

## ***JOURNAL OF CIVIL ENGINEERING AND MANAGEMENT: A brief overview of the development of the Journal***



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We are sure that the Members of our Working Group are well aware of the *Journal of Civil Engineering and Management* (JCEM) that is closely related to the topics of their research. Nevertheless, this time we would like to present a brief overview of its development due to two important facts that happened in 2021:

(1) Looking from its origins, the *Journal of Civil Engineering and Management* has reached an important milestone this year, its 55th anniversary.

(2) Considering a new stage in the development of the journal after the JCEM was indexed by Web of Science in 2008, the 1000th article was published in 2021.

It turned 55 years since it has been started to publish series of studies of Civil Engineering: Collection of Mechanics, Reinforced Concrete Structures (both from 1967), later Building Materials and Structures, Building Structures, Building Economy and Organization, Building Economy and Management, Construction Technology and Management, Structural Repair and Strengthening.

In 1995, all these series of studies were combined into a single periodical research journal under the title in Lithuanian *Statyba* (*Eng. Civil Engineering*). Seven volumes, consisting of 4–6 issues, were published in 1995–2001.

In 2002, the journal was renamed to *Journal of Civil Engineering and Management* (JCEM) and started publishing papers only in English.

In 2008, the journal started the 5th decade of its history. Due to this occasion, Editorial paper was published in the 1st issue of 2008 [1]. Founder and Editor-in-Chief of the journal Prof.

Edmundas Kazimieras Zavadskas overviewed the development of the Journal in 40 years from its origins.

During the period of 2002-2008, the journal made a remarkable progress. In 2008 it reached a new stage of development: JCEM was indexed by Thomson Reuters (currently Clarivate Analytics) Science Citation Index (SCI) data base. The way to this achievement is overviewed by Edmundas Kazimieras Zavadskas in the 4th issue of 2008 [2]. Here you can explore accumulative increment of JCEM papers cited in Web of Science journals in 2002–2008.

Since 2011, the journal began to be published jointly by Vilnius Gediminas Technical University Press and Taylor & Francis. Electronic peer review and publishing platforms were launched and the number of submissions as well as internationalization of authors and reviewers increased. Therefore, the Journal's visibility expanded in the international academic world.

In 2014, the development results of the period were summarized in Editorial due to the 20th anniversary from beginning of a single periodical journal instead of several series of publications under the title of *Statyba (Eng. Civil Engineering)* and later *Journal of Civil Engineering and Management* [3]. If earlier the majority of papers were authored by Lithuanian researchers, the six years of indexing in Web of Science data base resulted more than 70 percent of foreign authors from 47 countries all over the World [3].

Starting 2018, the *Journal of Civil Engineering and Management* has been published entirely by Vilnius Gediminas Technical University Press. Our emphasis is now on publishing the highest quality articles and making them freely available to researchers worldwide. Now JCEM is published as an Open Access journal. The papers are published under a licence CC BY 4.0, which permits unrestricted use and distribution, provided the original author and source are credited. This ensure that the journal and the articles it publishes are free for all to read, which greatly improve the journal's impact and reputation. We were happy to announce these improvements in Editorial, intended for 25th anniversary from beginning of a single periodical journal and published in 2019 [4].

In the same year 2019, a comprehensive analysis and summary of the journal from the perspective of bibliometric was conducted [5]. The information analysed in this study were JCEM publications (only articles and reviews) indexed in Web of Science data base and dating between 2008 and 2018. Firstly, the general citation structure and basic characteristics of the JCEM journal were investigated. Then, the most influential institutions, countries as well as their networks of cooperation were identified. Finally, the main research topics of the JCEM journal were explored by using the frequently used keywords.

According to the data retrieved on January 25th, 2019, the most productive institutions during 2008-2018 and their cooperation network in JCEM publications is presented in Fig. 1.

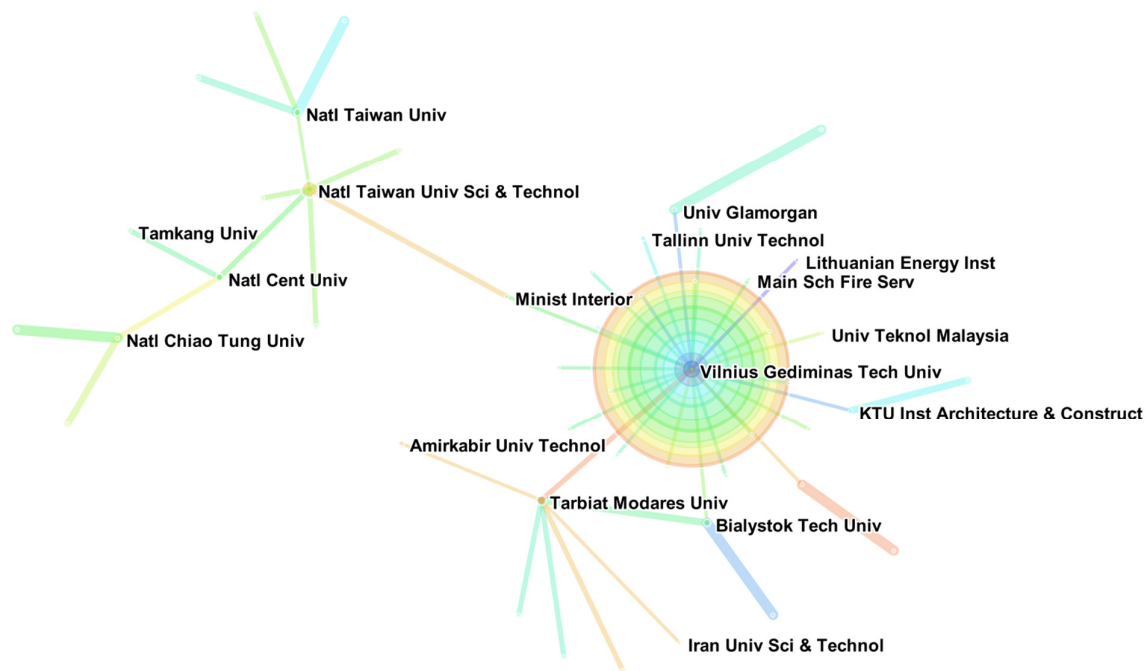


Figure 1. The biggest cooperation network at the institution level [5]

Regarding the most frequent topics of papers during 2008–2018, ‘concrete’ is the most frequently used author keyword in the JCEM journal. Some other keywords are ‘construction industry’, ‘construction management’, ‘reinforced concrete’, ‘compressive strength’, ‘MCDM’, ‘simulation’ and ‘optimization’ (Fig. 2).

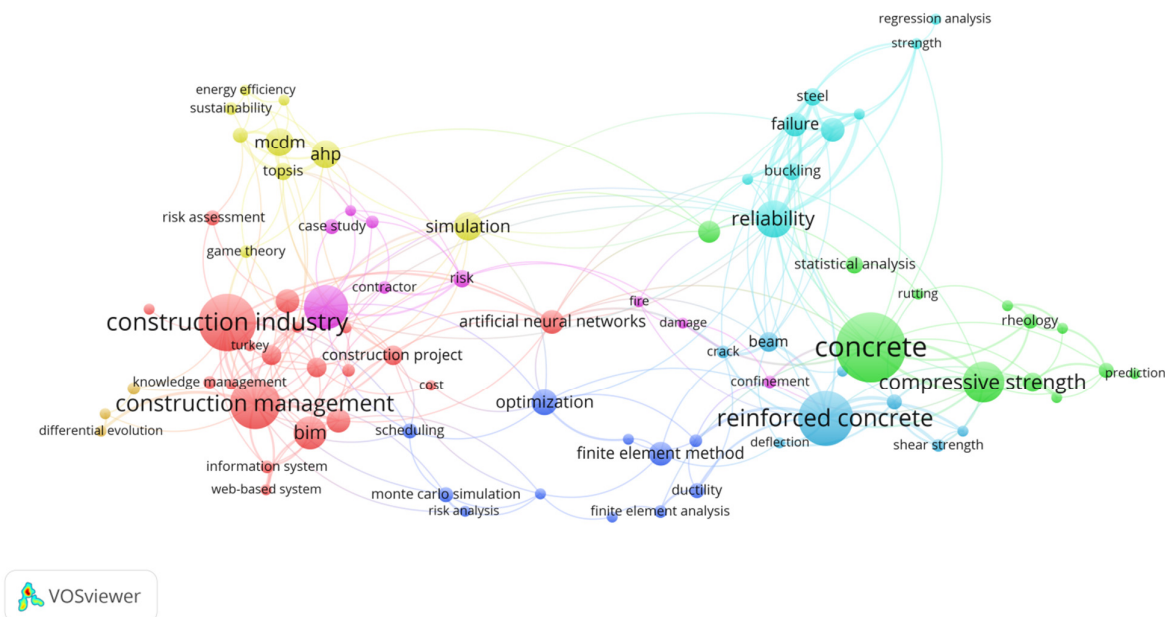


Figure 2. Co-occurrence of author keywords [5]

So far, the JCEM has published more than 1000 papers indexed in Web of Science data base since 2008. The 1000th paper was published in Vol. 27, issue 7, 2021. The latest available Clarivate Analytics Impact factor (2020)  $IF = 2.957$ . The Journal is currently ranked in the 56th position worldwide among 137 journals in “Engineering, Civil” Web of Science category and it is in the second quartile (Q2) of journals based on its worldwide impact in the category. This is resulted by times cited and publications over time (Fig. 3).

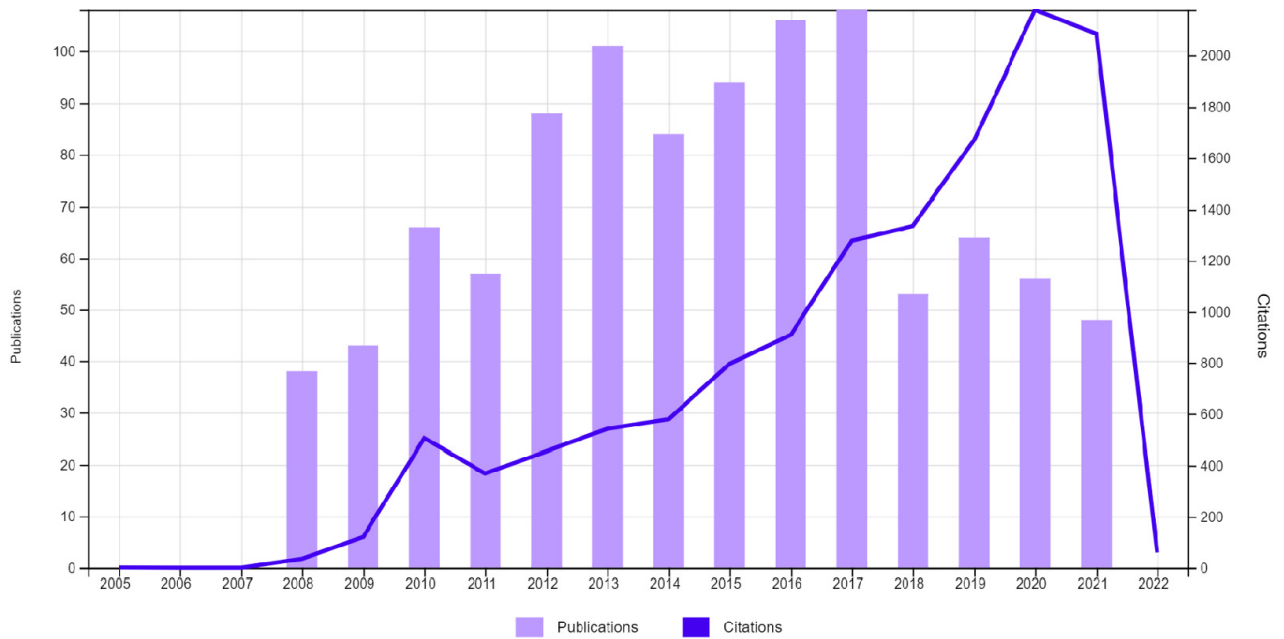


Figure 3. Times cited and publications over time [6]

Since 2020, Prof. Artūras Kaklauskas became the Editor-in-Chief of JCEM. The scope of the journal was extended by modern research topics in civil engineering. Currently *Journal of Civil Engineering and Management* publishes articles in the following fields: all stages of the building life cycle, affective computing, BIM, building materials and structures, constructions technology, construction economy and management, digital twin, fire protection, thermoinsulation and renovation of buildings, geotechnical engineering, information technologies in construction, intelligent decision support systems, IoT, labour safety in construction, operational research, road and bridge engineering, robotics, smart built environment, structural mechanics and physics, urban engineering and economy. The analysis of keywords shows that currently the main highly cited keywords are construction, project, analysis, model, concrete, optimization, development. The authorship of recent papers also significantly changed compared to previous decades. An analysis of the institutions of articles accepted in 2021 shows that 43 percent of the accepted articles are from institutions ranked in the TOP500 of the QS World University Ranking [7].

The Editors would like to express their sincerest gratitude to all those who have contributed to the success of the Journal, its quality and significance in the academic world. We are grateful to the Advisory Editors and the Editorial Board members for many years of cooperation and contribution in ensuring the quality of the Journal. We greatly appreciate efforts of Reviewers in providing valuable comments and suggestions aimed at improving the quality of submissions. Special thanks go to Researchers for choosing the *Journal of Civil Engineering and Management* to publish their research findings.

The authors of this brief overview invite all Members of our Working Group and all those interested in topics of civil engineering and management to access the full-text articles for deeper analysis:

<https://journals.vgtu.lt/index.php/JCEM>

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