

Psycholinguistic analysis of lexical-semantic structure in linguistic consciousness of Russian, English and German native speakers

by Victoria Sibul

Victoria Sibul Peoples' Friendship University of Russia (RUDN University) vsibul1970@mail.ru

Published in Training, Language and Culture Vol 1 Issue 2 (2017) pp. 54-70 doi: [10.29366/2017tlc.1.2.4](https://doi.org/10.29366/2017tlc.1.2.4)

Recommended citation format: Sibul, V. (2017). Psycholinguistic analysis of lexical-semantic structure in linguistic consciousness of Russian, English and German native speakers. *Training, Language and Culture*, 1(2), 54-70. doi: [10.29366/2017tlc.1.2.4](https://doi.org/10.29366/2017tlc.1.2.4)

The study examines lexical-semantic structures in the linguistic consciousness of an individual and considers the factors affecting the establishment of these structures. Understanding the way people categorise the outer world is essential for the development of cross-cultural communication skills. The study analyses linguistic consciousness studies in the field of linguistics, psychology and psycholinguistics and provides findings of research into internal structure of a semantic field 'bird' in the linguistic consciousness of Russian, English, and German speakers. The findings will be interesting to specialists in intercultural communication and foreign language teachers. The methodological framework is based on the psychometric ranking of verbal and non-verbal stimuli followed by statistical data processing implemented to reveal the nature of results correlation. These results were further exposed to comparative analysis to define the factors bringing about both similarities and discrepancies. The analysis helped prove that both linguistic and cultural phenomena affect the position of a component within a semantic field, making up its core and periphery. Linguistic phenomena feature symbolism, metaphorisation, and word-formation, while cultural phenomena are represented by geographic location and practical skills of communication.

KEYWORDS: language consciousness, lingua persona, worldview, categorisation, semantic field, cognitive field



This is an open access article distributed under the [Creative Commons Attribution 4.0 International License](https://creativecommons.org/licenses/by/4.0/) which permits unrestricted use, distribution, and reproduction in any medium, provided the original work is properly cited (CC BY 4.0)

1. INTRODUCTION

Globalisation processes affecting different spheres of life coupled with the close interrelation and mutual interference of language cultures brings about an extensive scope of research works looking into the issue of linguistic consciousness, its national and cultural specifics. Modern psycholinguistics considers linguistic consciousness in the framework of the theory of

speech acts. The anthropocentric nature of linguistic consciousness is undeniable, as mental structures do not exist autonomously and the worldview created as a result of reflection includes the actions and behaviour of an individual as well. Linguistic consciousness is not only anthropocentric, but also ethnocentric, meaning that national worldview is based on a peoples' system of presentational meanings, social

stereotypes, and cognitive schemes (Jackendoff, 2007).

The issue of how language and culture affect linguistic consciousness and the process of linguistic categorisation is insufficiently explored. A key priority here lies in analysing specific cognitive mechanisms that are involved in the perception of both verbal and non-verbal stimuli, investigating how those stimuli are referred to within specific categories and how they are ranked within these categories.

A combination of linguistic and psycholinguistic approaches to the study of language phenomena reveals mechanisms of the formation of linguistic categories and the factors that define the peculiarities of the inner structure of the linguistic category in linguistic consciousness. Findings retrieved through new experiments can shed light on the structure of linguistic consciousness and its national and cultural profile.

Notably, such findings can be used for targeted the shaping of various aspects associated with linguistic consciousness in the course of the educational process. They can also be applied to optimising intercultural communication and can be recommended as teaching material to train specialists in intercultural communication: translators, foreign language teachers, international journalists, culture experts, political

‘The key dilemma here is the interrelation between language and consciousness’

analysts, business people, etc.

2. THEORETICAL BACKGROUND AND METHODS OF LANGUAGE CONSCIOUSNESS RESEARCH

The issue of reciprocal influence between an individual (as a representative of a particular culture), and language (as an entity shaping people’s mental activity) was first highlighted by Humboldt (1999) who wrote about the need for an encyclopaedia that would reflect the way mentality and worldview of various nations across the globe shaped vital linguistic tasks. Since then this issue has been central in most disciplines dealing with language.

Following Humboldt, Whorf (2012) pointed out in his works the necessity of admitting the influence of language on different aspects of human activity. He emphasised that we should pay attention to common language laws and their reflection in various phenomena on a daily basis.

Language studies in terms of anthropocentricity have boosted discussion and research into the most exciting linguistic issues, one of them being the development and conceptual

interpretation of national linguistic consciousness and linguistic persona. Such research is intended to provide an insight into the peculiarities of speech habits, extra interpretations of meaning and the political, cultural and historical connotations of language units and speech.

Rubinstein (2002) defines consciousness as mental activity connected with the reflection of the world and self-reflection and emphasises that we need to study consciousness in terms of a person's behaviour and performance. Drawing attention to the continuity of consciousness and personality, Leontiev (2005) writes that personality is a process of constant identity shaping designed to regulate cognitive processes, behaviour, emotional experiences, etc. Following psychological interpretations of the notion, many linguists also consider linguistic consciousness and self-consciousness as the main attribute inherent in a linguistic persona (see, e.g., Searle & Willis, 2002; Hasan & Webster, 2005).

Ushakova (1986) points out that modern cognitive psychology introduced a lot of new ideas into the concept of consciousness; in particular, it introduced the idea of representative structures and peculiarities in the arrangement of mnemonic and information storage processes. Thus, deriving ideas from both psychology and linguistics, modern Russian psycholinguistics defines linguistic consciousness as a set of associative

'In terms of the worldview structure, it would be useful to consider differences in the core and surface worldview structures'

images shaped and verbalised using language means such as lexical units, word combinations, set expressions, sentences, texts, association areas, and associative thesaurus.

The key dilemma here is the interrelation between language and consciousness, which can be addressed via two alternative approaches. One of the approaches suggests that the system of verbal meanings and communicative means deployed to express these meanings presents a consciousness unit (Sapir, 1985; Whorf, 2012). According to Sapir (1985), consciousness amounts to a set of the signified meanings expressed by lexical units. Another approach describes meaning as a consciousness unit. Language here is viewed as a system of meanings that can be verbalised (Halliday & Matthiessen, 2006; Jakobson, 1965).

Both approaches have derived a significant number of both supporters and opponents. Popova & Sternin (2007) consider linguistic consciousness as a component of cognitive consciousness that manages individual speech activity and regulates speech operation. The researchers also note that

speech activity is in its turn part of a broader notion referred to as communicative activity.

3. METHODOLOGICAL FRAMEWORK FOR LINGUISTIC CONSCIOUSNESS RESEARCH

In modern linguistics, there are two main paradigms deployed in linguistic consciousness research. One of them is intercultural communication that assumes knowledge of a foreign culture by at least one of the communication partners. This paradigm allows us to investigate our own national consciousness and provides a foundation for comparative analysis. Such comparative analysis, in turn, will help reveal common features that are usually hidden or distorted while researching homogeneous consciousness (Cotton, 2013).

The other paradigm is memory study. Memory studies help track and record the life of images residing in our consciousness. As a form of reality, reflection memory stores, fixes and then reproduces our impressions about our immediate environment (Assmann, 2008). It provides unique material that could be used to analyse images dwelling within our consciousness.

This study follows the paradigm and ontology of intercultural communication assuming that language consciousness should be considered as one of the layers within the entire worldview structure, i.e. as one of the optional schemes to

discover the world that is more suitable for communicative aims.

In terms of the worldview structure, it would be useful to consider differences in the core and surface worldview structures. Modern cognitive linguistics suggests that worldview is inherent in a human being acting as a bearer of consciousness. Lévy-Bruhl (1975) defined it as people's involvement into the environment considering this involvement universal and basic for world perception.

Following this, core structures can be defined as fundamental elements of human existence, conscious networks representing his or her actual interrelation with the world regardless of his or her personal reflections thereupon.

Different worldviews are commonly compared using universal categories and concepts, such as time, space, changes, causes, figures, fortune, etc. These concepts may vary in terms of their content, yet they are at all times embedded in a person's consciousness at any stage of his or her development. And it is language that exclusively describes the worldview due to its particular features, namely:

- it can describe the worldview in all of its integrity as elaborately as needed;
- it can describe both native and foreign worldviews;

- it can serve as an intermediary transferring the data between the various worldviews.

Thus, worldview is viewed as a reflection of the presentive real world in the individual's psyche mediated by presentive meanings and the corresponding cognitive schemes.

Developing this idea, Ushakova (1986) claims that combined activity of language, speech and consciousness in an individual psyche creates new structural features. Different researchers define them as language thesaurus, verbal nets, semantic fields, or basic contextual elements of a linguistic worldview. Thus, a conceptual worldview includes information represented in concepts, and a linguistic worldview covers knowledge fixed in the semantic fields comprising words and word combinations that are ranked differently within a category. Therefore, the next step would be to analyse the inner structure of the semantic field.

The term 'semantic field' came into use following Trier's (1973) work. Trier's theory is closely connected with Humboldt's idea of the inner form of a language. He understands language as a self-contained stable system that defines the content of all its constituent parts. Pursuant to Trier (1973), words of any language are not isolated carriers of meaning; they all have their individual meanings only because other allied words also have this semantics. Trier (1973) also distinguished between

two notions, namely 'lexical field' and 'conceptual field'. According to his theory, a field consists of simple units (words and concepts) with lexical units covering the corresponding conceptual field.

The next stage in the development of the 'field' concept is connected with works of Fillmore (1976) and Karaulov (2010).

Fillmore (1976) emphasises the role of semantic fields as representatives of unified patterning of human experience and knowledge. According to the researcher, semantic fields can be interpreted by appealing to the notion of a 'scheme', while lexical fields can be associated with the notion of a 'frame' and different types of links between the frames. Semantic fields are characterised by different types of structures due to different ways of reflecting human knowledge in lexis.

In his work, Fillmore (1976) defines the following types of such structures:

- contrasting sets (semantic oppositions);
- taxonomy (relations of inclusion or domination);
- paradigms (common semantic features);
- cycles (rank relations);
- nets (groups based on several relations);
- frames (a set of words representing a part of the conceptual whole);
- patronomy (relations between a part and a whole).

Another researcher, Karaulov (2010), considers achievements of modern linguistics and introduces the new conceptual perspective on semantic fields, as well as new principles of lexical structuring. According to this researcher, semantic fields present idiomatic entities relying on the connections between words. They are historically determined and vary from an individual to an individual.

Among various approaches to the study of lexis as a system, Bosova (1997) distinguishes the psycholinguistic approach that assumes studies of associative fields. An associative field represents a lexical set created by a respondent in accordance with the association with a word-stimulus. Admitting the diversity of the material referred to as a field, she distinguishes some of the most common characteristics of a semantic field:

- interrelation between elements within a single field;
- varying structure of a field (core and periphery);
- attracting (possibility to include new elements with similar features) (Bosova, 1997).

Language is the main instrument of knowledge reflection. On the other hand, language is also a tool used to discover the world, inasmuch as it denotes and generalises the signals fed into the brain from the external world. Moreover, language

is a tool of professional communication. In the course of professional communication, people create professional jargon that denotes notions and concepts used in their professional activity (Malyuga & Tomalin, 2014).

Studies of vocabulary organisation revealed that each semantic group has an element that can be perceived, identified, and remembered much faster and more successfully in comparison with the other elements of the group. Elements with the above-mentioned features are defined as core or basic and this finding is particularly important in professional language learning and teaching.

This hypothesis is justified by findings in Rosch and Mervis's (1975) psychological research which reveal that basic elements of a category are the first ones acquired by children while learning the native language.

Reviewing research papers published by Rosch (1978) and Lakoff (2012), we find some fundamental contradictions in the two main ideas shaping the foundation of the classical approach to categories description: 1) no member of a category can be superior to any other member of the same category; 2) categories are independent from an individual who creates categories (Lakoff, 2012). These and other relevant works (Berlin & Kay, 1969; Brown, 1958; Taylor, 1989) proved that in fact all individual peculiarities play a really

‘An associative field represents a lexical set created by a respondent in accordance with the association with a word-stimulus’

important role in categorisation. Thus, linguistic categorisation of the perceived world is not an entirely spontaneous process. This explains semantic universals and interlingual equivalence.

Russian psycholinguistics argues that structures of consciousness add to its content introducing new relations and connections rather than isomorphically duplicating initial content. Meaning, therefore, has its own objective genesis in a person’s practical cognitive activity.

4. STUDY AND RESULTS

Factors that influence the inner structure of a semantic field can be illustrated by the study of the semantic category ‘Bird’. Considering this semantic field, we should appreciate that like any other semantic field it is neither rigid, nor fixed. It has been replenished at different stages of social development. Thus, we may conclude that words making up this semantic field do not only demonstrate major linguistic alternations, but also reveal social and economic changes.

Bird names that constitute the semantic field ‘Bird’

can be divided in compliance with the following features:

birds residing within the country: (a) well-known to the most part of the country’s population (domestic or living near people); (b) wild birds typically residing within a particular location;

birds residing outside the country: (a) well-known to the most part of the country’s population (due to the mass media, circus, zoo, or museums); (b) relatively unknown (identified as birds but not associated with any particular images); (c) unknown (not identified as birds).

Studies of the field’s inner structure by the method of random listing of field members provided material for comparative analysis in terms of the dominance of field members with respect to each other. Frequency data reveal the degree of awareness of different respondents (Russian, American, and German respondents, in our case) regarding bird recognition ability. The findings disclose a mismatch uncovering certain differences in the inner structure of the semantic field in question.

Following the analysis of the above-mentioned studies, we assume that the psychological understanding of the structure of semantic fields is shaped in accordance with objectively recognised features but is at the same time determined by the

‘This diversification provided an opportunity to compare responses to verbal and non-verbal stimuli and amplify the representativity of the selection presented’

individual’s knowledge of the world. Following Rosch (1978), we assume that the laws governing the establishment of a semantic field can be considered universal, while the distribution of related objects within this semantic field is determined by various factors. These factors may be underpinned by the linguistic, cultural, or historical development of the corresponding linguacultural community. Experimental findings provide the data that will enable us to answer the following questions:

1. What factors influence the distribution of semantic field components in relation to a degree of typicality in comparison with the other members?
2. Is a combination of factors and the degree of their influence the same for different languages?

Our experiment consisted of two parts. The first part was based on typicality assessment based on verbal stimuli, while the second part relied on typicality assessment based on visual stimuli.

The verbal stimuli experiment (names of 50 birds) involved 100 Russian native speakers, 100 English native speakers (Americans) and 100 German native speakers. The visual stimuli experiment (photos of 50 birds in their natural habitat) involved 50 Russian native speakers, 50 English native speakers and 50 German native speakers.

The age of the respondents ranged between 20 and 50 years, men and women were represented equally and all of the respondents had been through education or were about to graduate. Attracting students of higher educational institutions is common experimental practice because by this age the process of lingua persona formation is almost entirely completed. As Karaulov (2000) points out, the content of language skills (vocabulary, hierarchy of values, pragmatic goals) and the ability to use them remain stable within a person’s lifespan. Therefore, analysing respondents’ responses, we can forecast some features of mass consciousness inherent in the representatives of the age group studied.

The questionnaire covering the first part of the experiment was developed based on the frequency data retrieved for 10 bird names with high reference frequency, 10 bird names with low reference frequency, and 40 bird names with average reference frequency.

All respondents received a list of 50 bird names in

their native language that had to be ranked 1 (not typical) to 7 (the most typical). All respondents also had to elaborate on their subjective perceptions regarding the typicality of the birds mentioned. Primary results processing permitted us to calculate an average score (rank) for each bird name according to the weighted average formula.

In the course of the second part of the experiment, the respondents received 50 photos of birds in their natural habitat. 25 of these photos featured the birds listed in the questionnaire, while the rest of the pictures featured some new bird breeds. This diversification provided an opportunity to compare responses to verbal and non-verbal stimuli and amplify the representativity of the selection presented. All the photos were scanned and delivered in a slideshow format with the same exposure interval applied.

Along with the slideshow presentation, the respondents received the list comprising 50 items that were supposed to be ranked 1 to 7. Further on, the same data processing procedure was implemented.

The findings obtained through the experiment were analysed in three stages: 1) statistical data processing revealed the nature of the results obtained; 2) analysis of data obtained through both experiments and revealed the inner structure

'The dove is a symbolic bird for all Christian cultures as a symbol of the Holy Spirit in Christian theology'

of the semantic field studied; 3) comparative analysis of the data intended to identify the factors that determine the inner structure of the semantic field in question.

The correlation of the results obtained was further described using Spearman's formula (Spearman correlation).

The correlation ratio of ranks given to verbal stimuli is as follows:

- Russians/Americans +0.42
- Russians/Germans +0.90
- Americans/Germans +0.47

These correlation ratios prove the following:

- with the findings related to the Russian/American and American/German part of the experiment, there appear to be quite significant differences in the distribution of semantic field components;
- greater similarity was revealed in comparing data obtained from Russians and Germans.

The correlation ratio of ranks given to non-verbal

stimuli is as follows:

- Russians/Americans +0.997
- Russians/Germans +0.970
- Americans/Germans +0.966

These correlation ratios prove that there is some universal basic image of a bird in the consciousness of people with different national and cultural backgrounds. Analysing photos that achieved the highest rankings, we can conclude that their typicality was estimated based on some basic exterior features assigned to a perfect object of this group.

Having analysed the distribution of bird names within the semantic field 'Bird', we can argue that ranking of birds based on verbal stimuli does not accurately reflect the real genus-species relations. For example, English native speakers gave the highest rank to a robin, while thrush (that gives the name to the bird family) was ranked much lower; an eagle, representing a hawk-like bird family, was ranked much higher than a hawk.

The mismatch proves that semantic fields do not present absolute reflections of scientific classification. Some researchers (Berlin & Kay, 1969; Lakoff, 2012; Smith et al., 1984) suggest that the difference or mismatching between scientific and linguistic categorisation is due to cultural and linguistic factors, as well as upbringing traditions observed in specific linguacultural communities.

The next step of our research was to analyse the cultural factors determining the establishment of the semantic field studied.

With all three groups of respondents involved in the study, the top-ranked representatives of the semantic field 'Bird' included an eagle (85% of Russians, 77% of Americans and 66% of Germans) and a dove (75% of Russians, 67% of Americans and 70% of Germans). Thus, we assume that the eagle and the dove are the most prominent representatives of this semantic field in the linguistic consciousness of Russian, English and German native speakers. Moreover, we may assume that the symbolic interpretation of these birds in all three cultures could be a reason for such ranking.

The white-headed eagle (also named American eagle) is the national emblem of the USA, while the two-headed eagle (also named double-headed eagle) is the symbol of the Federal Republic of Germany and the Russian Federation.

The dove is a symbolic bird for all Christian cultures as a symbol of the Holy Spirit in Christian theology. Moreover, doves occupy a particular place in human life, as according to ornithological data they are an integral part of the urban landscape on the Eurasian continent. Over 150 species of doves are being bred for different purposes. People all over the world are familiar

with the expression ‘the dove of peace’ which obviously reflects people’s attitude to this particular bird.

Some groups of lexical units (primarily words denoting real phenomena and reflecting environmental peculiarities) express national and cultural identity. Endemic names of plants and animals residing in a particular location are perceived as both proper names and generic names. Some of them are usually connected with stereotypical associations fixed in a peoples’ background knowledge.

Symbols, in turn, are a particular need of an individual and they don’t exist on their own but are the product of human consciousness. Lakoff (2012) compares symbolism with metonymy, emphasises that they are both nonspontaneous and supposes that there is a reason why dove is a symbol of the Holy Spirit. The bird has always been perceived as something peaceful and tender, a friendly creature that graciously and silently sails in the air. Besides, doves are always close to people, always around.

Thus, we can assume that symbolism is at least one of the reasons why ‘eagles’ and ‘doves’ were ranked high in our experiment. Besides, we can argue that the cultural and historical development of a linguacultural community affects the way various phenomena are being structured and

‘The prevailing opinion is that metaphors are created by object features that match subjects of a metaphor and are accompanied by assessment connotations’

presented in people’s linguistic consciousness.

Analysing the words ‘eagle’ and ‘dove’, we should also consider the notion of metaphorisation, which is crucial to our research. The lexical unit ‘eagle’ is often used in all three languages to characterise a careful, watchful, and sharp glare (*eagle-eyed* in English, *Adlerblick* in German). In Russian culture, it is common to call a proud and brave man an ‘eagle’. ‘Dove’ in English and ‘der Taube’ in German are used to name politicians who are in favour of peaceful policies and dispute solving. For example, this citation from an American newspaper reads: *‘Although not the most famous Senate ‘Dove,’ Pell helped change the nation’s Vietnam policy as effectively as other more ...’*

The prevailing opinion is that metaphors are created by object features that match subjects of a metaphor and are accompanied by assessment connotations. Basic metaphors mostly appeal to intuition and determine people’s way of thinking about the world (worldview). According to Maslova (2004), a metaphor is *‘an organic expression of reasoning and cognition, the main*

tool used to create new concepts in a person's linguistic worldview' (Maslova, 2004, p. 89-92). A similar idea can be traced in the work by Lakoff and Johnson (2008) claiming that basic ontological metaphors proceed from regular correlations in human experience, and we conceptualise less distinct notions in terms of more distinct notions (Lakoff & Johnson, 2008). For example, the verb *to parrot* means to repeat after somebody, mostly without proper understanding. This verb derives from a bird name *parrot* with reference to an ability of this bird to imitate sounds. This is true for all three languages under study.

Notably, the distribution of stimuli within a semantic field can be explained through something more than just metaphorisation, symbolism, and metonymy. Thus, in our further analysis we shall assume that the nominative function of word formation is actualised in selecting and fixing new structures of knowledge with word formation means and making some conceptual units that appear objective as a result of world cognition and assessment. Kubriakova (2004) identifies the following regularities in concept perception:

- abbreviation is perceived differently with aphetic or converse terms;
- genuine lexis differs from derived lexis not only morphologically but also due to phonological strangeness;
- there is always a core in word formation

system, consisting of productive type models used in literature and regular speech models, as well as a periphery consisting of special and professional lexis;

- stylistically marked lexis always requires special strategies for understanding.

This approach is relevant for further analysis of ranking distribution. Rankings obtained with Russian respondents were analysed using the following sources:

- Dictionary of the Russian Language (Ozhegov, 2007);
- Russian Dictionary of Associations (Karaulov et al., 1994);
- Dictionary of Modern Russian Literary Language (Gorbachevich, 1994).

Rankings obtained with American respondents were analysed using the following sources:

- Longman Dictionary of English Language and Culture (LDELIC, 2005);
- Longman Exams Dictionary (LED, 2006);
- Collins Cobuild Advanced Learner's English Dictionary (CCALED, 2009).

Rankings obtained with German respondents were analysed relying on the following sources:

- Der Grosse Coron (Ahlheim, 1988);
- Deutsches Universalwörterbuch (DUDEN, 2006);
- Moderne Deutsche Idiomatik.

Systematisches Wörterbuch mit Definitionen und Beispielen (Wolf, 1996).

The analysis was designed to identify the factors that could affect the ranking obtained with Russian, English, and German native speakers. Pursuant to the data retrieved, the names of the birds residing within the country got the highest ranks. These are the names making up part of people's genuine language, inasmuch as they are easily perceived, remembered and actualised as part of respondents' active vocabulary.

Here mention should be made of the phenomenon of place affiliation that was introduced by Taylor (1989) and defined as '*affective connections between an individual and his or her environment*' (p. 102).

In addition, most of the bird names of that top group constitute idioms that are fixed in dictionaries and are commonly used in everyday speech. An idiom contains generalised information about an element of our environment and embeds emotive assessment of the objects surrounding us, thus affecting the process of categorisation.

Average ranking was given to exotic birds commonly residing outside of respondents' native countries; however, native speakers know at least something about those birds from mass media and other sources of information. Names of those birds

are derivatives from other languages and are rather difficult to perceive due to morphological and phonological differences (e.g., oriole, canary, swan, penguin, cockatoo in a survey among American respondents).

Another group of bird names that got average ranking was associated with the birds that are well-known to professionals specialising in the corresponding field (ornithologists). It is mostly professional lexicon, and identification and assessment require knowledge of the sphere of zoology. Therefore, it is part of passive vocabulary (e.g. jay, blackbird, wagtail, and heron in a survey among American respondents).

The lowest ranking was given to bird names that are polysemantic, i.e. have several different meanings. We assume that low ranks attributed to these particular bird names had to do with their diffusion throughout other semantic fields. One and the same meaning cannot denote the best representatives in different categories, (e.g. secretary bird, babbler, kiwi, and cardinal in a survey among Americans).

Summing up, the following structure of a semantic field may be suggested.

The core of the field consists of names included in the active vocabulary, forming part of idiomatic expressions, and denoting objects typically found

within the country and well-known to native speakers. They form a wide associative field that reflects people's experience or relations with their surroundings.

The bulk of the semantic field contains names categorised as both genuine and derived lexis, forming part of people's passive vocabulary, and denoting objects existing both outside and within the country. Native speakers are more or less aware of them through different sources of information.

The periphery is characterised by polysemantic names belonging to both genuine and derived passive vocabulary, denoting objects that are never found within the country and are little known to native speakers.

The next step in our analysis was to compare the rankings associated with the verbal and non-verbal stimuli. This comparison resulted in the following findings:

- Images that arise as a result of visual perception do not necessarily align with the images residing in one's linguistic consciousness because they are affected by factors that are different by nature. Still the revealed similarities suggest that there are levels of representation where the information transmitted by language coincides with the information received

through other channels, such as sight, sounds, smell, movements, etc.

- The distinctive external features of real objects are mediated by presentive meaning and respective cognitive schemes.
- Complex knowledge about the world is reflected in language that shapes the images represented in people's linguistic consciousness.
- Mental images that appear as a result of visual perception are universal in nature. Images making up part of linguistic consciousness vary due to different verbalisation techniques employed in the course of information processing.
- A word can activate complicated mechanisms within the human brain, i.e. induce packages of information about our surroundings. Thus, it can serve as a source of symbolisation based on associations deployed to shape complex mental combinations.
- Imagery perception, physical interrelation, and mental images affect the establishment of various semantic fields functioning among the representatives of different linguacultural communities.

5. CONCLUSION

Different types of experiments unravelling the inner structure of semantic fields allowed us to prove the existence of lexical-semantic fields in people's linguistic consciousness and classify semantic fields into core and periphery. Some questions, however, remained unanswered, which prompted an ever more comprehensive revision of the classic understanding of what category actually is. Correlation between cognitive and language fields has become the key topic of investigation in a number of modern studies. The object of our study was the taxonomic category 'Bird'. Comparative psycholinguistic analysis of rankings in terms of verbal and non-verbal stimuli obtained from representatives of Russian, German, and American linguacultural communities allowed us to define the category's inner structure (its core and periphery), pinpoint the factors influencing the

'Complex knowledge about the world is reflected in language that shapes the images represented in people's linguistic consciousness'

distribution of field components (language and culture), and compare the structures of cognitive and linguistic fields.

To sum up, the components of both linguistic and cognitive fields and their distribution within the field can be determined by both essential features of the denoted object and its relations with the other field components that are built up under the influence of a number of factors connected with linguistic, cultural, and historical development of the corresponding linguacultural community.

References

- Ahlheim, K. H. (1988). *Der Grosse Coron* [The big Coron dictionary]. Mannheim, Germany: Coron Verlag Lachen am Zuerichsee.
- Assmann, J. (2008). Communicative and cultural memory. In A. Erll, & A. Nünning (Eds.), *Cultural memory studies. An international and interdisciplinary handbook* (pp. 109-118). Berlin, New York: Walter de Gruyter.
- Berlin, B., & Kay, P. (1969). *Basic colour terms: Their universality and evolution*. Berkley: University of California Press.
- Bosova, L. M. (1997). *Sootnoshenie semanticheskikh i smyslovykh polei kachestvennykh prilagatelnykh* [Correlation between semantic and conceptual fields of descriptive adjectives]. Barnaul, Russia: Barnaul State University.
- Brown, R. (1958). How shall a thing be called? *Psychological Review*, 65, 14-21. doi: 10.1037/h0041727
- CCALED. (2009). *Collins Cobuild advanced learner's*

- English dictionary* (6th ed.). London, UK: Heinle Cengage Learning.
- Gorbachevich, K. S. (1994). *Slovar sovremennogo russkogo literaturnogo yazika* [Dictionary of modern Russian literary language]. Moscow, Russia: Russian Language Publishing.
- Cotton, G. (2013). *Say anything to anyone, anywhere: 5 keys to successful cross-cultural communication*. New Jersey, Hoboken: Wiley & Sons.
- DUDEN. (2006). *Deutsches Universalwörterbuch* [Universal dictionary of German] (7th ed.). Mannheim, Germany: Dudenverlag Stock.
- Fillmore, C. J. (1976). Frame semantics and the nature of language. *Annals of the New York Academy of Sciences*, 280(1), 20-32.
- Halliday, M. A. K., & Matthiessen, C. (2006). *Construing experience through meaning: A language-based approach to cognition*. A&C Black.
- Hasan, R., & Webster, J. (2005). *Language, society and consciousness*. Equinox Publishing.
- Humboldt, W. (1999). *On the diversity of human language construction and its influence on the mental development of the human species*. Cambridge University Press.
- Jackendoff, R. (2007). *Language, consciousness, culture: Essays on mental structure* (Vol. 2007). MIT Press.
- Jakobson, R. (1965). Quest for the essence of language. *Diogenes*, 13(51), 21-37.
- Karaulov, Ju. N. (2010). *Russkii iazyk i iazykovaia lichnost* [Russian language and lingua persona]. Moscow, Russia: LKI.
- Karaulov, Yu. N., Sorokin, Yu. A., Tarasova, E. F., Ufimtseva, N. V., & Cherkasova, G. A. (1994). *Assotsiativnyi slovar russkogo yazika* [Russian dictionary of associations]. Moscow, Russia: Institute of Linguistic Research of the Russian Academy of Sciences.
- Kubriakova, E. S. (2004). *Yazik i znanie* [Language and knowledge]. Moscow, Russia: Yazyky lavanskoj kultury.
- Lakoff, G. (2012). Explaining embodied cognition results. *Topics in Cognitive Science*, 4(4), 773-785.
- Lakoff, G., & Johnson, M. (2008). *Metaphors we live by*. University of Chicago Press.
- LDELIC. (2005). *Longman dictionary of English language and culture*. Harlow, UK: Longman.
- LED. (2006). *Longman exams dictionary*. London, UK: Pearson Longman ELT.
- Lévy-Bruhl, L. (1975). *The notebooks on primitive mentality*. Harper & Row.
- Leontiev, A. N. (2005). The genesis of activity. *Journal of Russian & East European Psychology*, 43(4), 58-71.
- Malyuga, E., & Tomalin, B. (2014). English professional jargon in economic discourse. *Journal of Language and Literature*, 5(4), 172-180.
- Maslova, V. A. (2004). *Kulturnaya lingvistika* [Cultural linguistics]. Moscow, Russia: Academia.
- Ozhegov, S. I. (2007). *Slovar russkogo yazika* [Dictionary of the Russian language]. Moscow, Russia: Onyx.
- Rosch, E. H. (1978). Principles of categorization. *Cognition and Categorization*, 4, 27-48.
- Rosch, E. H., & Mervis, C. B. (1975). Family resemblances: Studies in the internal structure of categories. *Cognitive Psychology*, 7, 573-605.

- Rubinstein, S. L. (2002). *Osnovy obshchei psikhologii* [Fundamentals of general psychology]. Saint Petersburg, Russia: Peter.
- Sapir, E. (1985). *Culture, language and personality: Selected essays* (Vol. 342). University of California Press.
- Searle, J. R., & Willis, S. (2002). *Consciousness and language*. Cambridge University Press.
- Smith, E. E., Medin, D. L., & Rips, L. J. (1984). A psychological approach to concepts: Comments on Rey's 'Concepts and Stereotypes'. *Cognition*, 17, 265-274.
- Popova, Z. D., & Sternin, I. A. (2007). *Yazyk i natsionalnoe soznanie* [Language and national consciousness]. Voronezh: Istoki.
- Taylor, J. R. (1989). *Linguistic categorisation: Prototypes in linguistic theory*. Oxford, UK: Oxford University Press.
- Trier, J. (1973). *Zur Geschichte und Theorie des sprachlichen Feldes* [On the history and theory of the semantic field]. Darmstadt, Germany: Wiss. Buchgesellschaft.
- Ushakova, T. N. (1986). Inner speech. *Soviet Psychology*, 24(3), 3-25.
- Whorf, B. L. (2012). *Language, thought, and reality: Selected writings of Benjamin Lee Whorf*. MIT Press.
- Wolf, F. (1996). *Moderne Deutsche Idiomatik. Systematisches Wörterbuch mit Definitionen und Beispielen* [Modern German Idiomatics. Systematic dictionary with definitions and examples]. Munich: Max Hueber.