



Why do you want to know about open access?

R. Schlögl
Department AC
Fritz-Haber-Institut

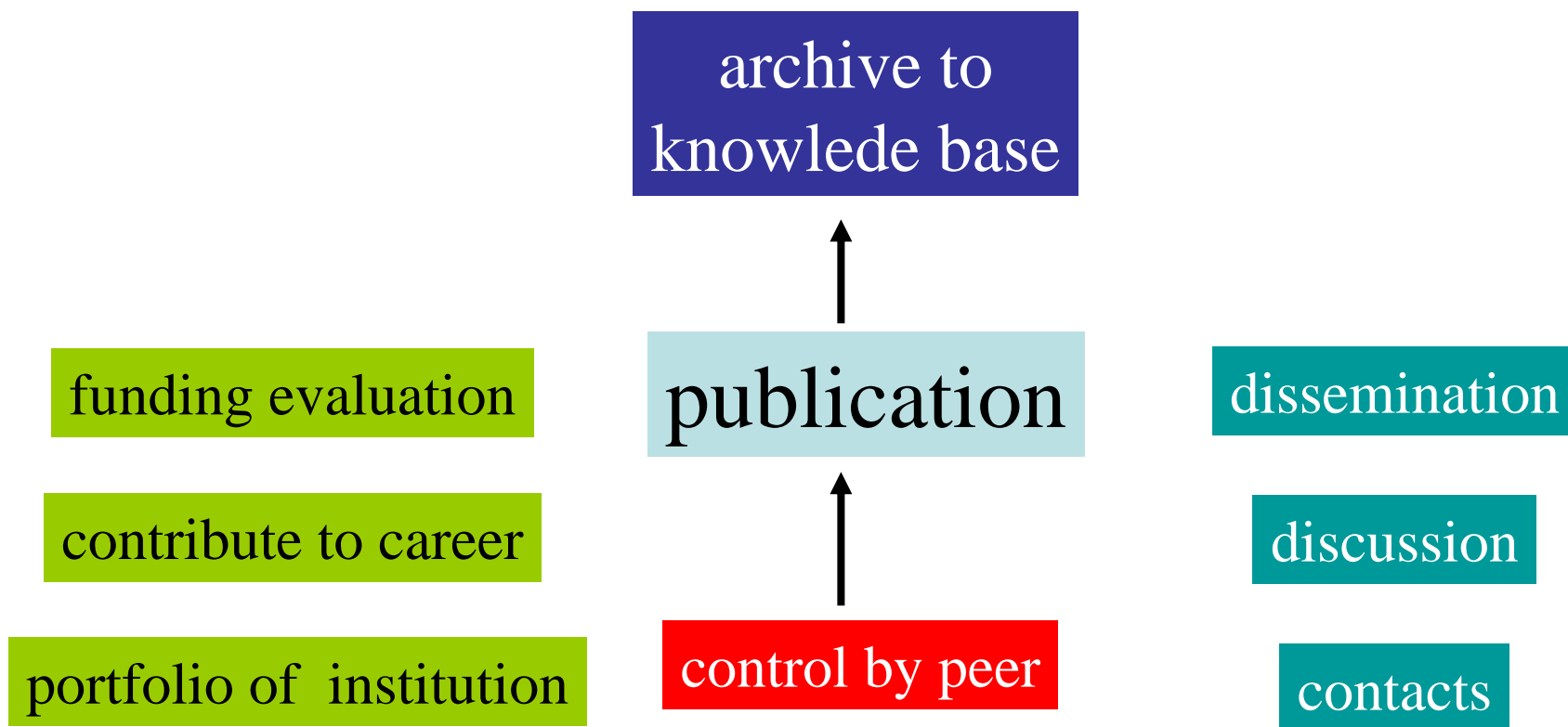


MPG and e-science (OA)

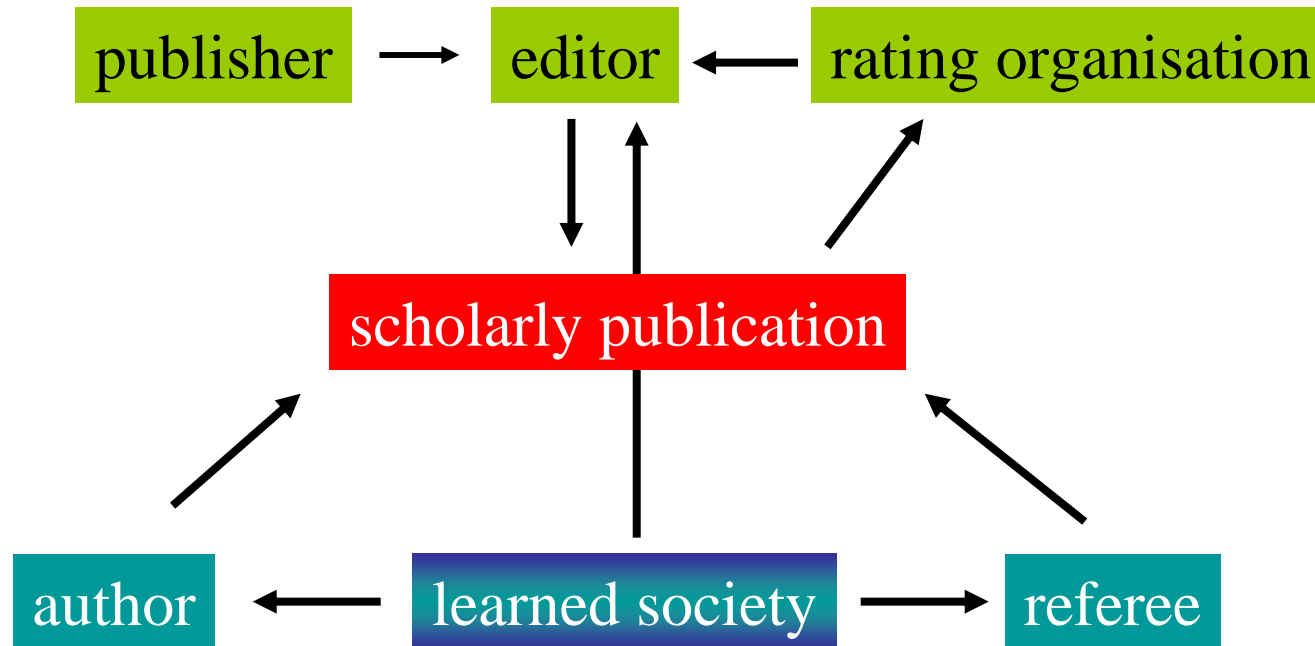
- MPG is a research institution active in all fields of science and humanities (85 institutes, 10.000 employees, 4000 PhD students and post-docs, 1.3 G€)
- produces about 2% of the global research output
- mission statement includes the requirement of unlimited and unrestricted access to its research results
- dedicated towards a continuous improvement of the discovery process in the fundamental sciences



Purposes of Publication



Players in the process



The target is a maximum of control for the author knowing best needs and requirements

The supporting system is e-sci-doc for MPG as part of the scientific web

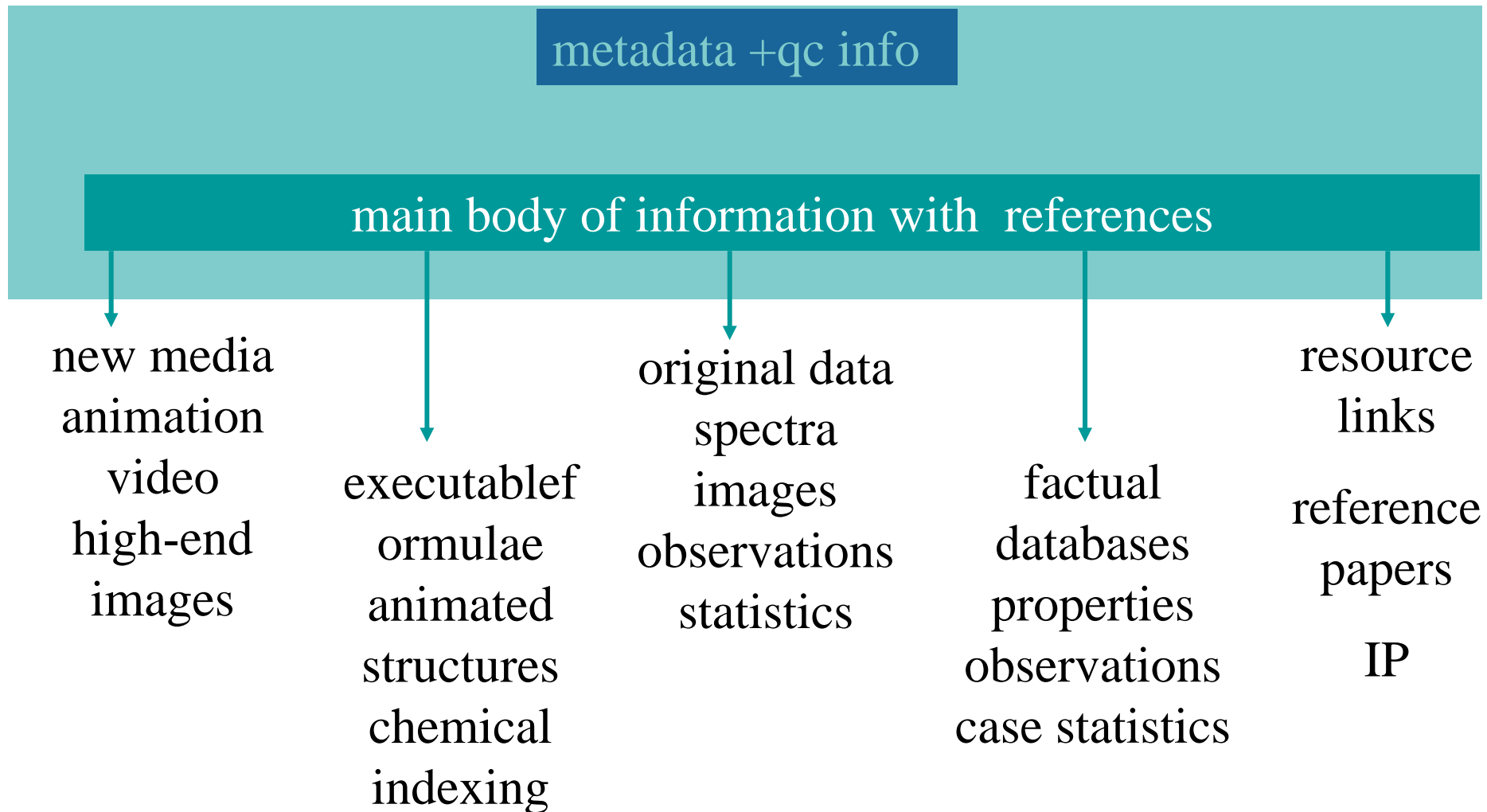


What is open access?

- Open access is the toll-free reception and usability of scholarly information.
- It puts the author in the focus of granting licenses and requires one licence to the public.
- Deduced business models see the author as customer and the publisher as service-provider.
- It is a vehicle to promote the community-specific use of the Internet ranging from open peer-review to factual data access.
- It re-defines the role of libraries as active elements in the information creation process



Electronic publication: the base



What is open access not!

- It makes no statements about cost models of publishing.
- Not intrinsically the fight against traditional publishers (but re-defines their role).
- Not against peer-review.
- It does not preclude any proprietary pre-use.
- It is not destroying jobs or putting publishers out of operation.
- It is not grey literature.



Berlin Declaration <http://oa.mpg.de>

- encouraging our researchers/grant recipients to publish their work according to the principles of the open access paradigm.

1. 1 to

2. ● encouraging the holders of cultural heritage to support open access s,
by providing their resources on the Internet.

- developing means and ways to evaluate open access contributions inical
and online-journals in order to maintain the standards of quality orted
assurance and good scientific practice.

at

- advocating that open access publication be recognized in promotion
and tenure evaluation.

There are many mysterious definitions about OA in the community:

no peer review

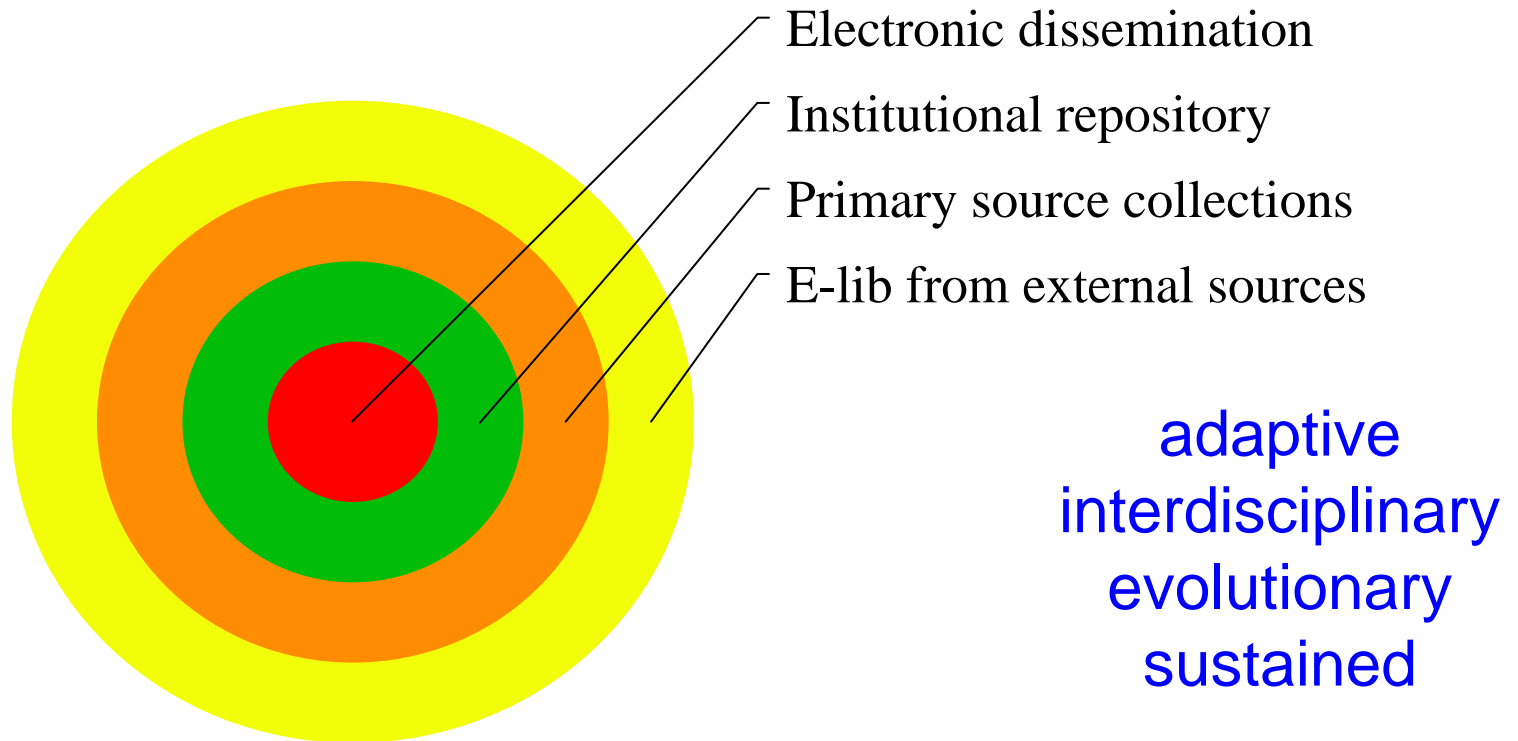
free publishing

“immoral”

- advocating the intrinsic merit of contributions to an open access
infrastructure by software tool development, content provision,
metadata creation, or the publication of individual articles.



The MPG e-science platform: MPDL



The platform is the replacement of a traditional library
(non-existent for MPG) with
the same requirements on different media:
librarians are enabling and interfacing



A successful example

All-win situation for authors, referees & readers

- **W**
- **C Discussion Paper**
 - **P** *free speech & rapid publication (authors & readers)*
- **S**
- **P Interactive Peer Review & Public Discussion**
 - *direct feedback & public recognition for high quality papers (authors)*
 - *prevention of hidden obstruction & plagiarism (authors)*
- **N**
 - *documentation of critical comments, controversial arguments, scientific flaws & complementary information (referees & readers)*
 - *deterrence of careless, useless & false papers (referees & readers)*
- **Final Revised Paper**
 - *maximum quality assurance & information density*
 - *through complete peer review, public discussion & final revision (readers)*



Complex info electronically: pictures matter in chemistry

Jørgensen and Thomas J. Sørensen
ASAP (As Soon As Publishable)
Publication Date (Web): March 12, 2009 (Note)

Full Text HTML
Hi-Res PDF [325K]
PDF w/ Links [159K]
Subscriber Access

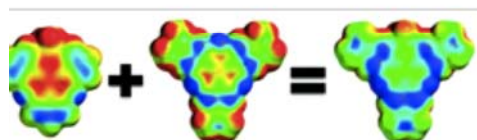
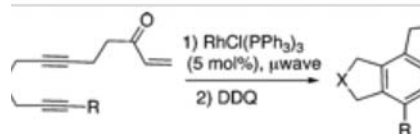


Figure 1 of 3

Molecular Rhodium-Catalyzed [2+2+2] Cyclizations of Enones with Enones

a L. Jones and John K. Snyder
ASAP (As Soon As Publishable)
Publication Date (Web): March 12, 2009 (Note)
1.1021/jo9001678



Interplay of Invention, Discovery, Development, and Application in Organic Synthetic Methodology: A Case Study

Denmark
ASAP (As Soon As Publishable)
Publication Date (Web): March 11, 2009 (Perspective)
1.1021/jo900032x

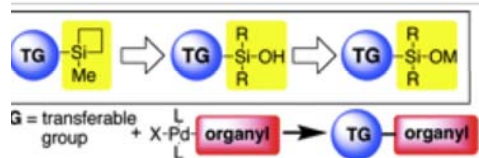
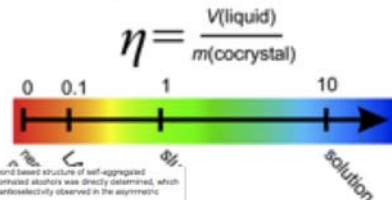


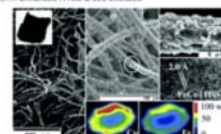
Figure 1 of 4

The role of solvent in mechanochemical and sonochemical cocrystal formation: a solubility-based approach for predicting cocrystallization outcome
Tomislav Friš, Scott L. Childs, Syed A. A. Rizvi and William Jones, *CrysEngComm*, 2009, 11, 418
DOI: 10.1039/b815174a

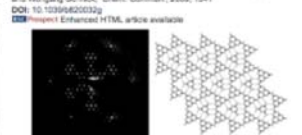


For the first time the hydrogen bond based structure of self-aggregated Rh-phosphine complexes in fluorinated solvents was directly examined, which gives a rationale for the high enantioselectivity observed in the asymmetric hydrogenation.

Fabrication of a tubular FeCo bimetallic nanostructure using a cellulose-coated hexacyanoferrate composite as a precursor
Mami Yamada, Tomonori Tsuji, Miki Miyake and Toshiyuki Miyazawa, *Chem. Commun.*, 2009, 1338
DOI: 10.1039/b816078a

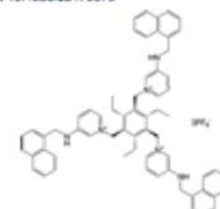


We have demonstrated the facile preparation of a tubular FeCo structure with a 9-11 nm outer diameter composed of FeCo nanoparticle assemblies using a cellulose-coated hexacyanoferrate (Fe-CN-Ce) composite material as a novel precursor.



Structure elucidation of polythiophene imide by electron diffraction—a templated 2D carbon nitride network
Markus Ollinger, Bettina V. Lisch, Julia Wack, Jürgen Thun, Jürgen Senker and Jörgen B. Schirmer, *Chem. Commun.*, 2009, 1541
DOI: 10.1039/b820032g

DOI: 10.1039/b817087c



This macrocyclic molecule is a model for the synthesis of a new class of macrocyclic compounds.



Mimicking nature synthetically: new reagents in medicinal chemistry

Abstract | Reference | Save Article

Secondary Alkyl

Alena Rudolph, Mark
Published Online: Jan
DOI: 10.1002/anie.2

Abstract | Reference | Save Article

Molecular Catalysis

Xavier Sala, Isabel Ritz
Published Online: Jan
DOI: 10.1002/anie.2

Abstract | Reference | Save Article

Water into oxygen: A good influence on their performance

Abstract | Reference | Full Text: PDF (Size: 1033K)

Abstract | Reference | Full Text: PDF (Size: 1033K)

Ex Uno Plures ("Out of One, Many"): New Paradigms for

Lawrence R. Sita
Published Online: Dec 29 2008 9:32AM
DOI: 10.1002/anie.200800661

Abstract | Reference | Full Text: PDF (Size: 513K)

Abstract | Reference | Full Text: PDF (Size: 513K)

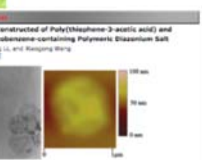
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Abstract | Reference | Full Text: PDF (Size: 513K)



Synthesis and Photophysical Behavior of Nitrogen-doped Na2O

Yanling Wang, Gang Li, Zhi-Gang Chen, Peng Li, Guo-Qing Li, and Hu-Ming Cheng
Published Online: Jan
DOI: 10.1002/anie.2

Abstract | Reference | Save Article

Development of an Active Oxygen Detector Using a Quartz Crystal Microbalance with a Carbon/Silver Layer

Yanling Wang, Gang Li, Zhi-Gang Chen, Peng Li, Guo-Qing Li, and Hu-Ming Cheng
Published Online: Jan
DOI: 10.1002/anie.2

Abstract | Reference | Save Article

Water into oxygen: A good influence on their performance

Abstract | Reference | Full Text: PDF (Size: 1033K)

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Ex Uno Plures ("Out of One, Many"): New Paradigms for

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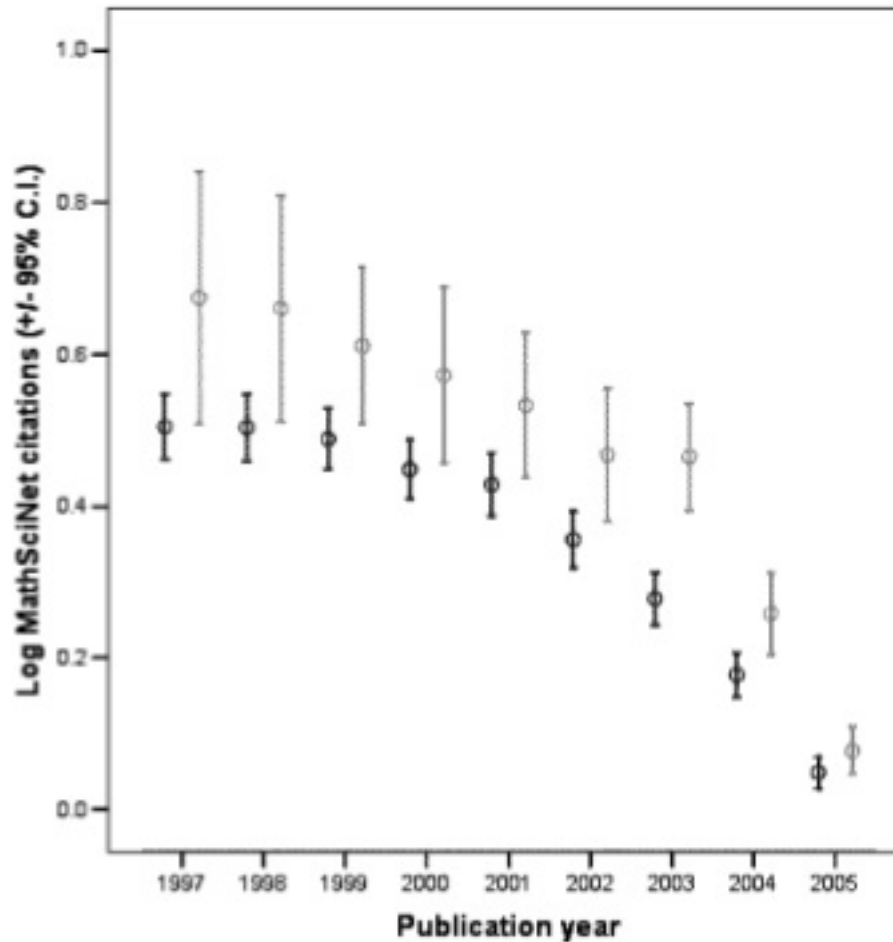
How “good” is open access”

TABLE 1. Gross citation

	cita
Applied Maths	1
Ecology	6
Economics	1
Sociology	3
Total	13

M. Norris et al, 20

There is
that supp
many



Article in arXiv?

no
yes

s	OA % advantage ±
	53
	44
	62
	88
	57

ature
rough
and

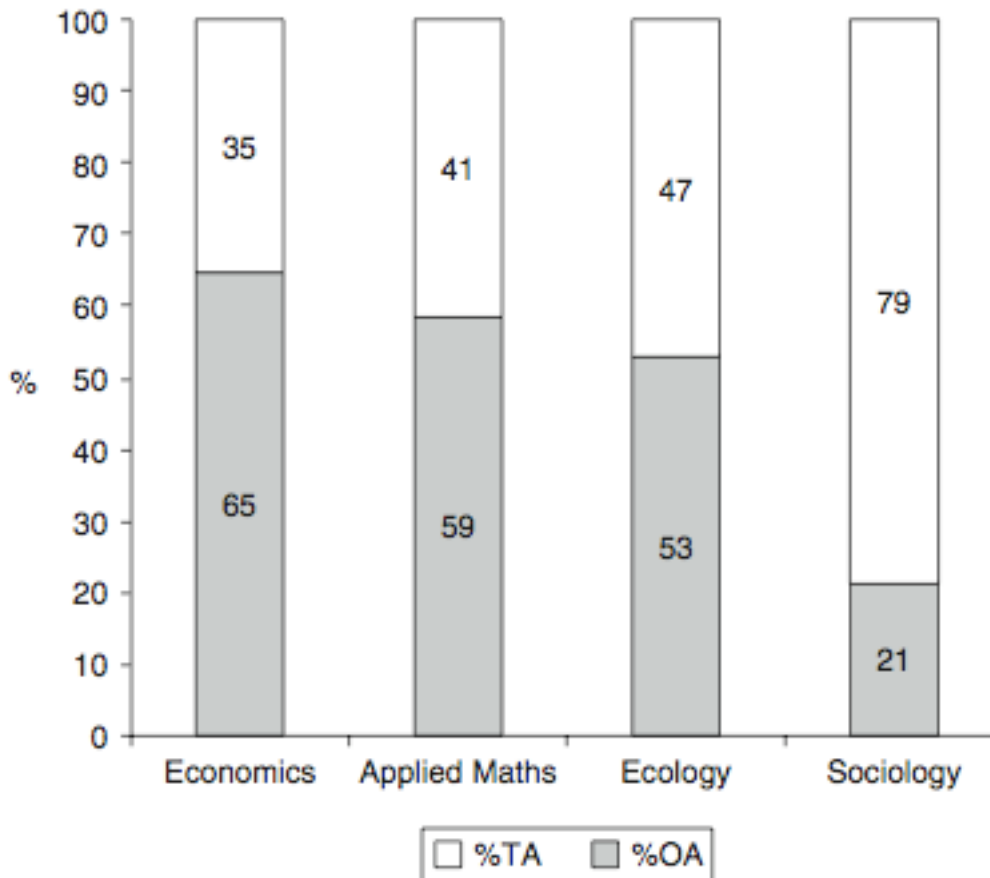
P.M. Davis et al, 2007



Is open access a curiosity?

TABLE 1. The dataset.

Journal	
Bioinformatics ^b	
Brain ^b	
Carcinogenesis ^b	
Cerebral Cortex ^b	
Development ^c	
Human Molecular Genetics ^b	
J. National Cancer Institute ^b	
Physiol. Genomics ^d	
Plant Cell ^e	
Plant Physiology ^e	
Proceedings of the National Academy of Sciences U.S.	
Total	

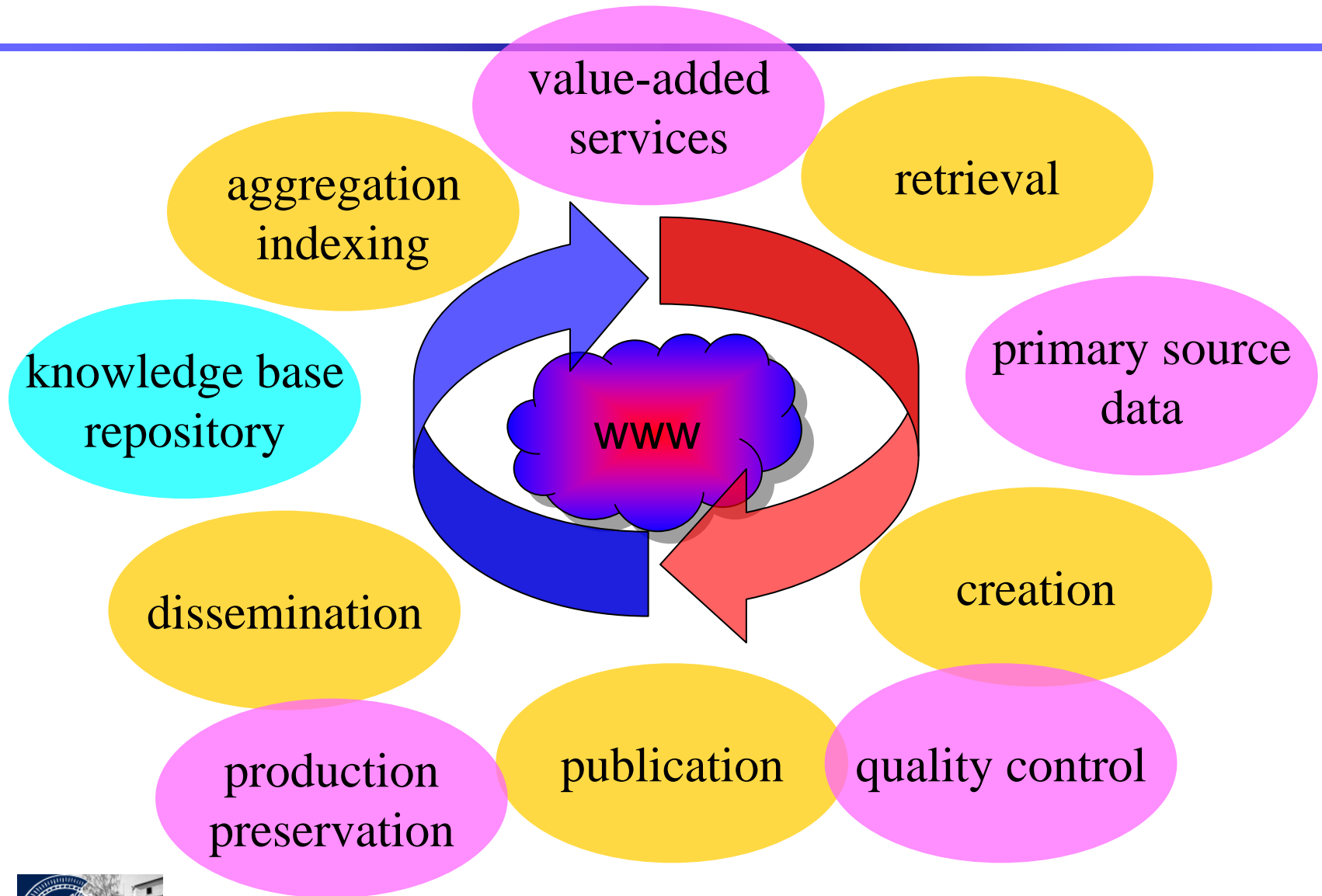


Open access %	Free online after delay ^a
21	12 mo.
14	24 mo.
8	12 mo.
11	12 mo.
5	6 mo.
15	12 mo.
15	12 mo.
15	12 mo.
22	12 mo.
12	12 mo.
18	6 mo.
15	

M. Norris et al, 2008



Elements of e-science

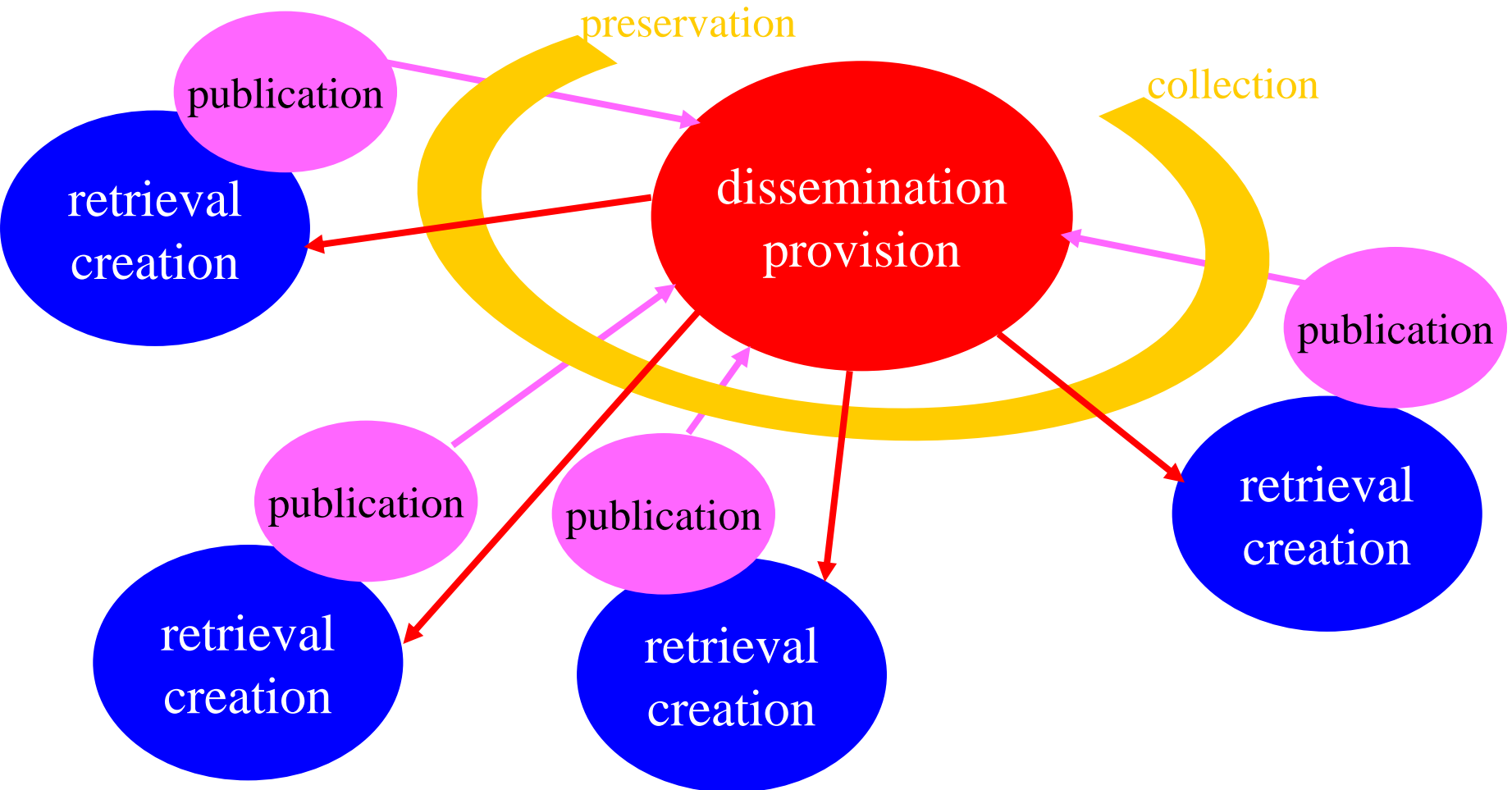


Open Access and e-science

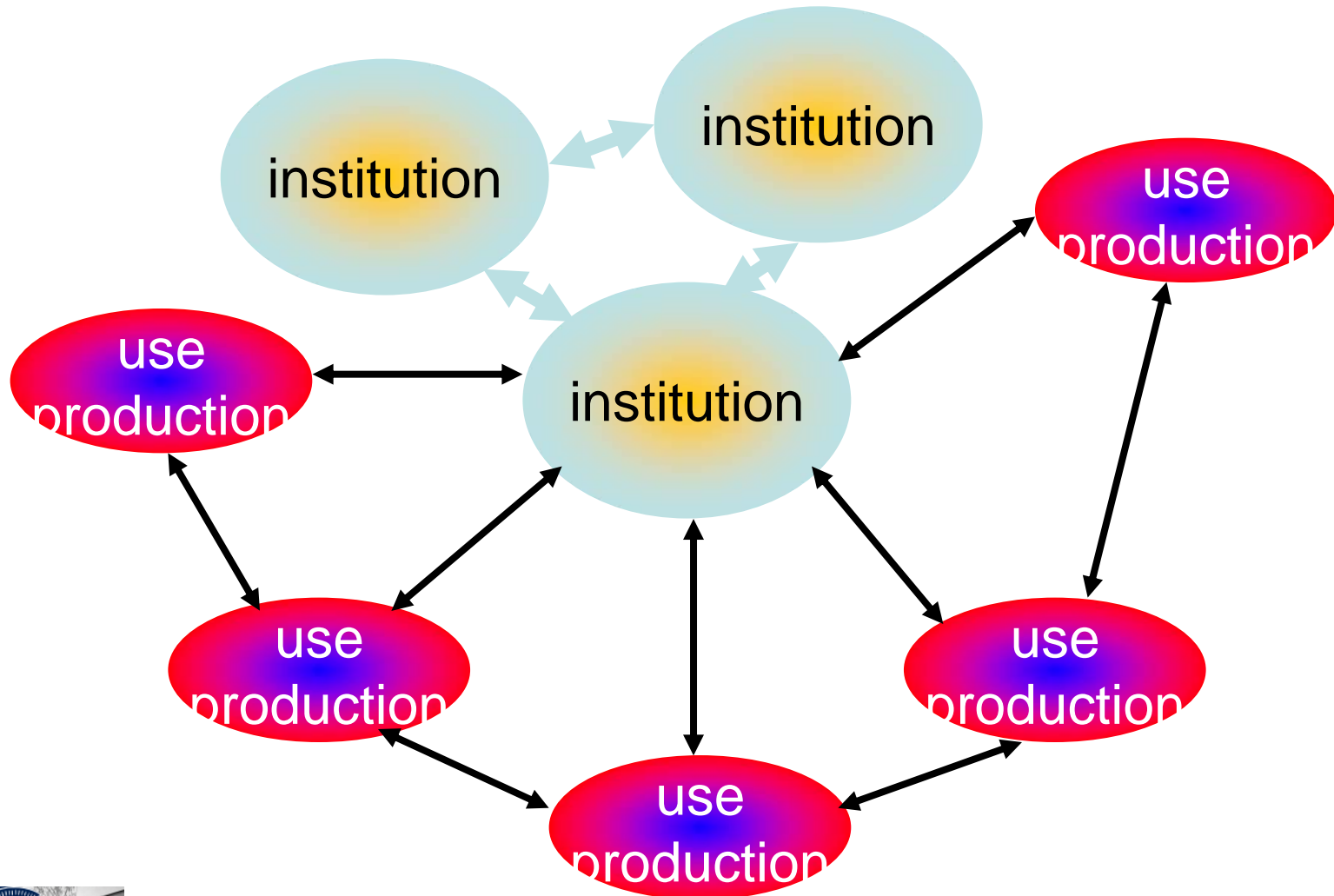
- OA is the suitable form of organization for e-science for institutional and commercial providers likewise
- Financing upfront by authors
 - Author controls and justifies cost of publication
 - Opportunity for a market, no quasi monopoly
- OA is only possible with quality control
 - Peer review, publishers or learned societies
 - Tagging of documents
 - Optional: Publication of referee comments (anonymous)



The transformation of scholarly communication: traditional



The transformation of scholarly communication: new



Open Access is no myth nor
a toy for information freaks; it
is the future of scholarly
publication

2 nm



Thank You