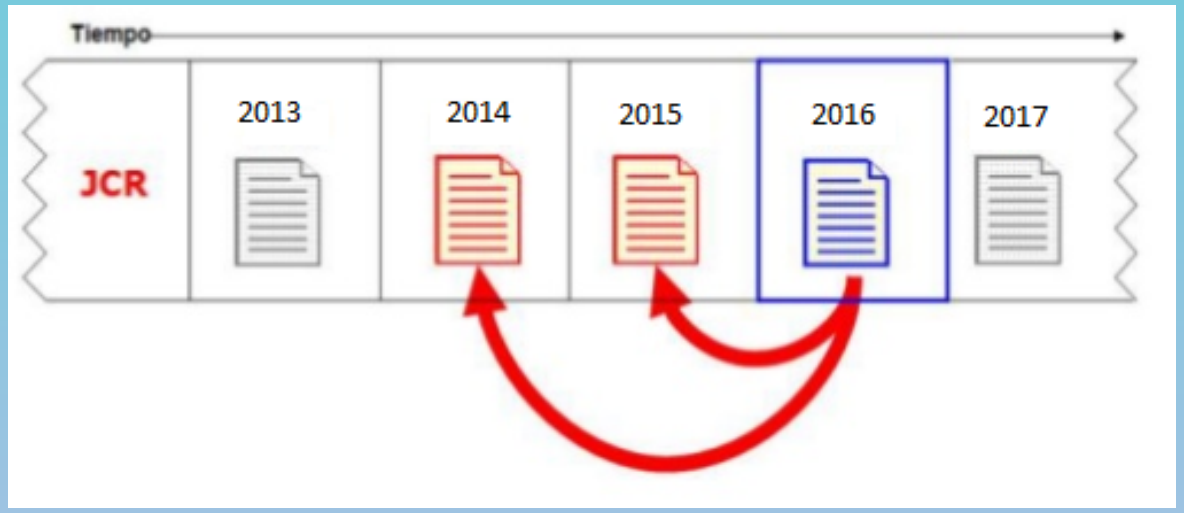
- The comparison of Web of Knowledge, Scopus and Google Scholar is a quite difficult task since information is not equally provided.
- Furthermore, all the mentioned databases are permanently expanded and upgraded.
- Web of Science and Scopus offer quite similar functionalities and coverage and maintain their real own databases.
- On the other hand, Google Scholar is a free search service which covers practically the entire world wide web and results are obtained through web robots.

6 Statistical Evaluation of Bibliographical Data: Evaluation of Journals, Scientists, and Institutions

Impact factor

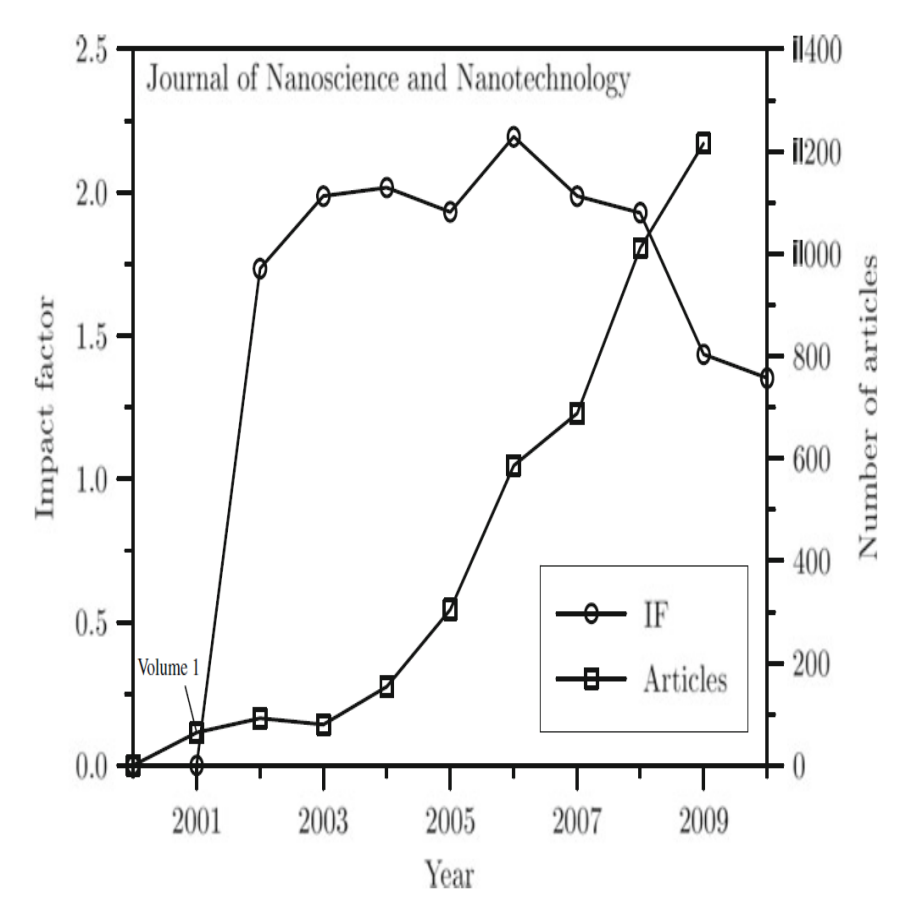
- The idea and design of the impact factor (IF) goes back to the work of Eugene Garfield with Irving H. Sher in order to analyse and identify influential journals.
- The usual citation count model for the determination of the importance of a journal by determining the absolute number of citations to it was criticized and a normalized measure proposed.

How to calculate the impact factor?



$$\text{Impact factor 2016} = \frac{\text{Citation 2014 + 2015}}{\text{Total number of Publication 2014 + 2015}}$$

What does it means?



- The impact factor for 2009 is calculated by dividing the 2438 citations by 1699 items as *IF* = 1.435.
- This impact factor of 1.435 means that, *on average*, the articles published one or two year ago have been cited 1.435 times

Commonly cited strengths and criticisms of the impact factor (IF)

Strengths

- Provides a global view of internationally important journals within the scope of the vetted corpus
- Calculation is relatively easy to understand
- Does not privilege journals which publish since a long time or which publish many papers per volume
- Analyzes the recent performance of a journal (citations related to the previous two years)
- Relating the citations to a journal title and not to individual papers avoids many mistakes in references related to wrong authors or page numbers
- Easy to analyze changes over longer time periods since the IF is evaluated for many years in the same way
- Rankings by impact factor correlate with the standing of journals
- IF is somehow accepted in the community since it is applied for many years
- IF is available for a considerable number of journals

Criticism

- The calculation instruction of the IF does not consider enough factors to realistically measure the influence of journals
- Confusion and concern about the denominator of the IF equation (total number of source items published)
- IF can be increased by citations to editorials or letters which are not considered in the denominator
- Only a smaller number of papers really contribute to the actual IF of a journal. Thus, the IF is misleading concerning central tendency
- Review journals have an advantage over non-review journals
- IF differs from discipline to discipline and makes cross-discipline comparisons difficult or useless
- The two-year citation period might be too short for some disciplines to capture the real influence of a paper
- The journal title is only captured by a 20-character field. This makes it sometimes difficult to record the correct journal name
- Multidisciplinary journals with topics in different fields are hard to compare based on the IF
- Definition of fields in the JCR are subjective and fuzzy. In addition, no account for subfield variations
- IF is useless for some fields where books are a main instrument of communication (e.g. humanities)
- No IF for journals which are not indexed by Thomson Reuters
- Thomson Reuters' journal coverage is biased against certain nations and English-language journals. Nationally influential journals are not rewarded

Hirsch-Index or *h*-Index

- The *h*-index or Hirsch-index was proposed by Jorge E. Hirsch in 2005 to characterize the scientific output of a researcher.
- The idea was to combine in a single number the publication record and the citation record of a scientist
- A scientist has an *h*-index of *h* if he or she has at least *h* papers with *h* citations each. In the case of an example, a *h*-index of 10 means that a scientist has at least 10 papers and each of these 10 papers received at least 10 citations.

Commonly cited strengths and criticisms of the *h*-index

Strengths

- Combines publication activity and citation influence
- Based on data which is really related to a scientist (not a statistical average)
- Robust and relative incentive to missing records for highly cited papers

Criticisms

- Emphasis on the top of the citation distribution while ignoring the bottom
- Affected by different citation behavior in different disciplines
- Highly biased towards 'older' scientists with long careers
- Distinct citation distributions can generate the same *h*-index while it is questionable whether they reflect the same performance of the scientists
- A lower *h*-index does not necessarily mean a lower impact of the scientist

Other Bibliometric Measures

- **5-Year Journal Impact Factor**
- **Journal Immediacy Index**
- **Journal Cited Half-Life**
- **Eigenfactor® Score**
- **Article Influence® Score**
- **SCImago Journal Rank**
- **Source Normalized Impact per Paper**
- **i10-Index**

Evaluation of Research and Scientists

Evaluation of research teams, faculties and entire universities or institutions is nowadays performed by many national agencies.

As major purpose of such national evaluations, the following intentions are commonly given:

- Basis for selective research funding allocation based on evaluated performance.
- Accountability for public investment in research and evidence of public benefit.
- Provides information to customers: students, industry, business and government.
- Identifies areas of excellence across the full spectrum of research performance.
- Identifies emerging research areas and areas which need stimulation.
- Provides national and international benchmarking information.

To evaluate research teams, universities or institutions, the following research assessment methodologies are widely spread:

- Peer-review,
- bibliometric approach (evaluative bibliometrics),
- informed peer-review.

Commonly cited strengths and criticisms of the peer-review approach for institutions

Strengths

- Really considers the research and its quality

Criticisms

- Difficulty to identify appropriate scientists (specialized nature of research) and to get their acceptance (too many duties)
- Limitation to a subset of the entire research output compromises the general validity
- Problem and inefficiency of selecting the subset of the entire research output: how many publications per scientist, how many years to consider, how many percent of the total output, what to submit?
- Impaired objectivity (fair judgement): positive (bias towards already successful researchers; similar approaches and ideas; 'good-old-boy' networks) or negative (high-risk research; competitors; unknown scientists)
- Conflict of interest
- Lacks universal consistency (difficult to compare on a global level): criteria are different from panel to panel
- Very high direct costs and very time-consuming
- No consideration of productivity (quantity of research output)

Commonly cited strengths and criticisms of the bibliometric approach for institutions

Strengths

- Allows evaluation of all research output (robustness). Not just a subset as in the case of peer-review
- Avoids distortion from internal selection of journal papers and research reports (validity)
- Permits institutions to allocate resources in an efficient way if single scientists are evaluated (functionality)
- Cost and time efficient
- Allows also to consider the quantity
- The count can be automatized to a certain extend
- Evaluation is neutral and allows comparative (national and international) assessment

Criticisms

- Bibliometric indicators (e.g. citations) can only be applied to journal publications and conference proceedings, not to, for example, patents
- Not all journals (proceedings, books) are indexed in WoS or Scopus
- Bibliometric indicators can be affected by certain forms of manipulation
- Citations do not represent quality. They represent notions of use, reception, utility, influence etc.
- Problem with citation count: negative citations, 'over-citation' of review articles, self-citations
- Citation analysis is a less reliable indicator for quality for more recent works ('delayed recognition')

International University Rankings

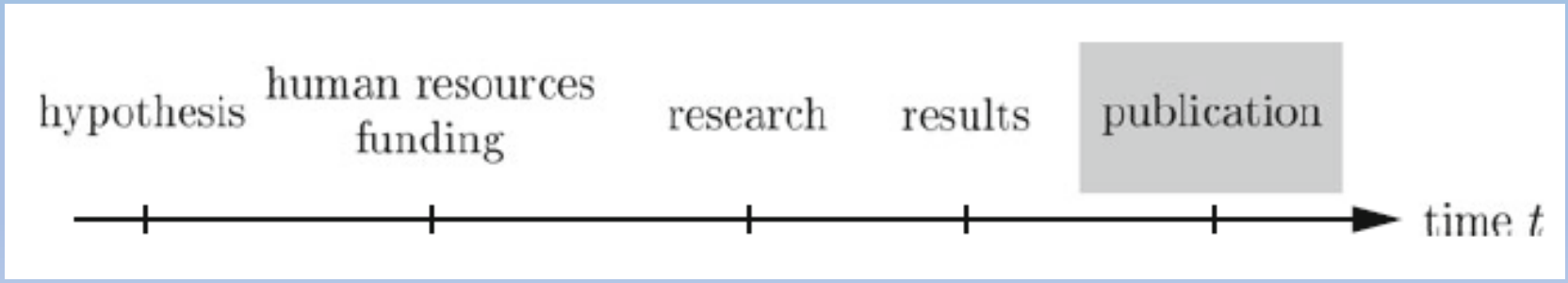
- There are many university rankings nowadays available, either on a national or international level.
- Three important international university rankings are prepared by the Higher Times Education (UK), by QS Quacquarelli Symonds (UK) and by the Shanghai Ranking Consultancy.
- The purpose and intention of these international rankings is compared to the national rankings slightly different and should fulfil according to the conducting institutions the following purposes:

1. Decision guidance for undergraduate and postgraduate students to select degree courses (also info on where to study abroad).
2. Decision guidance for academics to take career decisions.
3. Provide information for research teams to identify new collaborative partners.
4. Provide information for university managers to benchmark their performance and set strategic priorities.
5. A tool for governments to set national policy (facilitating reformand setting new initiatives).

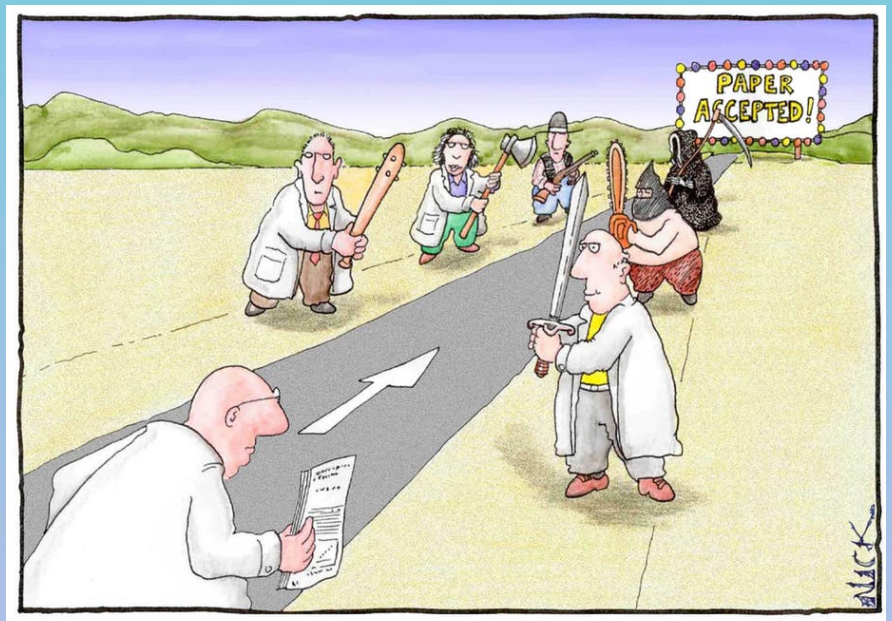
7 Publishing in Scientific Journals

TIME FRAME OF PUBLICATION

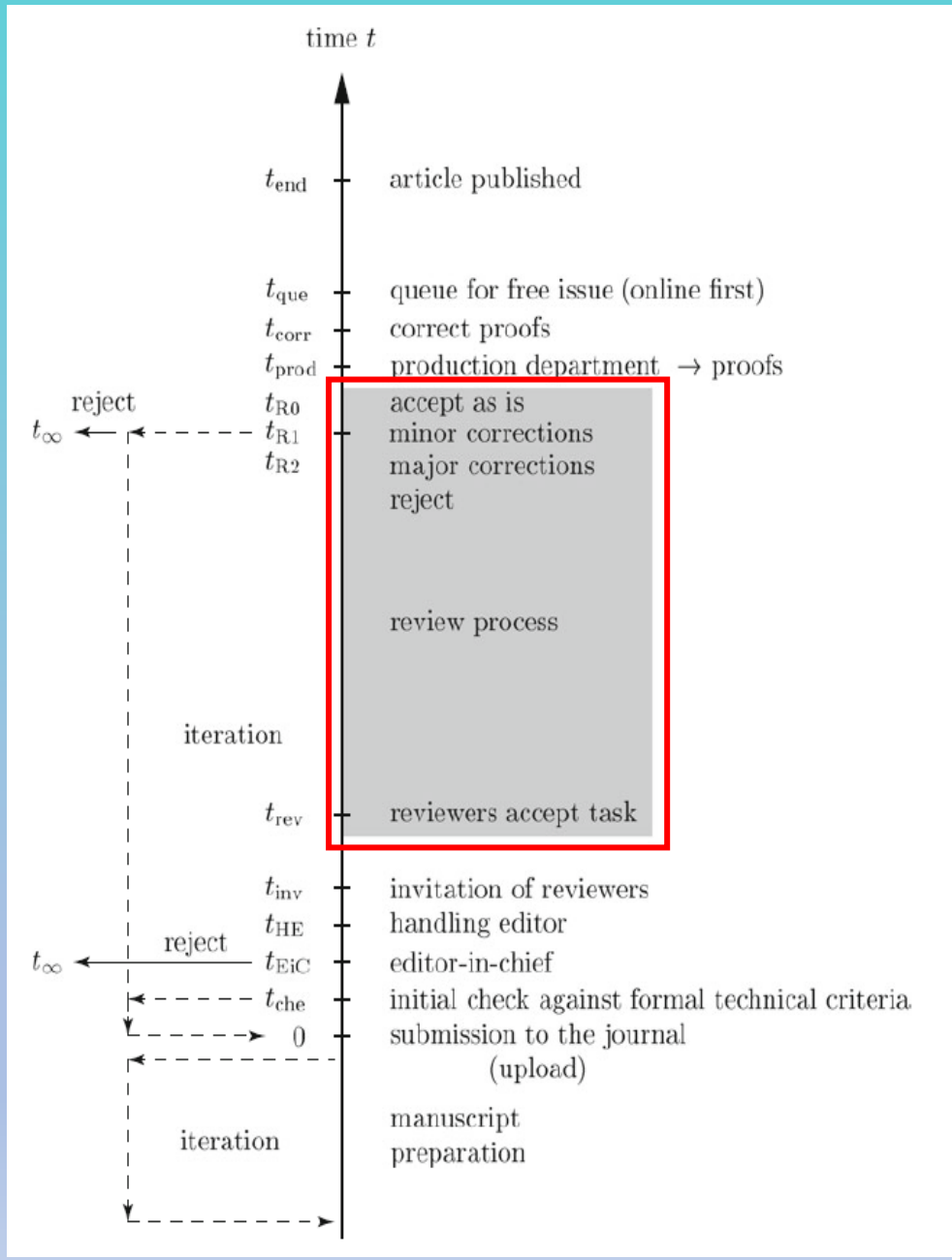
- Just the manuscript preparation is an iterative process, especially if several authors are involved.
- The submission of the manuscript can be nowadays mainly handled through online submission systems compared to the old way of submissions, which required submitting several hard copies by regular mail.
- The expected time frame of a journal publication are shown in the next slide.



The expected time frame of a journal publication

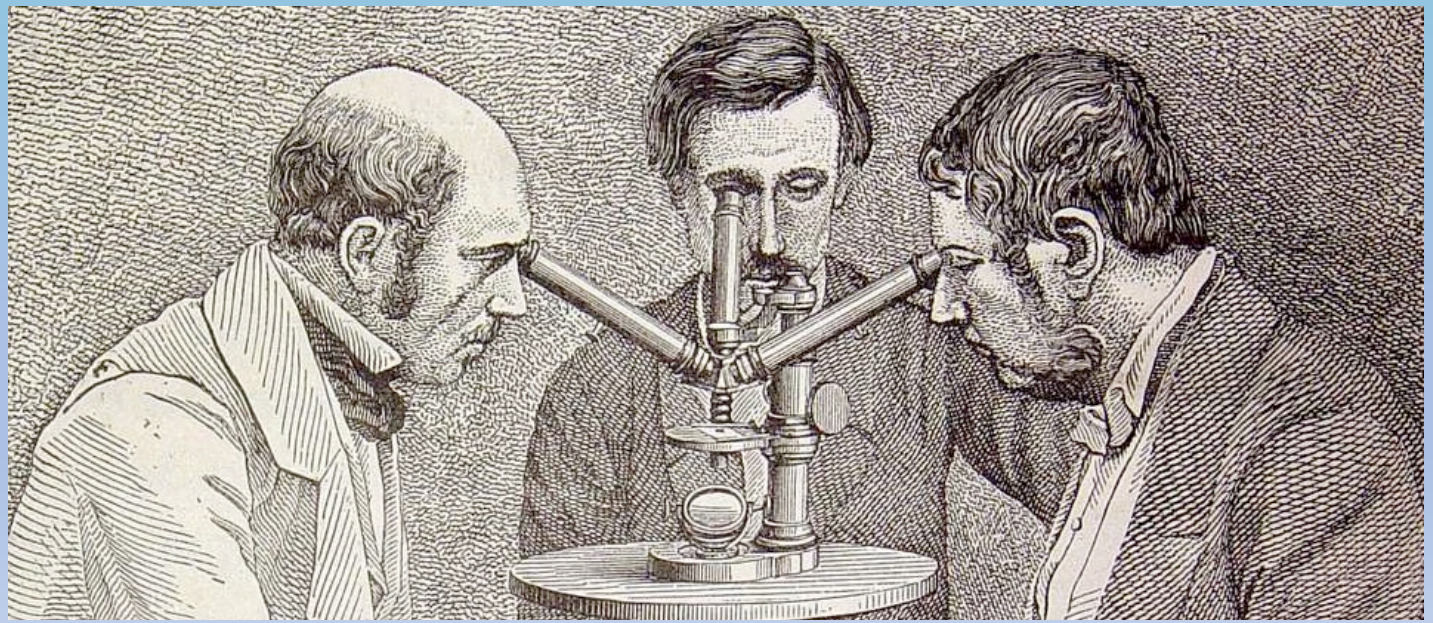


Most scientists regarded the new streamlined peer-review process as "quite an improvement."



Peer-Review Approaches

- The review process aims at ensuring the correctness of the proposed manuscript, or in other words to avoid that wrong and incomplete ideas get in scientific journals.
- In addition to this scientific endorsement, the review process must be seen as an iterative process to improve and complete the submitted manuscript.



- The reviewer stays unknown for the author but the reviewer knows the identity of the author.
- protect the reviewer from any type of reprisals from the author in case of criticism or rejection.

- SINGLE-BLIND

- DOUBLE-BLIND

- the identities of both, i.e. authors and reviewers, are hidden.
- This approach tries to avoid the reviewer bias where decisions, for example, are done in favor of known scientists, scientists from prominent institutions (affiliation bias), US-based scientists (nationality bias), and male scientists (gender bias)

The Basic Structure of a Manuscript

- ***Manuscript Title***
- ***Authors***
- ***Abstract***
- ***Keywords***
- ***Introduction***
- ***Methodology***
- ***Results and Discussion***
- ***Literature Section***

Tittle

Keywords

Authors

Abstract

Materials and Design 122 (2017) 268–279

Contents lists available at ScienceDirect

Materials and Design

journal homepage: www.elsevier.com/locate/matdes

The influence of flow rates on the dynamic degradation behaviour of porous magnesium under a simulated environment of human cancellous bone

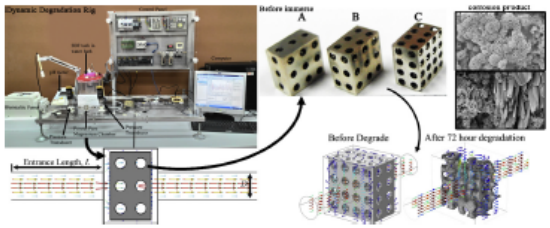
Amir Putra Md Saad [a], Rabiatul Adibah Abdul Rahim [a], Muhamad Noor Harun [a,b], Hasan Basri [c], Jaafar Abdullah [d], Mohammed Rafiq Abdul Kadir [e], Ardiyansyah Syahrom [a,b,*]

[a] Faculty of Mechanical Engineering, Universiti Teknologi Malaysia, 81310 Skudai, Johor, Malaysia
[b] Sports Innovation and Technology Centre (SITC), Institute of Human Centred and Engineering (IHCE), UniversitiTeknologi Malaysia, 81310 Skudai, Johor, Malaysia
[c] Department of Mechanical Engineering, Faculty of Engineering, Universitas Sriwijaya, Palembang, Indonesia
[d] Centre for Computed Tomography and Industrial Imaging, Malaysia Nuclear Agency, Bangi, Malaysia
[e] Medical Devices and Technology Group (MediTeg), Faculty of Bioscience and Medical Engineering, Universiti Teknologi Malaysia, Johor, Malaysia

HIGHLIGHTS

- The mechanical loading from physiological activity induced different fluid flow of bone marrow due to pressure differentials.
- The dynamic immersion tests were performed with three different flow rates of simulated body fluid.
- Weight loss and mechanical properties of the porous Magnesium significantly degraded with 68% and 95%, respectively.

GRAPHICAL ABSTRACT



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Physiological activities
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ABSTRACT

This study analyses the effect of different flow rates on the degradation behaviour of porous magnesium for bone scaffold applications. A simulated boundary of bone marrow movement induced by various physiological activities was considered with a variation in flow rate in the experimental process, also known as a dynamic immersion test. Three types of porous magnesium (30%, 41%, and 55%) were immersed in simulated body fluid (SBF) for 24, 48, and 72 h. The results show that the relative weight loss and mechanical properties of the porous magnesium significantly degraded by 68% and 95%, respectively, at increasing flow rates together with an increase in immersion period and porosity.

1. Introduction

The movement of bone marrow plays a significant role in the determination of bone quality and the bone healing process, in which the interaction between bone marrow movements and the cancellous bone

* Corresponding author at: Sport Innovation and Technology Centre (SITC), Institute of Human Centered Engineering (IHCE), Universiti Teknologi Malaysia, Johor Baharu, Malaysia.
E-mail address: ardi@utm.my (A. Syahrom).

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Submission of a Manuscript

- ***Text Formatting and Illustrations***
- ***Cover Letter***
- ***Recommending Reviewers***

Text Formatting and Illustrations

Part	Formats
Text formatting	• Avoid long sentences and repetitions. • Simple language is easier to understand. • Individual words should be emphasized by using italic style. Do not underline these words, neither write in bold face. • Latin terms, e.g. 'in situ', 'a priori' or 'a posteriori', should not be italicized. • Be consistent with either British *or* US spelling
Abbreviations	

Abbreviation	Meaning
ca.	about, approximately (from Latin 'circa')
cf.	compare (from Latin 'confer')
ead.	the same (woman) (from Latin 'eadem')
e.g.	for example (from Latin 'exempli gratia')
et al.	and others (from Latin 'et alii')
et seq.	and what follows (from Latin 'et sequens')
etc.	and others (from Latin 'et cetera')
i.a.	among other things (from Latin 'inter alia')
ibid.	in the same place (the same), used in citations (from Latin 'ibidem')
id.	the same (man) (from Latin 'idem')
i.e.	that is (from Latin 'id est')
loc. cit.	in the place cited (from Latin 'loco citato')
N.N.	unknown name, used as a placeholder for unknown names (from Latin 'nomen nescio')
op. cit.	in the work cited (from Latin 'opere citato ')
viz.	namely, precisely (from Latin 'videlicet')
vs.	against (from Latin 'versus')

Text Formatting and Illustrations (continue)

Part	Formats
Equations	• Variables should be represented in italic style • Constants should be represented in upright style. For example Euler's constant, e = 2.71828. • Subscripts and superscripts should appear upright if they refer to names or their abbreviations •Subscripts and superscripts referring to variables should be set italic. • Common functions such as sine (sin) or exponential (exp) are written upright. • The differential 'd' should be set upright, $f\,(x)\mathrm{d}x$.
Physical units	• The International System of Units (SI) must be used in scientific publications to express physical units. • In addition to the SI base units, coherent SI derived units can be used. Examples are energy in joule (J) or force on newton (N). • Units and theirs abbreviations should be written upright (never italic). • Rule of thumb: Unit names which are derived from scientists begin with a capital letter in their abbreviated from. On the other hand, units which are not named after a scientist are abbreviated with small letters.
Chemical elements	• Abbreviated elements (e.g. 'C' for carbon or 'Ti' for titanium) start with an upper case letter and the text is upright (never italic). • Elements (e.g. carbon) and compounds for that matter never start with an upper case letter when the name is spelled out.

Text Formatting and Illustrations (continue)

Part	Formats
Figures	• Do not link any figure (e.g. Microsoft Office Excel) into Microsoft Office Word. • Do not draw any figures in Microsoft Office Word. Most of the publishers do not use this software to process the manuscripts. •Produce stand-alone files of your figures in neutral file formats such as EPS (Encapsulated PostScript) or TIFF (tagged image file format • Ensure sufficient resolution of your figures: in general 600 dpi, 1200 dpi for scanned line figures and 300 dpi for scanned photos. High resolution means not necessarily large file size! • When designing a figure, keep the possible final size (choose the width and height appropriately) in the published manuscript in mind. Choose the font and font size for lettering according to the style in published articles, i.e. as the running text. • Color figures: In many cases, color figures are converted into b/w figures or graytones for the printed version. If the figures should be printed in color, the publisher may ask a considerable fee to process these figures in the printed version.

Cover Letter

A good cover letter:

1. Addresses appropriately the editor-in-chief (The EiC normally holds an academic degree (e.g. Dr.) and/or academic post (e.g. Professor) and this title/post should be used to correctly address him or her). Avoid to refer to gender (Sir, Madame), it might be wrong;
2. Contains the title of the manuscript and the names of all authors;
3. Gives a brief background of the work (What is the hypothesis of the paper?) and explains the importance of the obtained results;
4. Includes a statement that the submitted manuscript has not been published elsewhere and that it has not been submitted simultaneously for publication elsewhere;
5. Contains the complete contact details (e-mail, postal address, phone and telefax) of the corresponding author;
6. Is signed by the corresponding author.

Recommending Reviewers

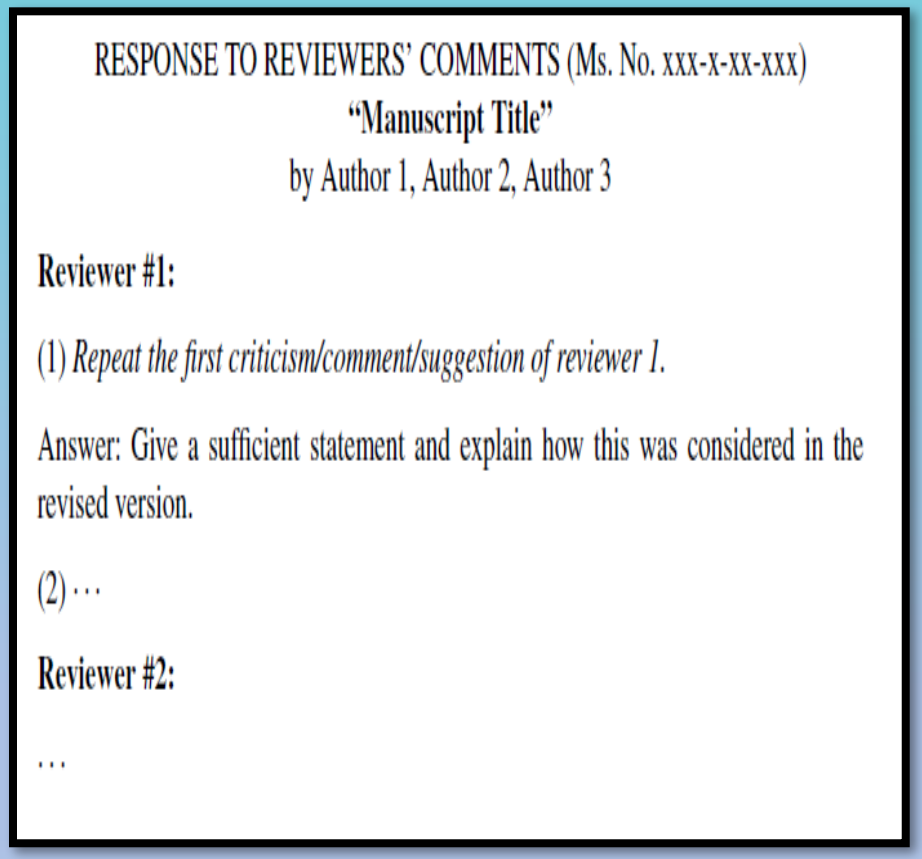
Suggested reviewers may look not very trustful under the following conditions:

1. The suggested reviewer is a frequent co-author of one of the submitting authors.
2. The suggested reviewer is completely unknown in the research field of the submission.
3. The suggested reviewer is from the same cultural (similar name or name from the same geographical area) or geographical (for example an author from Liechtenstein suggests three potential reviewers from Liechtenstein) background.
4. The suggested reviewer is a ‘well-known expert’ in the area of the manuscript but is not mentioned in the literature review/literature section.
5. The contact details are incomplete and no institutional e-mail addresses are provided

Revision of a Manuscript

After having revised the manuscript, the authors must resubmit their work to the journal office. The resubmission must be accompanied by

1. A new cover letter to the editor-in-chief and
2. A point-by-point reply to each single comment of the reviewers



RESPONSE TO REVIEWERS' COMMENTS (Ms. No. xxx-x-xx-xxx)

"Manuscript Title"

by Author 1, Author 2, Author 3

Reviewer #1:

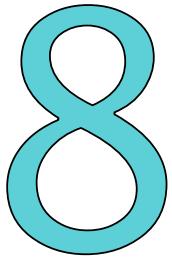
(1) *Repeat the first criticism/comment/suggestion of reviewer 1.*

Answer: Give a sufficient statement and explain how this was considered in the revised version.

(2) …

Reviewer #2:

…



Ethical Guidelines for Publishing

Plagarism

- Plagiarism can be <u>defined as taking someone's ideas, words or work without giving proper reference to the original source.</u>
- If an entire sentence or paragraph is copied from a source, it should appear in quotation marks ("· · ·") and the source must be given at the end.
- However, copying word-by-word entire paragraphs is not advisable in engineering and the original wording should be all the time rephrased in own words by the author.

PLAGIARISM: A VISUAL GUIDE

You simply re-type the information

YOU SUBMIT WORK THAT IS NOT YOUR OWN

YOU ARE A PLAGIARIST IF:

You incorrectly cite your sources

YOU TAKE ALL OF YOUR IDEAS FROM ONE SOURCE

YOU DON'T USE QUOTATION MARKS TO CITE

“

You copy the majority of a text but change only a few words.

e.g.

~~No one~~ Nobody can make you feel ~~inferior~~ bad without your ~~consent~~ permission.

Data Fabrication and Falsification

(a) Fabrication is making up data or results and recording or reporting them.

(b) Falsification is manipulating research materials, equipment, or processes, or changing or omitting data or results such that the research is not accurately represented in the research record.

Scientists should bear in mind that a scientific publication must contain all the information so that an independent group can *repeat* the experiments/simulations and *verify* the resulting data.

Multiple Submission

- Authors should never submit the same manuscript to different journals at the same time (‘multiple submission’). This may look at the first glance as a shortcut to save time (‘we will get at least one through’).
- However, journals with a similar topical orientation may relay on the same reviewers.
- A submission of the same or a revised manuscript to another journal should be only considered after a rejection.

Redundant Publication

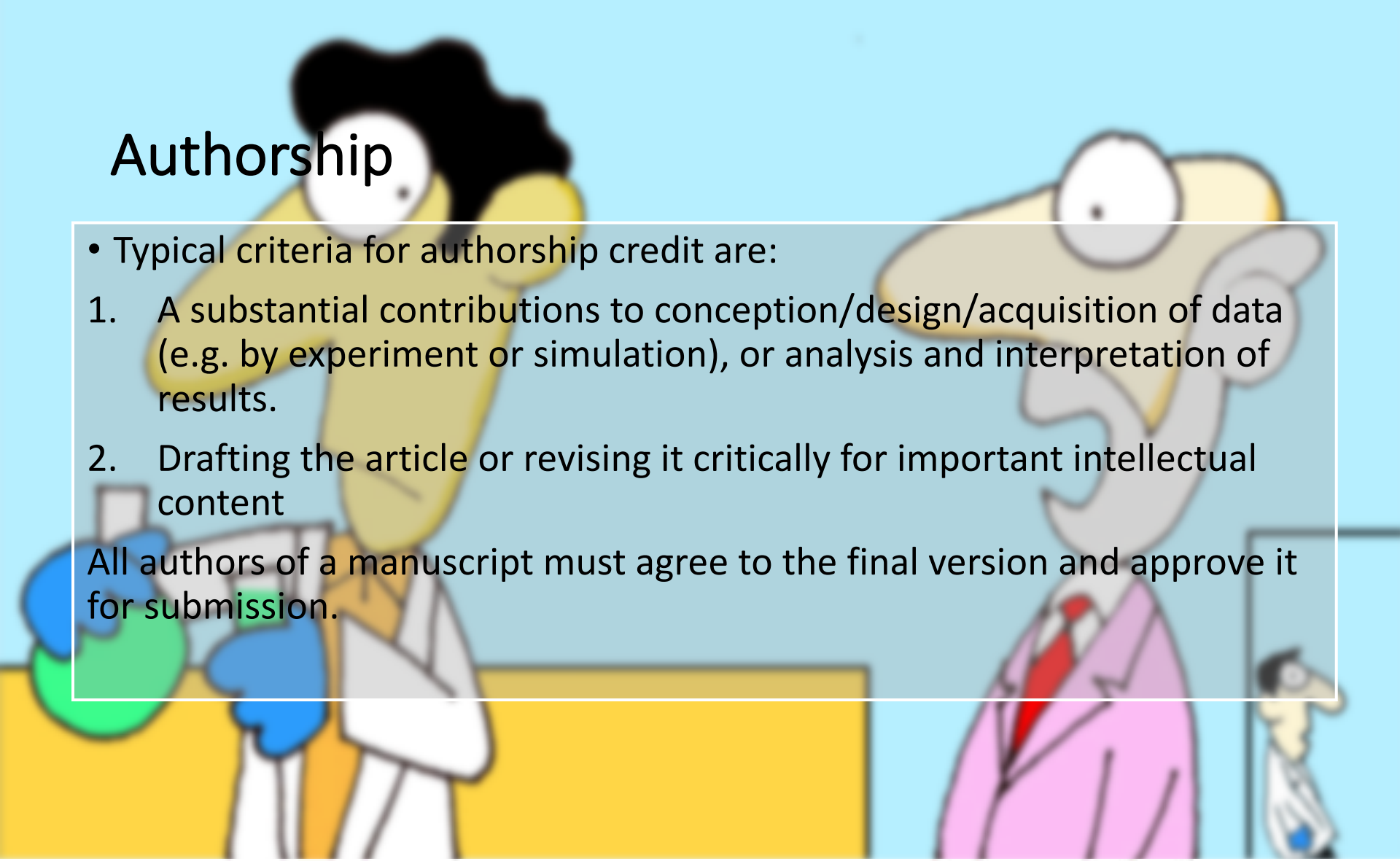
- Redundant publication refers to the fact that the same finding is used to produce different publications (→ self-plagiarism).
- Once a result from an experiment and simulation is published, it should be no more presented as new in any other publication of the author.
- If an author repeats the same result in a different publication (there may be reasons for doing so), he should give proper reference to the original publication of the results.
- The best way is to explain why it is necessary to repeat the results in the actual publication.

Authorship

- Typical criteria for authorship credit are:

1. A substantial contributions to conception/design/acquisition of data (e.g. by experiment or simulation), or analysis and interpretation of results.
2. Drafting the article or revising it critically for important intellectual content

All authors of a manuscript must agree to the final version and approve it for submission.

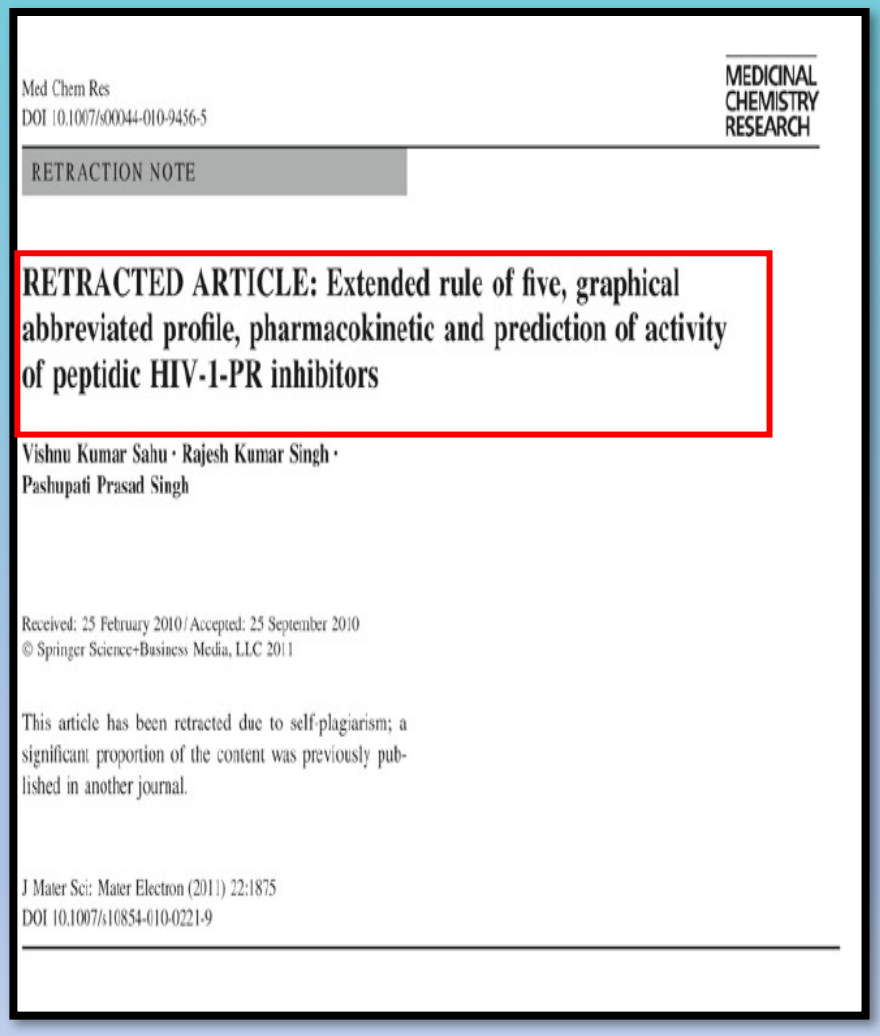


"No, it's my wife's turn to be the first author on **your** paper."

Conflicts of Interest

- Reviewers, editors and authors should disclose any conflict of interest, i.e. financial, personal, academic or religious, which may affect their ability to judge or present in an objective manner.
- Journals may ask to disclose any possible interest that may appear to influence the work and even publish such statements at the end of manuscripts.
- Such published statements increase the transparency of the reader and may avoid wrong conclusions.
- Typical misdeeds in this context are, for example, consultancy fees obtained from pharmaceutical companies and the tendency to claim higher impacts of medicaments or editors/reviewers taking ideas from articles under review or even rejecting manuscripts from competitors.

Consequences



Med Chem Res
DOI 10.1007/s00044-010-9456-5

MEDICINAL CHEMISTRY RESEARCH

RETRACTION NOTE

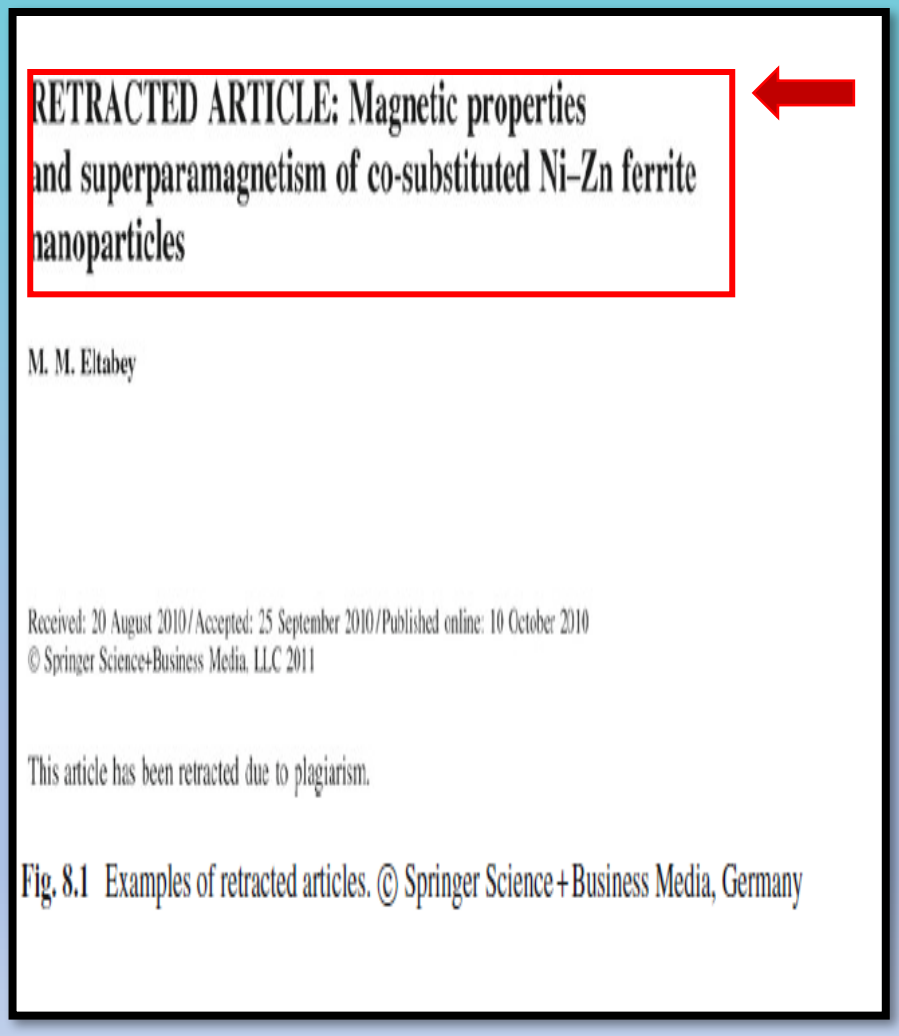
RETRACTED ARTICLE: Extended rule of five, graphical abbreviated profile, pharmacokinetic and prediction of activity of peptidic HIV-1-PR inhibitors

Vishnu Kumar Sahu · Rajesh Kumar Singh · Pashupati Prasad Singh

Received: 25 February 2010 / Accepted: 25 September 2010

This article has been retracted due to self-plagiarism; a significant proportion of the content was previously published in another journal.

J Mater Sci: Mater Electron (2011) 22:1875
DOI 10.1007/s10854-010-0221-9



RETRACTED ARTICLE: Magnetic properties and superparamagnetism of co-substituted Ni–Zn ferrite nanoparticles

M. M. Eltabey

Received: 20 August 2010 / Accepted: 25 September 2010 / Published online: 10 October 2010

This article has been retracted due to plagiarism.

Fig. 8.1 Examples of retracted articles. © Springer Science + Business Media, Germany

9 Strategies to Publish

Strategies to Publish

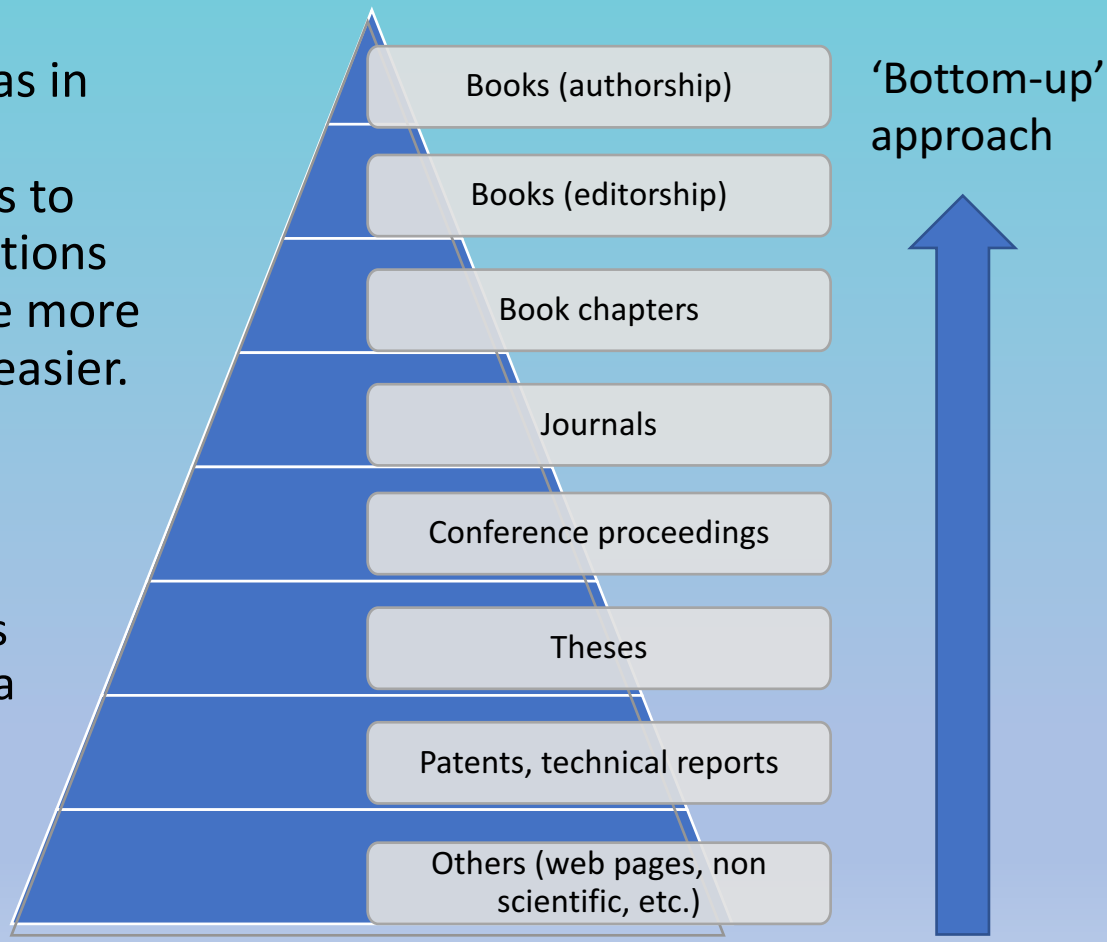
These factors are rather to be considered by researcher or administrations whereas postgraduate students should think about the following issues:

- to choose an active research group/supervisor (publications, research projects, industry cooperations, international reputation and cooperation);
- to check the publication track record of the team/supervisor (use scientific databases);
- to check facilities (experimental and/or computational, premises for students);
- to try to improve skills (scientific and linguistic, never stop learning);
- to try to widen the horizon (stay abroad, internships, degrees from different universities);
- to read as much as possible (scientific books and journals).

Strategies to Publish (continue)

This experience can be built up—as in may different disciplines—by the bottom-up approach which means to start with simpler tasks or publications and gaining experience to that the more challenging publications become easier.

Students should start to attend first national and then international conferences and improve their skills in presenting their work in front of a scientific audience and additionally to prepare a manuscript of their presented work.



Journal Selection Process

To choose the right journal, an author should consider the following factors which can be evaluated on the journal home page or in scientific databases:

1. • Aims and scope;
2. • Publishing frequency;
3. • Impact factor;
4. • Target audience;
5. • Open access or subscriber;
6. • Prestige;
7. • Cost;
8. • Publication type.

In the first case, a lower to medium impact journal should be considered while a new conceptual finding would rather request for a high impact journal.


THANK YOU