

# WHAT GOOGLE SCHOLAR CAN('T) DO : COMPARISON OF THE SCHOLARLY SEARCH IN GOOGLE SCHOLAR AND ECONBIZ

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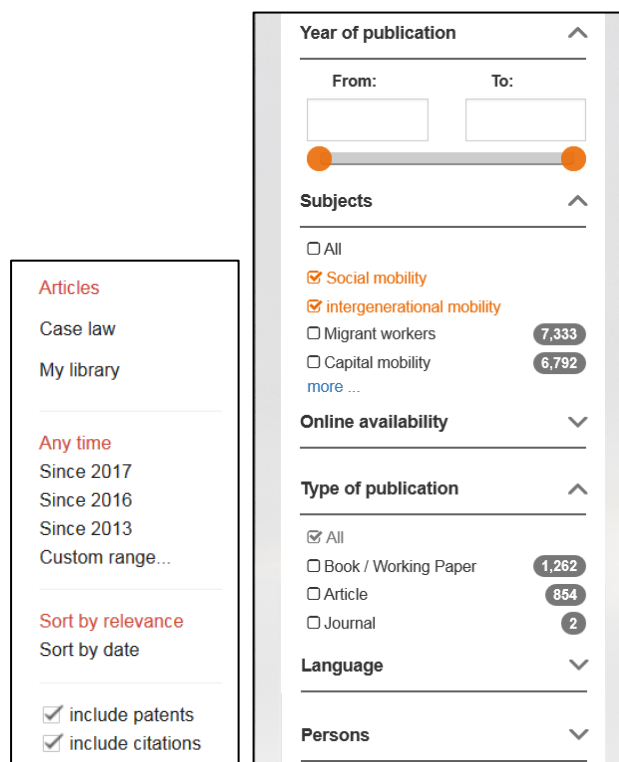
[Google Scholar](#) stands at the beginning of almost every scholarly literature search today. However: [EconBiz](#) and other subject specific databases offer advantages that Google can't beat so far.

The most important topics discussed below:

- # The search interface of Google Scholar provides only few options to control a topical search. (1)
- # Google Scholar includes huge quantities of full-texts and references of all subject areas. The result lists of subject specific databases might be more precise. (1)
- # With its ranking, Google Scholar influences which search results are displayed. The sorting is not transparent and cannot be changed. (2)
- # Google Scholar is led by commercial interests. It is important that publicly funded search tools provide alternatives in the access to information. (3)
- # Google doesn't always respect privacy and copyright laws. (3)

## 1 Topical Search

Google Scholar is a great tool for searching when you search for known items, since large amounts of titles are available. This positive experience is often transferred to the topical search. But here, Google Scholar offers only very few options to control a search and to specify your needs.<sup>1</sup> Given the growing amounts of information, the possibility of specifying a search becomes increasingly more important. EconBiz therefore offers many ways to filter search results and to use various advanced search options.



Img. 1 / 2: Filter options in Google Scholar (left) and EconBiz (in selection, right)

Google Scholar scores with being a huge machine, a machine that contains masses of data. EconBiz, on the other hand, shows a more personal face. Sources are selected by experts and indexed with controlled vocabulary to facilitate the topical search. Moreover, members of the

<sup>1</sup> See more details on filter and search options of EconBiz and Google Scholar in the attachment. On limitations of the topical search in Google Scholar see also: Bramer, W. M., Giustini, D., Kramer, B. M., & Anderson, P. (2013). The comparative recall of Google Scholar versus PubMed in identical searches for biomedical systematic reviews: a review of searches used in systematic reviews. *Systematic Reviews*, 2, 115. <http://doi.org/10.1186/2046-4053-2-115>

EconBiz team are available via chat and e-mail to support the search and the access to publications.

Depending on the topic, the use of a specialized database with individually selected, high-quality sources can gain better results than a search engine that contains publications from all disciplines and selects its sources automatically by harvesting.

### *Examples – Searches that you cannot perform with Google Scholar:*

#### → Find all possible endings:

In EconBiz you can find a term with all possible endings by using the asterisk (\*). The search for *Swed\** will find Swedish, Sweden, etc. The extension of the term is not determined by the system automatically, but can be used in a controlled manner.

#### → Find only dissertations / journals / etc. on a topic:

EconBiz allows filtering a search by publication type on the right hand of the result list. Select “Dissertation”, “Thesis” or “Journal”, etc. after you performed your search.

#### → Who published most on a topic?

In the filter section of EconBiz you can see which author appears most often in a result list.

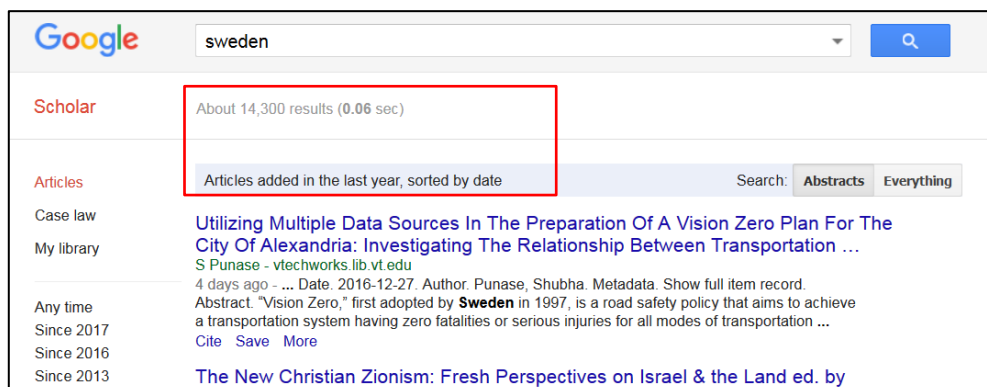
## 2 Sorting of result lists

The increasing amount of information mentioned above makes a smart sorting of results ever more important. This is one of the secrets of success of Google and Google Scholar. However, by trusting in the automated sorting of results by non-transparent criteria, you will give up a piece of control over your own research results.

Google Scholar writes about its own relevance ranking: “Google Scholar aims to rank documents the way researchers do, weighing the full text of each document, **where it was published, who it was written by**, as well as how often and how recently it has been cited in other scholarly literature.”<sup>2</sup>

Presumably because of the emphasis on the numbers of citations, older publications often are ranked higher in Google Scholar than new ones. How Google weights the relevance of persons or institutions is not clear. A sorting without any calculated parameters, i.e. by publication date, is not possible in Google Scholar. If you select “sort by date” you will receive a much smaller result list with “**Articles added in the last year**”.

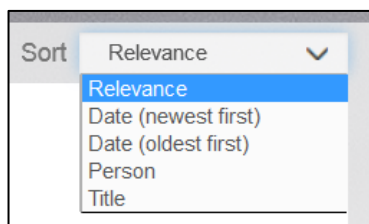
Filtering a result list by year is possible, however.



Img. 3: Sorting by date in Google Scholar leads to a limitation of the result list. (17.07.17)

<sup>2</sup> About Google Scholar: How are documents ranked? <http://scholar.google.com/intl/en/scholar/about.html> [17.07.2017]. (Highlighting by me.)

The relevance ranking in EconBiz is based on more neutral values, such as publication year or position and frequency of the search term within the document. A documentation of the relevance ranking can be found on the website at [A-Z: Relevance Ranking](#). You can change the sorting to publication date, title or author name.



Img. 4: Sorting options in EconBiz

### *Examples – Relevance Sorting of Result lists*

- ➔ A search for “welfare state” Sweden in Google Scholar leads to results from:  
1. 2004, 2. 2005, 3. 1990, 4. 1990 (06. July, 2017)
- ➔ A search for “welfare state” Swedish in Google Scholar leads to results from:  
1. 1990, 2. 2005, 3. 1990, 4. 1996 (06. July, 2017)
- ➔ In EconBiz the search for “welfare state” Swed\* shows results from:  
1. 2016, 2. 2016, 3. 2015, 4. 2015 (06. July, 2017)  
The whole list can be sorted by publication date.

### **3 Commercial interests vs. public funding**

With its quasi-monopoly Google Scholar influences the search behaviour of researchers and the results of scientific research. Primarily Google is interested in high usage and return on investment. Data protection issues and copyright law are subordinate to commercial interests of the firm. Therefore it seems important to develop publicly funded alternatives in the access to information, which focus on the promotion of science.

EconBiz is a service of the [ZBW – Leibniz Information Centre for Economics](#). EconBiz respects data protection, aims at the neutrality of the service and works in accordance with EU copyright law.

### **4 Conclusion**

Presumably no one will completely omit Google Scholar in her or his search for scholarly information. The amount of registered publications, the relevance ranking and the quick access to many full texts are key advantages of the search engine. However, you should not rely on Google alone. [1] As it is not possible to refine a search or to change the sorting of results, you are dependent on the automated rating of publications by unknown criteria.

Maybe this paper can be taken as an occasion for comparing results in Google Scholar with results of EconBiz or other subject specific academic databases.

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## Attachment: Details on the search options in EconBiz and Google Scholar

	EconBiz	Google Scholar
<b>Search only for the exact term you entered</b>	Default	Place quotation marks around the term.
<b>Search only for the exact phrase you entered</b>	Place quotation marks around multiple terms.	Place quotation marks around multiple terms.
<b>Truncation: all possible endings of the term must be found.</b>	Asterisk: <i>Swed*</i> searches swedish / Sweden / etc.	Not possible
<b>Refine / filter result lists</b>	Filter options: <ol style="list-style-type: none"> <li>1. Year of Publication</li> <li>2. Subjects</li> <li>3. Online availability</li> <li>4. Type of publication</li> <li>5. Type of publication (narrower categories): dissertation, statistics, ...</li> <li>6. Language</li> <li>7. Persons</li> <li>8. Institutions</li> <li>9. Published in (journal / series)</li> <li>10. Origin from database</li> </ol>	Filter options: <sup>3</sup> <ol style="list-style-type: none"> <li>1. Articles or Case law</li> <li>2. Year of Publication</li> <li>3. Include patents</li> <li>4. Include citations</li> </ol>
<b>Search keys: Search only within title / author name / subject headings</b>	Specification of search keys is possible in the simple search via pull down menu and in the advanced search: <ol style="list-style-type: none"> <li>1. Titles</li> <li>2. Subjects</li> <li>3. Persons</li> <li>4. Institutions</li> <li>5. ISSN/ISBN</li> <li>6. Published in (journal/ series)</li> <li>7. Publishers</li> <li>8. Languages</li> <li>9. Year of Publication</li> <li>10. Publication Type</li> <li>11. Origin from database</li> </ol>	Possible in “settings” and in the advanced search: <ol style="list-style-type: none"> <li>1. Title</li> <li>2. Author</li> <li>3. Published in (journal / series)</li> <li>4. Publication years</li> <li>5. Languages</li> </ol>
<b>Use standardized search terms / subject headings for the search</b>	A major part of the publications in EconBiz is enhanced with subject headings from the Standard Thesaurus Economics ( <a href="#">STW</a> ). The thesaurus shows the best search terms for EconBiz as well as translations, synonyms, broader and narrower terms for a subject.	Not possible

<sup>3</sup> The metadata in Google Scholar is partially extracted automatically from the publication full text. Metadata might be missing or incorrect.