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Metonymy in Scientific Linguistic Discourse

Alla Gabidullina

Donbas State Pedagogical University, Bakhmut, Ukraine

Anastasiia Sokolova

Donbas State Pedagogical University, Bakhmut, Ukraine

Elena Kolesnichenko

Donbas State Pedagogical University, Bakhmut, Ukraine

Marina Zharikova

Donbas State Pedagogical University, Bakhmut, Ukraine

Oleh Shlapakov

Donbas State Pedagogical University, Bakhmut, Ukraine

Abstract---The purpose of the article was to show the features of the functioning of different types of metonymy in scientific linguistic discourse, which is understood as a verbalized epistemic situation common to the scientific sphere of communication, taken in the entire totality of linguistic and extralinguistic factors and enshrined in the form of texts (oral and written ones). The article deals with metonymy from the point of view of langue / parole: lexicalized metonymy in langue is a semantic transposition mechanism on contiguity and carries out a terminological nomination; discursive metonymy in parole becomes the result of syntagmatic contiguity of syntactic constructions. Linguistic metonymic terms are grouped by types of knowledge: declarative and procedural ones. The shifts of meaning between the logical terms "object", "subject", "general" and "specific", "abstract" and "concrete", "form", "content", etc., directed towards each other, are observed in metonymic terms of declarative type. Metonymy can reflect the processes due to the causality between adjacent objects. Transitional phenomena between lexicalized (linguistic) and discursive (speech) metonymy reflect those models that contain onyms; they are related to the designation of the subject of knowledge (linguist) and his scientific discovery. The discursive metonymy regularly arises on the basis of syntactic units (phrases and sentences); it is usually the result of their reduction.

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Corresponding author: Gabidullina, A.; Email: gabidullina7619@tanu.pro

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Introduction

Metonymy has long attracted the attention of researchers. As a rule, it is regarded as a trope, a means of creating all sorts of stylistic effects. The object of the study is the varieties of artistic, political, journalistic, colloquial, every day and other types of discourse (Yunusova, 2021). At the same time, metonymy, which is characteristic of scientific texts, rarely comes to the attention of linguists due to its logic and predictability, as well as due to the fact that the potential for using metonymic models in this area is limited by the maximum number of connections between two phenomena. The main attention is paid to its use in natural science, technical (Krymets, 2010; Romanova, 2011; Gorokhova, 2012) and some sociohumanitarian, for example, economic (Orlova & Kuznetsova, 2018), legal (Ikonnikova, 2011), etc. discourses. Little has been written about metonymy in linguistic texts (Gabidullina, 2016; Gabidullina, 2016; Kolesnichenko, 2018; Sokolova, 2018), although this type of secondary nomination is quite regular in them and is used to display the facts of language and speech. As a result, not all possible metonymic types have been identified, and those that are described remain practically unknown to many linguists.

Depending on the sphere of communication, metonymy is divided into the following types:

- scientific (scientific-theoretical), which implements research goals and verbalizes new scientific knowledge;
- scientifically informational (informationally abstract: abstracts, reviews, summary annotations);
- scientifically evaluative (presented in reviews, reviews, expert opinions, polemical speeches, discussions);
- popular science (scientific and journalistic), created for the purpose of mass dissemination, popularization of scientific information about the language;
- scientific and educational, created specifically for educational purposes and addressed to future specialists, focused on the presentation of the basics of sciences.

Metonymic transfer occurs in several planes. We will consider those that are defined by the "langue / parole" dichotomy: in langue, *lexicalized metonymy* is a mechanism of semantic transposition by adjacency and carries out terminological nomination; in parole, *discursive metonymy* becomes, as a rule, the result of syntagmatic adjacency of syntactic constructions (Yang, 2013; Lu et al., 2019). In the actual scientific and scientific-abstract linguistic discourses, lexicalized (semantic) metonymy, fixed in dictionaries of linguistic terms, prevails. It performs referential and identifying functions in scientific linguistic discourse, allowing one entity to replace another (Brdar-Szabó & Brdar, 2012). It is quite difficult to define it among polysemantic terms, since it is usually not accompanied *by a pen mark*. In addition, there are cases when the metonymic meaning is not recorded in the reference literature at all (McLachlan, 2021; Smola, 2018; Bibri, 2018).

The polysemy of terms is defined by specialists both as polysemy and as ambiguity (heterogeneity of meaning, ambiguity, variability, semantic derivation, modulation, etc.). This is due to the uncertainty of the semantic scope of the term or its ability to refer to several denotations at once, which is due to different views of scientists on the relationship of the term and the concept. The very phenomenon of ambiguity is called conceptual polysemy (Lyashchuk, 2018), cognitive polysemy, ambisemia (Tatarinov, 1996), etc. Conceptual polysemy manifests itself: 1) between linguistic terms and common vocabulary; 2) between linguistic terms and terms of other industry terminologies (intersystem polysemy); 3) between terms of the linguistic term system (intrasystem polysemy) (Volodina, 2014; Usatyy, 2009).

The purpose of the article is to show the peculiarities of the functioning of different types of metonymy in scientific linguistic discourse, which is understood as a verbalized epistemic situation characteristic of the scientific sphere of communication, taken in the whole set of linguistic and extralinguistic factors and fixed in the form of texts (oral and written) (Kong & Qin, 2017).

Typology of lexical metonymy

The first type of polysemy is the terminologization of common vocabulary, which takes place in three stages (Kosova, 2004). At the first stage there is narrowing of the standard terminology the meanings of words (usually for General scientific vocabulary): category, model, sign, tools, communication, etc. Common vocabulary retains its value and is used in linguistic texts to describe the semantics of language units: category of the verb; external to the subject matter of necessity or impossibility passed dative-infinitive construction. At the second stage of terminologization, the categorical seme remains unchanged, but integral signs and differential semes appear in terms and common words, and their rearrangement is observed in the semantic structure of common vocabulary. Thus, a noun "primitive" can denote both 'any phenomenon, initial, undeveloped, simple in comparison with subsequent phenomena of the same kind', and 'the simplest in meaning, further semantically indecomposable words or words that, in addition to semantic indecomposability, must have the property of translatability into other languages'. Combining the commonly used word and term here are the signs of the 'abstractness' of the substance and the 'way of its perception'. Additional differential semes are 'semantic indecomposability' and 'mutual translatability' (Aripov, 2021).

At the third stage, transformations in the semantic structure of lexemes lead to a change in the categorical lexical seme, the formation of a new lexical meaning, the appearance of homonymous terms (Lopushanskaya, 1996). So, the verb *to control* in the meaning of ' using any devices, to direct the course, movement, work of something-L.'refers to the field "activity, action". Then there is a metaphorical transfer with the meaning 'to lead, to direct the work of someone' (the verb goes into the field "attitude"). In the scientific linguistic discourse, the lexeme *to manage* acquires the meaning of "to demand a certain control after itself": the verb remains within the field of "relation", but the nature of the relationship here is different – it is a "type of compatibility based on the subordinate connection of language units". The term belongs to the subfield "relationship" (Kosova, 2004).

Another example: $adverb^1$ is a lexical and grammatical category of words that arose on the basis of prepositional and non-prepositional forms of the noun and adjective, an unadjusted and non-declinable part of speech that has a special word formation and syntactic function of the circumstance, denoting a sign of an action or state' and $adverb^2$ 'in general linguistics: combining close territorial dialects; dialect, the language spoken by the population of a particular territory' (Zherebilo, 2016).

Terminologization involves not only the transition of commonly used words into a special vocabulary, but also their further development as terms, the appearance of new meanings that can contribute to the ambiguity of special words. This phenomenon reflects the differences in the ideological, methodological, cognitive attitudes of the authors, different visions of the same object of knowledge, differences in the division of the semantic meta-space of science. For example, the term frame is interpreted in cognitive science and linguistics as: 1) the system of choice of language means - grammatical rules, lexical units, language categories associated with the prototype of the scene); 2) a set of standardized knowledge about phenomena that have a complex multi-component structure, a holistic view of a rich-level concept); 3) a unit of knowledge organized around a concept containing information about the essential, typical, possible for this concept within a certain culture; 4) a cognitive model representing knowledge and assessments related to specific, frequently repeated situations. Thus, intersystem polysemy arises if the term functions in different industry terminologies (Rogach, 2000): method, paradigm, etc.: function [lat. functiono dispatch, execution]: 1) purpose; role; 2) in linguistics, the frame reflects the correspondence between the form and the meaning of language units (Zherebilo, 2016).

This type of polysemy often occurs when the same phenomenon of language becomes the object of study of several sections of linguistics. There are different sides to the scientific concept. For example, *a phrase* in phonetics is 'a segment of speech that represents an intonation-semantic unity, highlighted on both sides by pauses', and in syntax it is a synonym of a sentence. The term *suffixless* in morphemics is 'one that is not based on a suffix' and in word formation – 'not using suffixes as a word-forming means'. Different meanings of the term in intersystem (intersectoral) polysemy can be recorded in dictionaries of linguistic terms, but more often they are defined directly in the text.

Intra-system polysemy in linguistic terminology arises as a result of metonymic transfers of names. This type of categorical ambiguity is based on the fact that the content of some concepts consists of features that simultaneously belong to several conceptual categories: action and result, action and object, properties and quantities, etc. So, even in ancient Greek philosophy, the metonymic model "science (section of science)" was productive \rightarrow "the object of science", on the basis of which the terminology of European languages was subsequently formed: *idiomatics* ('a section of linguistics that studies idioms') \rightarrow *idiomatics* ('a set of idioms of a given language'), and the meaning of 'science' was historically the first. All types of conceptual polysemy can be seen in a multi-valued term. As an example, we give the term *transcription*. It is typical not only for linguistics, but also for art history and biology. In art history, this is 'the arrangement of a musical work for performance by another instrument or voice or its free virtuoso

processing'; in biology, it is 'the first stage of the implementation of genetic information in a cell, during which the DNA nucleotide sequence is'rewritten 'into the RNA nucleotide sequence'. In linguistics, the term (phonetic or phonemic) *transcription* is interpreted in different ways. In the "Linguistic Encyclopedia" by Selivanova (2011), it has two meanings: '1. A special method of recording in writing the sound signs of the pronunciation of a word or certain fragments of speech. 2. A method of transmitting foreign words in the borrowing language based on the sound composition of the word in the donor language. In the "Dictionary of Linguistic Terms" Zherebilo (2016), gives three meanings: 'Transcription (Latin transcriptio -' rewriting'). 1. A spelling that is used for scientific purposes and aims to give as accurate a record as possible of all the subtleties of the pronunciation of a language, regardless of its graphic and spelling norms. For example: crown [karonb]. 2. Transfer of foreign-language proper names, geographical names and scientific terms with the letters of this language. 3. A set of special characters for such an entry. In the O. S. dictionary Akhmanova (2004) adds a fourth meaning 'the same as phonetic transcription'. All these values are combined by the archiseme – 'processing, transcription'. There is an intersystem (interscientific) polysemy.

Then the nature of polysemy in different publications begins to differ. In the dictionaries by Selivanova (2011), Rosenthal & Telenkova (1985), reflects the narrowing of the meaning of the word, the restriction of the transcription process to borrowed words. In the dictionary by Zherebilo (2016), shows not only the narrowing of the meaning of the term (values 1 and 2), but also the process of metonymic transfer (1 and 3): *the process* \rightarrow *tool model* (intra-system polysemy). In the dictionary by O.O. Selivanova the first (general) and fourth (particular) meanings of the term *transcription* are in the relations of inclusion (synecdoche).

Thus, metonymic transfers are characteristic of intra-system polysemy. The name of the original value is used to nominate the semantic transformation / modification of this value. In the conceptual field of the term, certain logical connections may arise between semantic categories, which denote: 1) subject, 2) process, 3) result, 4) property, 5) tool, 6) attribute, etc. It is these logical categories in the system of the linguistic terminological tier of the language that are the basic ones for metonymic shifts. The content of the concept consists of features belonging to several categories at the same time. Regular polysemy presupposes the repeatability of semantic relations between the generating and derived word, which is caused by the uniformity of the generating meanings, the uniform nature of the semantic shift and, as a result, the uniformity of derived meanings (Shelov, 2003).

Transformations in linguistic metonyms-terms occur between semantic categories (process \rightarrow result, whole \rightarrow part, object \rightarrow tool, etc.). They are the largest elements of the value. The remaining semes of the word-term can be designated as markers and distinguishers (Ginzburg, 1978). Markers indicate features common to a certain class of lexical units, and distinguishers individualize them. For example, the term *isogloss* has two meanings: 1)' a dialect phenomenon mapped on a map'; 2) ' a conditional line limiting the distribution zone of this dialect phenomenon' (Dictionary of Sociolinguistic Terms, 2006). Distinguishers – 'dialect, adverb, dialect', ' area', 'map', 'border, restriction', 'symbol, means'; marker (archiseme) –

'dialect phenomenon'. If the archiseme prevails in the first meaning, then with metonymic transfer it goes into the background, and the differential seme 'means, conditional designation' – *line becomes dominant*. By one of its meanings, *the isogloss* is included in the terminological field "dialectology, areal linguistics" (*dialect, dialects, divergence, diamorph, diaphone, language area, adverb*, etc.), by another – in the field "conventional designations" (for example, *gravis, akut, visarga,* etc.). There is an interaction between the logical categories "subject of research" and "tool".

The linguistic phenomena designated by the term are interrelated and interdependent, therefore implication connections often arise between them: causal (causal), spatio-temporal, etc. One concept implies another on the basis of the fact that the entities reflected by them are interconnected in a certain way, interdependent. These connections are the basis of metonymic shifts. Indeed, the meaning of *bidialectism* – 'possession equally the two dialects of the language, in which there is free switch codes depending on the social context' and 'educational policydirected on training students who are not native speakers of literary (normalized) of the language in the acquisition of writing skills in literary language, while supporting the local use of unstandardized dialects' (Dictionary of sociolinguistic terms, 2006) – guessing each other on the grounds that the referred phenomena are causal relations of the investigation and properties.

Features of the functioning of metonymy in scientific linguistic discourse

Linguistic metonyms-terms can be grouped by types of knowledge: declarative and procedural. Declarative (subject) knowledge is facts and the connections between them (Yang, 2013; Plappert, 2019). Modelling the subject area in this form requires a complete description of all its possible states. In metonymic terms of the declarative type, there are mutually directed shifts of meaning between the logical concepts "object", "subject", "general" and "particular", "abstract" and "concrete", "form", "content", etc. Such a transformation is present in terms denoting a section of linguistics and the subject of study (a set of studied units): lexicography, morphemics, paralinguistics, synonymy, syntax, etc. The model "subsection of linguistics \rightarrow subject of study": prosody 1. A common name for super-segmental properties of speech, namely: pitch, duration (quantity) and loudness (strength, amplitude). 2. The doctrine of the principles and means of dividing speech and connecting dissected parts, such as raising and lowering the main tone (melody), placing more or less strong accents (dynamics), relative acceleration and deceleration of speech (tempo) and the gap of utterance (pauses) (Akhmanova, 2004).

A metonymic shift is possible according to the model "direction in science \rightarrow method" and vice versa: *linguistic* statistics – 1) the study of some mathematical problems related to linguistic material, mainly with the types of statistical distributions of language units in the text; 2) the scope of statistical methods in linguistics. We see the metonymic shift "general \rightarrow particular", "the whole is its part" in the term *vocabulary*. Its main meaning is 'the whole set of words that are part of any language or dialect: *dialect vocabulary*', metonymic – 'the set of words used by any author, the vocabulary of his "language": *Pushkin's vocabulary*' (Akhmanova, 2004).

Another bidirectional model "subsection of linguistics \rightarrow section": *phonemics* (phonemology) English phonemics: 1) a part of phonology that studies backgrounds and their association into phonemes as units of a segmental (linear) series, i.e. with the exception of super-segmental (supralinear) units; cf. *graphemics, morphemics*; 2) the same as *phonology* (Akhmanova, 2004). This also includes the terms *Ukrainian studies, German studies, Arabic studies, Japanese studies; Slavic studies, Roman studies; African studies, Semitology*, etc. So, in the "Linguistic Encyclopedic Dictionary", edited by Yartseva (1990) the term *Germanistics* is defined as follows: 1) a complex of scientific disciplines related to the study of languages, literature, history, material and spiritual culture of German-speaking peoples; 2) the field of linguistics dealing with the study of Germanic languages (Leontiev, 1990).

The nomination of a linguistic phenomenon can be carried out through the designation of some of its properties or functions: for example, the term *sonant* can mean 'a sonorous consonant' or' a consonant sound capable of acting as a syllable-forming ' (Rosenthal & Telenkova, 1985). The metonymic reinterpretation of "abstract-concrete" is observed in the term *case*.' the grammatical category of the noun, expressing the relation of the object designated by it to other objects, actions, signs ' \rightarrow ' the form of the noun, expressing its relation to other words in a phrase and sentence' (Rosenthal & Telenkova, 1985).

Metonymy in scientific linguistic discourse can reflect the processes caused by the causal relationship between adjacent objects (Markova et al., 2021). The conceptual system of causal communication consists of an action (state, process, event), an object of action (a linguistic phenomenon), a result or consequence, an instrument, etc. So, the term *accentuation* means: 1) the accentuation of individual elements in a word or phrase (process); 2) the system of accents in a particular language or in a group of related languages (result); 3) the designation of accents in a written text (instrument) (Rosenthal and Telenkova, 1985). Similar shifts of meaning are observed in the stylistic (rhetorical) terms *alliteration, anaphora, assonance, catachresis*, etc.: *alliteration* – 'repetition of identical or close consonant sounds' and' stylistic technique consisting in repeating homogeneous consonants to increase the intonational expressiveness of the work'.

The "process (phenomenon)" model is quite common \leftrightarrow tool, symbol: *Visarga* – "1. A breath in Sanskrit, usually appearing at the end of a word instead of [s] and [r]. 2. The sign for the designation of the visarga (in 1 digit)" (Akhmanova, 2004). The most productive value shifts are illustrated by the "process pesyntrar result" and "process \leftrightarrow consequence" models. So, *de-etymologization* – "1. A historical change in the word-formation structure and meanings of words, which leads to a break in the connections between related words and the formation of unmotivated derived bases, which act as new (independent) roots in the modern language. 2. The loss of the word's original internal form and motivational transparency" (Zherebilo, 2016). The loss of the word's internal form is the result of a historical change in the word-formation structure and meaning of the word (Putrayasa, 2021). The metonymic shift "process consequence" is found in the term *nasalization:* "1. The acquisition of a nasal timbre by the sound due to the lowering of the palatine

curtain and the simultaneous exit of the voice through the mouth and nose. 2. The transition of the mouth sound to the corresponding nasal sound" (Akhmanova, 2004).

The model "state, property (of language) \leftrightarrow process" is actively used in linguistics: synchrony – 1) the state of a language at a certain moment of its development as a system of simultaneously existing interrelated and mutually conditioned elements; 2) language learning in this state (Leontiev, 1990). The transitional phenomena between lexicalized (linguistic) and discursive (speech) metonymy reflect those models that contain onyms and are associated with the designation of the subject of cognition (a linguist) and his scientific discovery.

The model "theoretical position, teaching \rightarrow the name of a scientist, thinker": the doctrine of the inner form, developed by A. A. Potebnja, \rightarrow *the Potebnja doctrine*; the hypothesis of linguistic relativity put forward by E. Sapir and B.L. Whorf, \rightarrow Sapir-Whorf hypothesis; Frege triangle, transformational grammar of N. Chomsky, postulates of P. Grice, maxims of politeness G. Leech; theory of semantic primitives A. Wierzbicka, theory of case grammar and semantics of frames C. J. Fillmore, Jespersen's Cycle, etc. Example of usage: "A model of the development of negation in the English language, which received the name "after the linguist who described it" Jespersen's Cycle", looks like this <...>. This model is called a cycle because the movement of negative particles in a circle may well resume" (English lesson. Glaze of the tongue, 2018).

Model "a set of theoretical propositions of any field of knowledge \rightarrow place of work scientists": "General and rational grammar, containing the basics of the art of speech, written in a clear and natural; rational basis that is common to all languages, as well as the main differences between them; as well as numerous comments about the French language", published by the abbots of the monastery of Port-Royal by Antoine Arnauld and Claude Lancelot, in 1660, \rightarrow Port-Royal Grammaire; school of medullablastoma in German linguistics of the XIX century, for the first time proposed to apply natural science principles of verification of scientific knowledge in linguistics, \rightarrow Leipzig school; Prague Linguistic Circle. Moscow Phonological School, Leningrad Phonological School, etc.

The model "scientific school", current \rightarrow the name of the scientist, thinker: *Vinogradovskaya school, Fortunatovskaya school.*

The model "theoretical method" \rightarrow the name of a scientist, thinker: *Humboldt–Schleicher classification, component analysis of the word W. Goodenough, converse analysis N. Henne, H. Rehbock* et al.

The model "tools of empirical knowledge" \rightarrow the name of the scientist, thinker: Swadesh list, the scheme of the family tree A. Schleicher, R. O. speech communication model Jakobson.

Metonymy here regularly arises on the basis of syntactic units (phrases and sentences) and is the result of their reduction. Elliptical metonymy appears regularly in popular scientific and, less often, educational and scientific texts (Suryasa et al., 2019). It does not create a new, contextually independent meaning of the name and retains to some extent limited by the conditions of use. As a rule, such a shift of meaning occurs not in terminology, but in illustrative material. Let's consider how the reduction of the phraseology "to pass through fire, water

and copper pipes" occurs in the text of the article "The patriotic myth of "copper pipes"" (7). First, the stable turnover is given in full, then it is said that "*Earlier in* the 1840s, "copper pipes" are not recorded in this context...", and at the end the phraseology is reduced to one word "pipes": "*Everything suggests that these* "pipes" came to literature from low speech registers...". The appearance of the metonym is thus prepared by the preceding text. Another example: "*Birch is not* only a tree for any Russian. It is also a symbol, a sign of the Motherland. <...> And for a Canadian, the "<...>**birch**" is a maple: a maple leaf is depicted even on the Canadian flag" (Leontiev, 1990).

The distinction between the lexeme *widow* as a denotation and a signifier is carried out in the article "Widow and widow" (6). It is claimed that "widow" is found in Russian 11 times more often than "widower", because the social position of a woman who lost her husband was socially marked and equated to inferiority. In addition, in the Old Russian language, the adjectives "vydovin", "vydovitsin", "vydovichi", "vydovichi", characterizing a widow, are marked, while there are no characteristic words formed from the lexeme "widower". The conclusion is made: "*The widow* (denotat –A. D.) *loses in life, while "the widow*" (signature – A. D.) *wins in language and verbal culture*".

Another type of syntactic metonymy is "displaced definition", or dislocationcompression metonymy. Here, the component is separated from the integral construction, "moves up the tree of syntactic dependence and closer to the beginning of the linear-speech structure of the sentence-utterance, and the "remnants" of this once integral construction are reduced" (Sigal, 2017). The resulting adjectival-substantive phrase "is characterized by a "discrepancy between the grammatical and semantic dependence of the adjective" (Raevskaya, 2000): school parts of speech ('parts of speech studied at school'), cow vocabulary ('vocabulary denoting cows') and sub. Metonymy is used to highlight an adjective, to direct attention to it.

On the sites "Glazary of the language", "Gramota.Ru", in the journals "Russian Speech", "Science and Life" this type of metonymy is quite common. So, in the article "What are dictionaries" (Reference and information portal "Gramota.Ru", 2021) the phrase *Ushakov boys is used.* This refers to young linguists-students of the famous lexicographer, Professor D. N. Ushakov, S.I. Ozhegov, G.O. Vinokur, R.O. Jakobson et al.

In the speech of students and schoolchildren, elliptical metonymy can become a source of speech errors. Most often, units of different levels of the language system are mixed in one utterance: *What is isolated in this sentence? –* **Participial turnover**. This refers to a separate definition expressed by a participial turnover.

In popular science texts, with a metonymic shift of meaning, a nominative substitution of the defined one is possible: "Someone, and they, who are hungry for new and deep, know the price of a "delicious" question" (Pastukhova, 2014). Here the adjacency is logical: "the defined name is replaced by another name that expresses the predicative characteristic of the object in mind, i.e. there is a nominative difference with the denotative identity of the original and the new

defined" (Gubanov, 2012). There is a text implication based on the presupposition: 'delicious food causes pleasure' \rightarrow 'a good question also causes pleasure'. Model: "pleasure" – "an object, a phenomenon that causes pleasure".

The semantic shift "whole \leftrightarrow part" is a characteristic feature of discursive metonymy. Linguists consider it as a synecdoche – a quantitative, quantitative metonymy (Pappas et al., 2002; Salager-Meyer, 2008). If elliptical metonymy is a kind of concise description, consisting in the fact that an essential element for a given situation is distinguished from the content of the text, then synecdoche, on the contrary, expresses one of the properties of a linguistic phenomenon, names its part instead of the whole, while naming the part and only implying the whole. The thought focuses on the element that is important for this context. As a result, a word that is monosemic in the reference literature gets a new meaning in the discourse. So, in the article "Non-boring Latin" by Podoskina (2008), gives an interesting interpretation of this lexeme. The author (a biologist by profession) states that "scientific Latin is not at all like the Latin language, which was spoken and written in ancient Rome and which is now being studied in some gymnasiums and universities". Latin, which in all dictionaries has one meaning -"Latin language", in the text of the article begins to differentiate on a functional basis within two spheres of Latin vocabulary: common and terminological. Latin is the colloquial language of the ancient Romans, used inThe Roman Empire ("vulgar Latin"), and Latin is the written form of the language of Latin literature and science ("classical Latin").

Often, generic metonymy is used to illustrate a linguistic phenomenon. Thus, the historical development of the Russian language Zarubina (2019) in the article "Portrait from life" compares Kir Bulychev with mirror sunflowers. The writer came up *with plants* that, in the process of growth, recorded everything they witnessed on thin films. When the "*sunflower*" was torn off, and it withered, the films were destroyed and began to show the past in the reverse shooting mode. Any living language is very similar to Bulychev's mirror sunflowers. The word "sunflower" (in quotation marks) is used here as a generic name, without quotation marks – as a species. Here we can also talk about metaphonymy: on the one hand, the cognitive distancing of the elements included in the metaphorical projection (*sunflower = word*) is observed in the text, on the other hand, in the case of metonymic projection, one of the aspects of the meaning of the word "*sunflower*" is focused from the generic name to the specific one.

Conclusions

The use of metonymy in scientific linguistic discourse depends on the scope of application: in the actual scientific, reference and evaluation texts, highly specialized metonyms-terms (lexicalized, semantic metonymy) prevail, and in popular scientific and scientific educational texts, almost all varieties of discursive (speech, contextual) metonymy are represented, concentrated in explanatory and illustrative material. Metonymic terms differ from other types of conceptual polysemy: the shift of meaning is observed only between the terms of the linguistic term system of one conceptual area. Among all the varieties of discursive metonymy, elliptical metonymy prevails as a result of folding the syntactic construction to the level of a word or phrase, which allows the reader to shift the focus of attention to the important side of the linguistic fact.

References

Akhmanova, O. S. (2004). Dictionary of linguistic terms. Moscow: Editorial URSS.

- Aripov, M. P. (2021). Semantics of wishes/applause/prayers associated with religious terms. International Journal of Linguistics, Literature and Culture, 7(4), 274-278.
- Bibri, S. E. (2018). A foundational framework for smart sustainable city development: Theoretical, disciplinary, and discursive dimensions and their synergies. *Sustainable Cities and Society*, *38*, 758-794. https://doi.org/10.1016/j.scs.2017.12.032
- Brdar-Szabó, R., & Brdar, M. (2012). The problem of data in the cognitive linguistic research on metonymy: A cross-linguistic perspective. *Language Sciences*, 34(6), 728-745. https://doi.org/10.1016/j.langsci.2012.04.012
- *Dictionary of Sociolinguistic Terms.* (2006). Ed. by V.Yu. Mikhalchenko. Moscow: Russian Academy of Linguistic Sciences.
- Gabidullina, A. R. (2016). Metonymic terms in popular science linguistic discoursein: In: *The world of Tukay: Philosophy, aesthetics, language* (pp. 140-145). Uralsk: Ministry of Education and Science of the Republic of Kazakhstan.
- Gabidullina, A. R. (2016). Metonymy in popular science linguistic discourse. East Slavic philology. Linguistics, (29), 88-94.
- Ginzburg, R. S. (1978). Fundamentals of lexicological research. Moscow: Nauka.
- Gorokhova, N. V. (2012). Metonymy as an actual semantic way of forming English-language terms of pipeline transport. In: *Omsk Social and Humanitarian Readings-2012* (pp. 279-281). Omsk: Omsk State Technical University.
- Gubanov, S. A. (2012). Adjective metonymy in artistic discourse (based on the work of M.I. Tsvetaeva). Bulletin of the Northern (Arctic) University. Series: Humanities and Social Sciences, 5, 81-86.
- Ikonnikova, V. A. (2011). Metaphor and metonymy in the formation of eponymous terms (based on English legal terminology). European Social Science Journal, 10(13), 214-222.
- Kolesnichenko, O. L. (2018). Trails in popular science text. In: *Scientific Linguistic Discourse: Addressee Factor* (pp. 229-250). Slovyansk: Donbass State Pedagogical University.
- Kong, L., & Qin, H. (2017). The development of manner of speaking markers in English and Chinese: Pragmaticalization, grammaticalization and lexicalization. *Journal of Pragmatics*, 107, 16-30. https://doi.org/10.1016/j.pragma.2016.11.005
- Kosova, M. V. (2004). Terminology as a lexico-semantic process. OSU Bulletin, 2, 42-48.
- Krymets, O. M. (2010). Metaphor and metonymy as factors of creation and development of Ukrainian technical terminology. Bulletin of the National University "Lviv Polytechnic". Series "Problems of Ukrainian Terminology", 675, 23-27.
- Leontiev, A. A. (1990). Travel on the map of the world's languages. Moscow: Prosveshcheniye.
- Lopushanskaya, S. P. (1996). Semantic modulation as a speech-thinking process.

Bulletin of the Volgograd State University. Series 2: Philology, 1, 6-13.

- Lu, C., Bu, Y., Dong, X., Wang, J., Ding, Y., Larivière, V., ... & Zhang, C. (2019). Analyzing linguistic complexity and scientific impact. *Journal of Informetrics*, 13(3), 817-829. https://doi.org/10.1016/j.joi.2019.07.004
- Lyashchuk, N. A. (2018). Eurysemia and polysemy of linguistic terminology (based on the Ukrainian language). *Universum: Philology and Art History*, 10(56).
- Markova, E. M., Kuznetsova, G. V., Kozlova, O. V., Korbozerova, N. M., & Domnich, O. V. (2021). Features of the development of linguistic and communication competences of future foreign language teachers. *Linguistics* and Culture Review, 5(S2), 36-57.
- McLachlan, M. (2021). Neoliberal rules: A critical multimodal analysis of metonymy on high school webpages. *Linguistics and Education*, 65, 100957. https://doi.org/10.1016/j.linged.2021.100957
- Orlova, S. N., & Kuznetsova, E. V. (2018). The euphemistic function of metonymy in the English-language economic discourse. *Modern Science: Topical Problems of Theory and Practice. Series: Humanities*, *12*(3), 114-117.
- Pappas, C. C., Varelas, M., Barry, A., & Rife, A. (2002). Dialogic inquiry around information texts: The role of intertextuality in constructing scientific understandings in urban primary classrooms. *Linguistics and Education*, 13(4), 435-482. https://doi.org/10.1016/S0898-5898(03)00004-4
- Pastukhova, L. S. (2014). It's time to draw attention to punctuation marks, or something about punctuation. Simferopol: Vernadsky Crimean Federal University.
- Plappert, G. (2019). Not hedging but implying: Identifying epistemic implicature through a corpus-driven approach to scientific discourse. *Journal of Pragmatics*, 139, 163-174. https://doi.org/10.1016/j.pragma.2018.09.001

Podoskina, T. A. (2008). Not boring Latin. Science and Life, 1.

- Putrayasa, I. B. (2021). Political language variation: stylistic based study. *Linguistics and Culture Review*, 5(1), 1-9.
- Raevskaya, O.V. (2000). Metonymy in the word and in the text. *Philological Sciences*, *4*, 49-55.
- Rogach, L. V. (2000). Semantic basis of linguistic terms in Ukrainian and English languages. Kyiv: Taras Shevchenko National University of Kyiv.
- Romanova, O. (2011). Metonymy in Ukrainian sewing terminology. Bulletin of the National University "Lviv Polytechnic". Series "Problems of Ukrainian terminology", 709, 47-50.
- Rosenthal, D. E., & Telenkova, M. A. (1985). *Dictionary-reference book of linguistic terms* (3rd edition). Moscow: Prosveshcheniye.
- Salager-Meyer, F. (2008). Scientific publishing in developing countries: Challenges for the future. *Journal of English for academic purposes*, 7(2), 121-132. https://doi.org/10.1016/j.jeap.2008.03.009

Selivanova, O. O. (2011). Linguistic encyclopedia. Poltava: Dovkillya-K.

- Shelov, S. D. (2003). *Term. Terminology. Terminological definitions.* St. Petersburg: Faculty of Philology of St. Petersburg State University.
- Sigal, K. Ya. (2017). Dislocation-substantive metonymy (based on substantiveadjective phrases). *Psycholinguistics Issues*.
- Smola, K. (2018). Community as Device: Metonymic Art of the Late Soviet Underground. *Russian* https://doi.org/10.1016/j.ruslit.2018.05.002

Sokolova, A. E. (2018). Types of metonymy in popular science discourse. Pp. 250-

275 in: *Scientific Linguistic Discourse: Addressee Factor*. Slovyansk: Donbass State Pedagogical University.

Suryasa, I.W., Sudipa, I.N., Puspani, I.A.M., Netra, I.M. (2019). Translation procedure of happy emotion of english into indonesian in kṛṣṇa text. *Journal of Language Teaching and Research*, 10(4), 738–746

Tatarinov, V. A. (1996). The theory of terminology: Moscow: Moscow Lyceum.

- Usatyy, I. B. (2009). Terminology of parts of speech in modern Russian linguistics. Nizhniy Novgorod: Lobachevsky State University of Nizhniy Novgorod.
- Volodina, T. S. (2014). Polysemy of linguistic terms (on the material of modern German). *Linguistic and Conceptual Pictures of the World*, 47(1), 229-237.
- Yang, Y. (2013). Exploring linguistic and cultural variations in the use of hedges in English and Chinese scientific discourse. *Journal of Pragmatics*, 50(1), 23-36. https://doi.org/10.1016/j.pragma.2013.01.008
- Yang, Y. (2013). Exploring linguistic and cultural variations in the use of hedges in English and Chinese scientific discourse. *Journal of Pragmatics*, 50(1), 23-36. https://doi.org/10.1016/j.pragma.2013.01.008
- Yartseva, V. N. (1990). *Linguistic encyclopedic dictionary*. Moscow: Sovetskaya entsiklopediya.
- Yunusova, S. M. (2021). Paraphrases related to the language of advertising. International Journal of Linguistics, Literature and Culture, 7(4), 236-240.

Zarubina, D. N. (2019). Portrait in nature. Science and Life, 6.

Zherebilo, T. V. (2016). *Dictionary of linguistic terms and concepts* (6th edition). Nazran: Piligrim.