

# Database review: EconBiz

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## *Abstract*

EconBiz is a specialized academic information portal hosted by the Leibniz Information Centre for Economics in Germany. It is freely accessible and facilitates discovery to a wide range of research publications, learning, and professional resources. This article will review EconBiz in the context of business and economics research and from an openness perspective.

*Keywords:* Database; business; EconBiz; economics; open access



# ***Introduction***

## ***What is EconBiz?***

EconBiz is a specialized academic information portal dedicated to business and economics. We use the term portal because it facilitates discovery of a wide range of information, resources, and services together in one place (Blummer & Kenton, 2021). It is hosted by the Leibniz Information Centre for Economics (ZBW) but includes an international partner network of institutions in over 30 countries which provides for networking, problem solving and collaboration opportunities (Pianos, 2015). EconBiz targets a deliberately broad audience ranging from students of all levels, to educators, researchers, and research institutions. The main feature of the portal is a bibliographic database of academic literature, including peer-reviewed journal articles, conference proceedings, monographs, and open educational resources. Access to the entire portal is free, and its extensive bibliographic database indexes both open access and licensed material. In addition, EconBiz contains resources ranging from tutorials on information literacy and academic writing for students to content tailored specifically for early-career researchers to a subject-specific calendar of conferences and other professional events.

## ***History & organizational background***

The portal was launched in 2002 as a joint project of the ZBW and the University and City Library of Cologne (USB Köln). The ZBW has locations in Kiel and Hamburg and is the world's largest special economics and business library (Seefeldt & Syr , 2020). As the Central Library for Economics, the institution is publicly funded and makes up one of three supra-regional special libraries that is part of an infrastructure of memorial institutions of national importance that supplements the collecting and archiving activities of the German National Library (Seefeldt & Syr , 2020). As such collections are both broad and comprehensive.

EconBiz was established as part of the Virtuelle Fachbibliotheken, a network of subject-related online portals conceptualized in the late 1990s and funded by the German Research Foundation (DFG). These portals were intended to help usher certain libraries with nationally coordinated subject collection mandates into the digital age by presenting their increasingly electronically available collections, enriched with additional information services, aimed at a specialist audience on the web (Kempf, 2006; Horstkemper, 2014). The relatively short-lived attempt to centralize these portals under a single gateway between 2005 and 2010, as well as the discontinuation of national subject collection mandates by the DFG since 2013 (Horstkemper, 2014), spelled the end for some of these offerings. EconBiz withstood these changes and has existed continuously since 2002. In 2010, there was a major relaunch changing from a metasearch to a Solr-based search engine (Pianos, 2010). Since 2013, the ZBW has been the sole host of the portal (Leibniz Information Center for Economics, 2023a). Subsequent relaunchees have been technical in nature and included integrating the ZBW-OPAC into the portal in 2017.

## ***Evaluation***

### ***Content***

EconBiz currently has over 12 million publications indexed and primarily covers the fields of economics and business. The main source of the content is ECONIS, the catalogue of ZBW. Formats include articles, working and discussion papers, dissertations, and e-books. Other data sources include working papers from Research Papers in Economics (RePEc), and open access academic literature from EconStor and BASE, among others (Leibniz Information Center for Economics, 2022c). It provides access to results in over 30 languages, the majority of which are English, followed by German. A REST API allows users to build their own applications based on the bibliographic metadata contained in EconBiz, or directly retrieve such data on a larger scale than would be possible with the search interface (Pianos & Klemenz, 2013).

In addition to research publications, EconBiz also provides Open Educational Resources (OER) in the form of a “Research Skills” module which may appeal to librarians and researchers alike. It includes interactive online tutorials and short video clips. Topics include literature searching, evaluation, and citation with emphasis on open access resources and recognizing fake news (Leibniz Information Center for Economics, 2023c). There are also resources aimed at early career researchers on publishing, networking, metrics, and research data management. Librarians and instructors can reuse these tools into learning management systems thanks to instructions provided and the CC-BY OER license.

Other services include the Standard Thesaurus for Economics (STW) which helps find additional search terms and is available in both German and English. It includes about 6,000 subject headings and about 20,000 additional entry terms (Leibniz Information Center for Economics, 2022a). EconBiz also lists upcoming conferences and workshops in business and economics from all over the world. At the time of writing there were over 200 events listed in the calendar. Researchers are able to filter by country, subject area, and more. Finally, Beta tools in development include author profiles using linked data and authority files to bring together information (biography, affiliations, metrics, collaborations, etc.) on specific authors, a visual event search for conferences, a scientific figures and infographics search tool and various widgets (Leibniz Information Center for Economics, 2019).

## ***Usability***

Usability refers to how well a particular system, product, or service can be used by its intended users to accomplish desired tasks while being effective, efficient, and convenient (International Organization for Standardization, 2019). An assessment of EconBiz suggests deliberate website design optimized for usability. The site includes a clear structure and hierarchy, features for easy orientation such as a sitemap, a hyperlinked glossary (A-Z), unambiguous terminology, intuitive and broad contact options, availability of the portal in English, German, French, Spanish, and easily identifiable sites for information on privacy, copyright, and accessibility. The platform is also optimized for access with mobile devices.

## ***Accessibility***

The term accessibility refers to products, services, environments, or facilities that are designed to be used by people with varying capabilities (International Organization for Standardization, 2019). In the context of websites and other online services, the established standards for accessibility are the Web Content Accessibility Guidelines (WCAG) by the World Wide Web Consortium's (W3C) Web Accessibility Initiative (WAI). The implementation of the WCAG in the design process are meant to ensure that people with impairments of any kind, including mental health conditions, can access, interact with and contribute to web environments without facing any barriers (Kirkpatrick et al., 2018). EconBiz offers a statement on accessibility, which unfortunately only mentions the ZBW website. Assuming that the same accessibility standards were observed in the design of EconBiz, it can be concluded that the aim was to implement an accessibility level in line with European and German standards and laws, specifically in accordance with the Disability Equality Act (BGG) and the Barrier-Free Information Technology Ordinance 2.0 (BITV 2.0), which is a requirement for websites by publicly funded institutions in Germany and the European Union (Leibniz Information Center for Economics, 2022b)).

## ***Search & access***

EconBiz offers a full range of advanced search capabilities for literature searching. In the main search bar, it is possible to use Boolean operators, specify the field you would like to search (title, subject, author, publisher, ISBN, etc.), to limit the search to open access materials only, and to view your search history. An advanced search form is also offered which guides the user to combine search terms from various fields or to limit sources by language, format of publication, source, date, etc. After running the search many of the same limits as well as additional limits are available to use as filters to narrow results. There is also a similar items menu to find publications with a similar subject or by similar authors.

Items are easy to identify with the use of icons that visually represent the format (book, article, etc). Icons are also used to help indicate availability based on a user's IP

address. Open access material generally includes a PDF. EconBiz aims to provide the best possible access to a publication independent of the format of the publication and the location of the user (Pianos & Klemenz, 2017). For licensed materials links are provided to Google Scholar, WorldCat, Karlsruhe Virtual Catalog, DOIs, and fee-based document delivery for Germany. Users accessing the portal from their institution will have automatic access through IP or VPN. For access issues and questions there are extensive access related tutorials and FAQs as well as live chat.

## ***Pricing & openness assessment***

Access to the entire platform is free of charge without any restriction. However, it is important to note that this does not mean that it is also open by definition. Since EconBiz is a portal that combines various features of open services, including unrestricted free access to the entire site, indexing of OA publications, the inclusion of OER materials, and a focus on accessibility and usability, an appraisal in terms of openness will be part of this review.

## ***Open Source***

The platform in its entirety does not qualify as open-source software because its source code is not published under an open-source license (Open Source Initiative, 2007). However, its discovery module for academic publications is based on VuFind, which is an open source solution released under a GPL open source license, that is based on SolR, which is also an open source solution. SolR itself was also the technology that powered the EconBiz discovery module before the switch to VuFind in 2013 (Pianos & Klemenz, 2017).

## ***Open Access***

The label open access is mostly associated with the open availability of scholarly publications and data, not with a product like EconBiz. Therefore, open access is assessed as a secondary feature, e. g. whether and how such publications can be found in the portal's discovery service.

The platform features an integration of EconStor, ZBW's subject-specific open access repository. Under "Selfpublishing", EconBiz users are invited to integrate their content into the portal, by uploading it to the repository. With this role as facilitator and connector, EconBiz could be seen as part of the Open Access publishing ecosystem. Not all indexed literature is freely accessible, but open resources can be found through a filter.

## ***Open Educational Resource***

As a blended product that, in addition to the central discovery function for subject-specific scholarly literature, offers a considerable range of additional features and content, EconBiz contains modules that can be defined as Open Educational Resources (OER), for example the EconBiz Academic Career Kit which has an OER CC-BY license (Leibniz Information Center for Economics, 2023b). The platform in its entirety does not meet the 2019 UNESCO definition of an Open Educational Resource (OER) in the strict sense, as no open license has been granted for the overall content (UNESCO, 2019). A traditional copyright notice reserves all rights to the ZBW but indicates exceptions for content that is under an open license.

## ***UN Sustainable Development Goals (SDGs)***

The United Nations' 2030 Agenda for Sustainable Development aims to provide inclusive, equitable, and high-quality education for all, alongside lifelong learning opportunities. Sustainable Development Goal (SDG) 4 focuses on this objective, with tertiary education emphasized in SDG 4.3. Other interconnected SDGs, such as promoting research and innovation (SDG 9), reducing inequalities (SDG 10), ensuring public access to information (SDG 16.1), and forming partnerships (SDG 17), are also vital for advancing education and scientific progress (United Nations, 2015).

A free and partially open resource like EconBiz can promote research and innovation (SDG 9) by offering a wealth of knowledge to individuals and institutions, especially those in developing countries. It can help reduce inequalities (SDG 10) by providing access to information for those who might not have the means to access expensive, proprietary

resources. By ensuring public access to information (SDG 16.1), it supports fundamental freedoms and encourages collaboration and partnerships (SDG 17) among various stakeholders, including its strong international network of academic partner institutions (Demirhan & Pianos, 2016). Recognizing this contribution to the implementation of Agenda 2030, a free and partially open resource that has been available sustainably and reliably for over 20 years can still make a meaningful contribution to the SDGs, even if it does not strictly meet all the openness criteria.

## ***Competitor products***

Due to the nature of the portal and the wide variety of resources and services, it is challenging to define an exact comparable product for EconBiz.

### ***Google Scholar***

Given the free nature of this resource, citation search engine Google Scholar is an obvious competitor. Google Scholar is easy and free to search and indexes a wide variety of materials just like EconBiz. Both products include articles, books, working papers, dissertations, and other non-commercially published material. EconBiz provides considerably more advanced search options and ways to filter your search than Google Scholar. EconBiz is also independent, publicly funded and therefore more transparent about ranking of search results. A term frequency-inverse document frequency text matching approach is used, and the documentation provided also shares that open access and recent documents are preferred in the rankings (Leibniz Information Center for Economics, 2012). Whereas Google Scholar is known to favor highly cited publications but provides little in the way of documentation (Krüger, 2017). Sources in EconBiz are indexed with controlled vocabulary and members of the EconBiz team are available via chat and e-mail to support users (Krüger, 2017). Finally, as a multidisciplinary resource Google Scholar provides broad coverage. Depending on a researcher's topic, the use of a specialized database can gain better results than a search engine that contains publications from all disciplines.

## ***Other products***

Other comparable products would be discipline specific economics and business indexing and abstracting databases such as EBSCO's Business Source Complete, ProQuest's ABI Inform, or EconLit. The main difference is that researchers are not able to search these databases unless they subscribe or have access through an institution. Furthermore, these databases all provide different coverage in terms of working papers, dissertations, trade literature, and book records.

Another tool worth mentioning is Lens.org. Lens.org is a free and open academic discovery service provided by the Australian non-profit organization Cambia. Initially launched in 1998 as a patent database, its coverage has since been expanded to include bibliographic and citation data on academic publications. Lens.org's data core is aggregated from various open sources, resulting in one of the biggest corpora of scholarly publications on the (Penfold, 2020). The user interface offers advanced search functions and filtering options that go beyond Google Scholar's filtering capabilities in terms of granularity and outperform EconBiz search as well. Its overall usability earned Lens.org a best practice ranking in a 2019 study (Bosman, 2019). At the time of this review, Lens.org indexes over 2 million publications in business & economics, well over 500,000 of which are open access. With its broad coverage of scholarly publications including working papers and other grey literature, its various subject classifications, and its numerous faceting and filtering options, this interdisciplinary tool is another alternative to EconBiz and Google Scholar. The high discrepancy between the corpus of publications indexed in EconBiz in business and economics and that of Lens.org suggest that EconBiz, due to its historically grown discipline-specific, highly specialized database structure with its well-established network of other specialized catalogs, is still leading in its field in terms of coverage and depth.

## ***Who would benefit from EconBiz?***

Students can benefit from EconBiz for finding relevant and quality literature for assignments and papers, wherever they are, and using the simple search and filter options.

Early career researchers can further benefit thanks to the inclusion of working papers, the Academic Career Kit and the conference calendar.

Community researchers and practitioners can also benefit from the open nature of this resource where their workplaces or personal resources may not provide them with access to high quality business and economics papers.

Furthermore, because it offers an OER research toolkit, librarians and instructors can repurpose this content for teaching information literacy and other topics in the business and economics contexts within their curriculum, while community researchers can benefit from this learning directly.

## ***The bottom line***

EconBiz is a compelling product for librarians to promote with students and researchers. This multi-purpose, but subject-wise narrowly focused service offers valuable content for academic audiences and has relevance beyond the business and economics community. Given the open access nature, institutions don't need to subscribe to the product but it may provide a nice alternative or complement for researchers used to looking in Business Source Complete, EconLit, or ABI Inform. Additionally, it has the benefit of being something librarians can promote to entrepreneurs and other community researchers as well as a resource for searching grey literature more systematically than Google Scholar.

## References

- Blummer, B., & Kenton, J. M. (2021). Academic and research libraries' portals: A literature review from 2003 to the present. In Information Resources Management Association (Ed.), *Research anthology on collaboration, digital services, and resource management for the sustainability of libraries* (pp. 847–874). IGI Global.  
<https://doi.org/10.4018/978-1-7998-8051-6.ch047>
- Bosman, J. (2019). Scholarly search engine comparison. <https://docs.google.com/spreadsheets/d/1ZiCUuKNse8dwHRFAyhFsZsl6kG0Fkgaj5gttdwdVZEM/edit#gid=1016151070>
- Demirhan, A., & Pianos, T. (2016). International cooperation among libraries. *International Leads*, 30(1), 6–7. <https://hdl.handle.net/11108/247>
- Horstkemper, G. (2014). Virtuelle Fachbibliotheken, virtuelle Forschungsumgebungen und digitale Wissenschaft. In R. Griebel, H. Schäffler, & K. Söllner (Eds.), *Praxishandbuch Bibliotheksmanagement* (pp. 538–555). De Gruyter.  
<https://doi.org/10.1515/9783110303261.538>
- International Organization for Standardization. (2019). Ergonomics of human-system interaction—Part 210: Human-centred design for interactive systems (ISO 9241-210:2019). <https://www.iso.org/standard/77520.html>
- Kempf, K. (2006). Vascoda and the subject-based gateways—The German answer to visibility and accessibility in collection development. *LIBER Quarterly: The Journal of the Association of European Research Libraries*, 16(3–4).  
<https://doi.org/10.18352/lq.7865>

Kirkpatrick, A., O Connor, J., Campell, A., & Cooper, M. (Eds.). (2018). Web Content Accessibility Guidelines (WCAG) 2.1. World Wide Web Consortium.

<https://www.w3.org/TR/WCAG21>

Krüger, N. (2017). What Google can(t) do: Comparison of the scholarly search in EconBiz and Google Scholar. Leibniz Information Centre for Economics.

[https://www.econbiz.de/eb/fileadmin/user\\_upload/pdfs/2017\\_EconBiz\\_oder\\_Google\\_ENGLISCH\\_v2.pdf](https://www.econbiz.de/eb/fileadmin/user_upload/pdfs/2017_EconBiz_oder_Google_ENGLISCH_v2.pdf)

Leibniz Information Center for Economics. (2012, July 12). How does the EconBiz relevancy ranking work? EconBiz. [https://www.econbiz.de/eb/fileadmin/images/hilfetexte/relevancy\\_ranking\\_EconBiz\\_about\\_02.pdf](https://www.econbiz.de/eb/fileadmin/images/hilfetexte/relevancy_ranking_EconBiz_about_02.pdf)

Leibniz Information Center for Economics. (2019, August 16). EconBiz author profiles. EconBiz. <https://www.econbiz.de/eb/en/beta/econbiz-author-profiles>

Leibniz Information Center for Economics. (2022a). STW thesaurus for economics. <http://zbw.eu/stw/version/latest/about.en.html>

Leibniz Information Center for Economics. (2022b, January 14). Accessibility. EconBiz. <https://www.econbiz.de/eb/en/accessibility>

Leibniz Information Center for Economics. (2022c, October 6). Included journals and databases. EconBiz. <https://www.econbiz.de/eb/en/hilfe-datenbanken>

Leibniz Information Center for Economics. (2023a, March 20). About EconBiz: EconBizPortal. <https://www.econbiz.de/eb/en/about>

Leibniz Information Center for Economics. (2023b, March 20). Academic career kit. EconBiz. <https://www.econbiz.de/eb/en/research-skills/academic-career-kit>

Leibniz Information Center for Economics. (2023c, March 20). Test your research skills.

<https://www.econbiz.de/eb/en/research-skills/test-your-research-skills>

Open Source Initiative. (2007, March 22). The open source definition. <https://opensource.org/osd>

Penfold, R. (2020). Using the Lens database for staff publications. Journal of the Medical Library Association : JMLA, 108(2), 341. <https://doi.org/10.5195/jmla.2020.918>

Pianos, T. (2010). EconBiz—Meeting user needs with new technology. LIBER Quarterly: The Journal of the Association of European Research Libraries, 20(1), 4–24. <https://doi.org/10.18352/lq.7972>

Pianos, T. (2015). We all do better when we work together – The international EconBiz partner network: Improving research, access to subject information and international cooperation in economics and business studies. Proceedings of the Annual IATUL Conference 2015. <https://docs.lib.purdue.edu/iatul/2015/sp/4>

Pianos, T., & Klemenz, A. M. (2013). “Machen Sie doch was Sie wollen!”- die EconBiz API schafft neue Nutzungszusammenhänge. BID Kongress, Leipzig, Germany. <https://opus4.kobv.de/opus4-bib-info/frontdoor/index/index/docId/1327>

Pianos, T., & Klemenz, A. M. (2017). EconBiz-Experiences: Creating our own discovery system for business & economics. IFLA WLIC 2017, Warsaw, Poland. <https://library.ifla.org/id/eprint/1839>

Seefeldt, J., & Syré, L. (2020). Portals to the past and to the future: Libraries in Germany (5th edition). Georg Olms Verlag. [https://bideutschland.de/wp-content/uploads/2021/11/Portale\\_englisch-5.-Aufl-2020.pdf](https://bideutschland.de/wp-content/uploads/2021/11/Portale_englisch-5.-Aufl-2020.pdf)

UNESCO. (2019). Recommendation on Open Educational Resources (OER). UNESCO.

<https://www.unesco.org/en/legal-affairs/recommendation-open-educational-resources-oer>

United Nations. (2015). Transforming our world: The 2030 Agenda for Sustainable Development (A/RES/70/1). <https://sdgs.un.org/2030agenda>

