



Modern Trends In Development Of Scientific And Technical Terminology In Architecture And Construction

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Annotation: The paper is an analysis of current changes and developments in the field of terminology in construction science and technology. The study focuses on the influence of contemporary technological changes and innovations on the formation of new terms, their usage in scientific and engineering areas of construction, as well as the interrelation between technological development and terminology evolution.

Keywords: Scientific and Technical Terminology, Construction, Innovations, Technological Development, Terminological Analysis, Evolution of Terminology, Linguistic Aspect.

Scientific and technical terminology is a set of terms used in a certain field of knowledge. The terminology of each area of knowledge is based on the conceptual connections of professional knowledge. Thus, terminology as a systematic set of terms limits and verbally enshrines the system of concepts of a particular field of knowledge. Characteristic features of the scientific and technical style are its informativeness (content), logic (strict sequence, clear connection between the main idea and details), accuracy and objectivity and clarity and clarity arising from these features [1]. In construction, as in any other field of human activity, there are own definitions, rules, concepts and quantities. Construction terms have found their wide application in architecture, construction and housing and communal services. The basic terms and definitions in construction need to know everyone who is engaged in construction and repair work. Knowledge of terminology is important in resolving controversial or conflict situations, which are initially many in repair and construction work. Therefore, knowledge is power, knowledge is money, knowledge is time. The terminology of each area of knowledge is based on the conceptual connections of professional knowledge. Thus, terminology as a systematic set of terms limits and verbally enshrines the system of concepts of a particular field of knowledge. In the article "Development of terminology as a separate discipline and its status in modern linguistics" G. G. Khakimov offers an overview of the formation and development of the theory of terminology as a separate discipline [2].

The modern construction industry is one of the most dynamic and innovative sectors of the economy, where advanced technologies, materials and methods are actively used. This constantly evolving nature of construction emphasizes the importance of scientific and technical terminology as the main tool for the transfer and exchange of knowledge in this field. In light of the ever-changing nature of the construction industry, the study of the evolution of terminology is becoming an integral part of ensuring the effective exchange of knowledge and innovation in this area.

Modern construction actively introduces innovations and advanced technologies, which inevitably affects the formation of scientific and technical terminology. Let's consider several key trends that currently have a significant impact on the development of this vocabulary in the construction industry. With the advent of new building materials, methods and machines in the construction



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industry, the need for new terms becomes an integral part of the knowledge transfer process. Innovative developments in the field of energy efficiency, unmanned construction machines, and the use of modern environmentally friendly materials require the introduction of new terms to describe them accurately.

Digitalization plays a key role in modern construction practices. The use of digital technologies such as Building Information Modeling (BIM), virtual reality, and automated control systems requires the creation of special terminology for accurate and effective communication between specialists in this field. In an increasingly global construction market, standardization of terminology is becoming a key aspect of ensuring consistency and accuracy in the exchange of information. Harmonization of terms in accordance with international standards contributes to more effective interaction between construction projects and specialists from different countries.

The analysis of these trends will allow us to understand how modern changes in the construction industry affect the formation and development of scientific and technical terminology. The specificity of construction terminology, rich in technical details and contextual nuances, poses a special challenge for translators. When translating construction terms, difficulties often arise related to the accuracy of the transmission of values and the peculiarities of use in different countries.

The modern construction industry actively interacts on the world stage, which requires the adaptation and borrowing of terms from foreign languages. This process can enrich native terminology, but also raises questions about the appropriateness and adequacy of the use of foreign elements in specific settings. The development of effective methods of training specialized terminology is an important aspect of training specialists in the construction sector. The use of modern educational technologies, including interactive applications, virtual training and online courses, can contribute to a better understanding and assimilation of construction terminology by students and professionals.

The analysis of these aspects will allow a deeper understanding of the specifics of the use and translation of terms in construction, as well as identify effective strategies for training and improving linguistic skills in this area. [3] With the development of artificial intelligence (AI) in construction, there are new terms that reflect the use of AI in the design, management of construction sites and forecasting construction risks. An example of such a term would be "construction automation," encompassing processes where AI is actively involved in optimizing construction operations.

With increasing attention to the environmental sustainability of construction, new terms appear that reflect trends in the direction of "green construction." The example includes the term "energy efficient materials" describing building materials that contribute to reducing energy consumption in buildings. With the advent of technologies aimed at creating sustainable and environmentally friendly construction projects, new terminology is being formed. An example would be the term "green technologies in construction," encompassing methods and technologies aimed at reducing the negative environmental impact of construction.

The analysis of these examples reflects the technological challenges and prospects for the development of terminology in construction, illustrating how new phenomena and technologies are reflected in the vocabulary of this industry.

An important aspect of the development of scientific and technical terminology in construction is the availability of modern terminological resources and dictionaries specialized for this industry. Consider several significant aspects in this area. - Electronic resources and online dictionaries



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With the development of digital technologies, the use of electronic terminology resources is becoming more and more accessible. Online dictionaries and databases focused on construction terminology provide convenient and relevant resources for professionals and students, allowing you to quickly find and check terms.

- Multilingual resources and translation of terms.

Due to the globalization of the construction industry, multilingual resources and dictionaries play an important role. They provide translation of terms between different languages, which becomes necessary in the context of multinational construction projects and cooperation.

- Innovation in training and support for terminological education. The development of innovative training methods, including virtual platforms and online courses, also contributes to improving the level of terminological literacy in the construction industry. Terminology education support includes the development of training materials, games and applications to effectively learn specific terms.

An overview of terminology resources and innovative training approaches allows us to highlight current trends in the field of support and development of construction terminology. [4] In modern construction, like many other areas, there is a rapid development, the introduction of new technologies and a change in approaches to solving problems. These changes are inevitably reflected in scientific and technical terminology, making it dynamic and lively. During the analysis of technological challenges and development prospects, we identified several key aspects.

Firstly, artificial intelligence is becoming increasingly important in construction, which is reflected in the emergence of new terms describing automated processes and the application of algorithms in various areas of the construction industry. Secondly, the emphasis on environmental sustainability and green construction forms a new vocabulary related to energy efficient technologies, the use of natural materials and the consideration of environmental aspects in construction projects.

Thirdly, electronic resources and online dictionaries provide convenient tools for working with terminology in construction. Multilingual resources play an important role in the context of international cooperation, facilitating communication between specialists from different countries. Finally, innovation in teaching and support for terminological education are becoming fundamental to improving linguistic literacy in the construction industry.

Summarizing the above, it can be argued that scientific and technical terminology in construction is in constant change, and awareness of current trends and innovations in this area is an important aspect for specialists, students and everyone associated with this industry.

LITERATURE

1. Myakisheva E.A. Stylistic features of the scientific and technical text//Humanitarian scientific research. 2018. No. 5 [Electronic resource]. URL: <https://human.snauka.ru/2018/05/25006> (access date: 07.11.2023).
2. Khakimova, G. G. Development of terminology as a separate discipline and its status in modern linguistics [Text]/G. G. Khakimova//Bulletin of Bashkir University. - 2012. - T. 17, NO. 2. - S. 950-954
3. Danilina, Julia Sergeevna. Actual problems of the development and current state of the German terminology of agricultural engineering: dissertation... candidate of philological sciences: 10.02.04/Danilina Julia Sergeevna; [Place of protection: Om. state technical un-t] .- Omsk, 2011.- 167 p.: ill. RSL OD, 61 12-10/77



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4. Taranova E.N. Problems of modern theoretical terminology, achievements and shortcomings of terminological research/Scientific statements of BelSU. Humanities series. – 2011. - No. 24 (119) Issue 2. -C. 142-149
5. B. Dekhkanov, N. Usanova Composition of the composition of neologisms in the formation of advertising slogans of industrial and architectural goods. Eastern Renaissance: Innovation, Education, Natural and Social Sciences. pp. 859-862.
6. Dekhkanov B. Introduction of architectural terminology into the Russian language. Eastern Renaissance: Innovation, Education, Natural and Social Sciences. 2022. S. 294-294.