Verbalization of the Notion of Time in Present-Day English

"Laiko" sąvokos verbalizacija šiuolaikinėje anglų kalboje

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Abstract

The universal notion of time, alongside the basic notion of space, is believed to determine the formation of a huge number of other notions of the human mind. The results of time interpretation are fixed first and foremost in the semantics of the lexical units of national languages. The novelty of this research is that the noun synonyms to the lexeme time in present-day English have been established and analyzed with their subsequent grouping in synonymic rows within the core of the nominative field of time. The structure of the polysemous lexeme time, which consists of nine lexico-semantic variants, was chosen as guidance for synonymic rows organization. On the ground of the established obligatory and optional ties between them, among which hyper-hyponymic relations turn out to be fundamental, the semantic network of the core of the nominative field of time has been revealed and visualized. The network is based on four central hypersemes that represent the main features of the notion of time verbalized by the noun units of present-day English. A clear tendency of synonyms to express time metaphorically and metonymically in terms of ‘quantity’ in close connection to the components ‘something that happens’ and ‘state’ has been established.

KEYWORDS: semantics, the notion of time, lexico-semantic variant, synonym, core of the nominative field, semantic network.

Introduction

Gaining insight into the essence of the time phenomenon, due to its paramount importance in human life, has always been the aim of specialists from various spheres of science. However, due to its highly abstract character, scientists have to deal with slightly different phenomena (Hawking, 2011, p. 27–28; Janda, 2013, p. 219–220; Tatsenko, 2009, p. 9). For example, physics treats time as an overall modification of space known as objective time, while psychology and linguistics study subjective time or the reflection of the objective time in the person’s mind (Goddard, 2002; Hawking, 2011; Lakoff, 1993; Mihalskij, 2016; Nordlander, 1997).
In any case, all events happen in time and without its tangible consequences there can be no objective succession and subjective experience of duration (Evans, 2005, p. 3). The idea of time is fixed in the mental unit ‘the notion of time’ (see Khairullina, 2018, p. 308–309). It plays a special role in the process of thinking (Janda, 2013; Lakoff, 1993; Plungian & Rakhilina, 2013), as, alongside the notion of space, it is a logical structure of the highest level of abstraction, i.e., a higher-order notion on the basis of which the notions of mind can be constructed (Evans & Green, 2006, p. 231). Together with all the other units that reflect the interpreted objects or phenomena of reality and are embodied in verbal forms, it constitutes language (Nordlander, 1997, p. 3–4), or the world of rationally considered ideas formulated linguistically (Rastall, 2006, p. 34–35).

As the questions about the interconnection of the notion, meaning and representation are in the focus of modern philology (Khairullina, 2018, p. 308; Moghaddas & Dekhnich, 2015, p. 26; Vasilyeva, 2016, p. 416; Wierzbicka, 1996, p. 3), the issue of time phenomenon verbalization is also rather topical (Evans, 2013). Thus, the goal of the article is to establish and describe the noun nominations of the notion of time in present-day English. The analysis of the corresponding fragment of language with a further reconstruction of its semantic network enables us to reveal the structure of the notion of time and explain the principles of organization of the lexical units. More than that, as mental structures verbalized in language contain cultural ideas of the world (Barcelona, 2002, p. 211), such investigation reveals the cultural specificity of time interpretation represented in the semantics of the noun lexical units of present-day English.

Theoretical Background of the Research

As a part of a more general problem of the relationship between language and cognition, the issue of time verbalization presupposes a scientific consideration of its mental grounds. The framework of the notion of time is modelled on the basis of the meanings of the lexical means that represent it. Even though the mental unit of time has been the subject of a number of studies (Huang, 2016; Janda, 2013; Lakoff, 1993; Makarova & Nesset, 2013; Nordlander, 1997; Plungian & Rakhilina, 2013; Tatsenko, 2009), only a few linguists have attempted to answer the question about its basic semantic structure. So, for example, Evans (2005) reduced all the possible meanings of the noun time to eight senses based on the meaning, concept elaboration and grammatical criteria. They are as follows: 1) the Duration Sense (the Sub-sense: protracted duration; the Sub-sense: temporal compression); 2) the Moment Sense; 3) the Instance Sense; 4) the Event Sense; 5) the Matrix Sense; 6) the Agentive Sense; 7) the Measurement-system Sense; 8) the Commodity Sense (Evans, 2005, p. 107–183). In the scholar’s opinion, these lexical senses and their interrelations lie in the basis of the semantic network of time (Evans, 2005, p. 120).

Bondarenko (2014) describes TIME as a complex matrix of domains that consists of ‘warm’ and ‘cold’ components represented in English in the form of the lexico-semantic field. The ‘warm’ domain is MODE OF ACTION, whereas the domains LOCATION ON THE TIME AXIS and RHYTHM are called ‘cold’. The DURATION and SUCCESSION ON THE TIME AXIS are defined as intermediate cognitive structures (Bondarenko, 2014, p. 53).

The results of the research by Afanasieva (2007) and Nilsen (2010) are also of great interest. According to Nilsen (2010), six blocks constitute the semantics of time in present-day English: 1) Time as value; 2) Time as higher power; 3) Time as motion (3a – linear time; 3b – cyclical time); 4) Absolute time; 5) Time as container; 6) Time as a measurement system. To single out the blocks, the scientist used data from the survey of English-speaking informants as well as paremiology material (Nilsen, 2010, p. 20–21).

While investigating time in English, Spanish and Russian from the contrastive perspective, Afanasieva (2007) came to the conclusion that it has an identical semantic structure. The scholar offered a nuclear-peripheral model of the concept in the centre of which there are meanings of duration, namely ‘period of time’ (with the sub-meanings ‘past’, ‘present’, ‘future’, ‘epoch’), ‘moment’ (‘beginning’, ‘end’) and ‘cycle’ (‘human life’ = age, ‘life of nature’ = seasons of the year) (Afanasieva, 2007, p. 5–9).

According to the other approach embodied in the widely known NSM (The Natural Semantic Metalanguage) theory, there is a certain number of initial universal meanings – semantic primitives (or primes), presumably inherent to all human languages (Goddard, 2001; Wierzbicka, 1996). So, eight primes of TIME are distinguished: WHEN, AFTER, BEFORE, NOW, A LONG TIME, A SHORT TIME, FOR SOME TIME, MOMENT (Goddard, 2002, p. 301; Wierzbicka, 1996, p. 35).
Our investigation was conducted in the frame of structural semantics. Though the above-mentioned works devoted to the analysis of the contents of the mental unit of \textit{time} follow the line of the cognitive approach in linguistics, it is in no way contradictory. First, the concept and the notion are in whole-part relations, and, second, being a logical nucleus of the concept, it is the notion that primarily forms the semantic structure of nominative fragments of the language (Borysov, 2010, p. 63–64; Khairullina, 2018, p. 308–310). In other words, the notion serves as a basis for the grouping of lexical means within a thematically oriented nominative fragment of language called ‘the nominative field’. The term denotes the number of synonymic units of different parts of speech that verbalize the notion in the language (Borysov, 2005, p. 58). ‘The core of the nominative field’ (henceforth, CNF) is formed by the noun synonyms to the key lexeme (Borysov, 2005). The value of our research is that it complements the scientific papers devoted to the study of the structure of \textit{time} and the lexical means of its representation in present-day English through the systematization of the numerous noun synonyms to the lexeme \textit{time} and establishing correlations between synonymic groups in the corresponding CNF. These semantic connections should obviously be based on the integral meaningful components functioning in the synonymic sets. Such an approach allows us to define the semantic structure of the CNF of \textit{time} and reconstruct the structure of the notion of time in English language consciousness most accurately.

\section*{Methods and Material}

To achieve the goal of the article, the following methodological procedure was elaborated and implemented.

\textbf{Step 1.} First of all, we found and analyzed all the lexico-semantic variant(s) (=LSV(s)) of the noun \textit{time} available in present-day English dictionaries with a consequent construction of a logically structured list of all the LSVs of the lexeme. The term ‘LSV’ is used in this paper either as one of the meanings of the polysemous lexeme or the word (i.e., a union of the form of the lexeme and one of its meanings) and in this case the number of all LSVs construct the lexeme (Lyons, 1995; Palmer, 1976).

As Kövecses (2015, p. 273) states, ‘dictionaries of various kinds must be consulted before one obtains all, or at least most or much, of the lexical information that pertains to the lexeme we are interested in’. Following this approach, we used present-day (contemporary) British lexicographical sources and added several authoritative American dictionaries to get most of the lexical contents of \textit{time} nominations. Here we also follow the idea that dictionaries based on large corpora are vastly preferred to ones that are not (Kövecses, 2015, p. 273).

LSV, which is a basic meaning of the polysemous lexeme, is specified or expanded (metaphorically or metonymically) by the meanings of the other LSVs (Goldberg, 1988; Lakoff, 1993). So, it was important to present an all-embracing informational content of LSV of the unit \textit{time}, as it was crucial for determining metaphorical and metonymical meanings further. While constructing a generalized definition of LSV1, we took into consideration the core of the meaning suggested by most of the dictionaries. For example, if the lexeme \textit{time} is presented in the dictionaries as \emph{unlimited progress of existence}... (LED) / \emph{continuous passing}... (CCD) / \emph{nonspatial continuum}... (AHDEL), etc., when only in one source it is defined as a \emph{period}... (MWD), then a synthesized definition of LSV1 starts as follows: \emph{unlimited continued progress of existence}. The meaning \emph{period} is then referred to one of the subsequent LSVs of the lexeme. In the same way, we determine the other LSVs.

\textbf{Step 2.} The CNF of \textit{time} was established through the synonymic extension of the nucleus lexeme. Employing the ‘lexical method’ (Kövecses, 2015), we searched for the noun lexical items that refer to the notion of time in present-day English monolingual dictionaries, thesauri, and idiom dictionaries of various sorts. It was revealed that the synonyms of the lexeme \textit{time} found in synonymic dictionaries could be chosen by lexicographers as those ones that generally relate to the topic under investigation (see Lyons, 1995, p. 60–62). There are no uniform established criteria for their grouping and that is why the synonymic groups are constructed in such sources differently. We believe that it is a synthesized list of its LSVs that can be viewed as a ‘waymark’ for the synonymic extension of the nucleus \textit{time} lexeme.

In the thesauri (CD; CT; CRS; CET; FDF; LET; LDCE; MT; MWT; RT; SD; TC; WNLDE), all the words that reflect the meanings of each LSV of the lexeme \textit{time} were checked and selected. In its turn, each synonym (456 units) has LSVs that allow referring it to the CNF of \textit{time}. All in all, 2887 definitions have been gathered and analyzed.
However, it was not sufficient to gather all the words fixed by thesauri for this or that meaning of the lexeme time. The fact is that not all the units turn out to be true synonyms as they were united on the grounds of a thematic feature and, in this way, they represent the denotatum approximately. That is why a contextual criterion of synonym identification was applied and numerous illustrations from the dictionaries were looked through. For example, the interchangeability of the lexeme time and high tide seems doubtful on the surface. However, due to the examples in LED, it becomes clear that in the sentence But he took the news well, in part because he knows his time will come soon, the lexeme can be substituted with high tide with a minimum sense difference. Accordingly, we can rightfully refer high tide to the group of synonyms of time (LSV8.2.) — the successful, fortunate, or influential part of a person’s life or career.

Step 3. The semantic analysis of the gathered definitions was done via the componental method. It is carried out by dividing the meaning into minimal components, identifying their classification valeur (‘value’) and, therefore, establishing hierarchical relations within the semantic structure (Lyons, 1995). The semantic classification employed in the article includes 1) the superior categorial seme of the part of speech, which is always implicitly present; 2) the generic seme (hyperseme or archeseme) as the most general sense in the structure of the meaning, which refers a cognized denotatum to a definite mental category; 3) the differential seme (or hyposeme), which specifies an archeseme and reveals a definite feature of the denotatum (Filipec, 1994, p. 171). If we apply this typology, for instance, to the unit infinity (unlimited extent of time, space, or quantity (MWD)), a categorial seme of ‘noun’, an archeseme ‘extent’ and differential semes ‘unlimited’, ‘time’, ‘space’ and ‘quantity’ are established in its meaning. One more type of semes called integral (i.e., common for two or more meanings) is singled out when different meanings are compared (Goldberg, 1988, p. 30). The more integral semes (either a hyperseme or hyposeme) the words possess, the closer they are in their semantics. For example, the hyperseme ‘period’ and hyposeme ‘history’ are integral in the definitions of era (a long and distinct period of history) and chapter (a distinctive period in history (LED)).

Step 4. The synonyms of the CNF of time were grouped into synonymic row(s) (=SR(s)) based on the archesemes in their semantics. Describing the SRs, we pointed out the specific LSV of the unit time, to which an SR belongs. SRs are headed by the synonymic dominant(s) (=SD(s)), i.e., the most stylistically neutral and general unit(s) among other synonyms (Palmer, 1976, p. 60–63). The meaning of the SD functions as an archeseme for the meanings of the SR. The percentage of the synonyms distribution in the SRs was calculated.

Step 5. Finding out semantic ties between SRs helps to organize uncoordinated SRs into a coherent system or the semantic network of CNF of time. The semantic network is a universal model of knowledge presentation. It is interpreted as a data structure consisting of nodes and semantic ties between them (Hartley & Barnden, 1997). The whole lexical structure of language is regarded as a network of sense relations (Lyons, 1995, p. 102). In our case, it is the integral archesemes represented by the SRs that are the nodes of the network.

We used the classification of semantic ties between the separate units developed by Goldberg (1988) to establish the connections specifically between the SRs, which is also the novelty of our research. There are obligatory and optional semantic ties (Goldberg, 1988, p. 13). The obligatory tie is defined by the term ‘inclusion’ based on the identity of at least one seme in the meanings of the units. Inclusion is revealed in several types. Hyper-hyponymic relations are viewed as hierarchical between the units with wider and narrower semantics (hyponym / hyponym). Intersecting means that the units possess one or more common semes. Partitive relations are revealed between the words that name a whole object and its parts (Goldberg, 1988, p. 13–16).

The optional tie is realized in the phenomena of convergence and divergence. Convergence is based on the closeness of the contents of the semes (Goldberg, 1988, p. 13). It includes the 1) phase ties established through the components that mark the initial, intermediate and final stages of the action; 2) attraction ties revealed by the semes that point out a state or action that follows the preceding one; 3) reminiscent ties that signify the state or action that precedes another one; 4) temporal ties that reflect time reference of the action (Goldberg, 1988, p. 16–17).

Divergence is based on the contrast of senses. It has three types. Antonymic ties reflect polarity of the elements, inconsistency demonstrates contradiction of the elements, and the opposition suggests contrariety in meanings (Goldberg, 1988, p. 18).
Step 6. The task of this stage was to find out the semes that are central to the whole network, i.e., hypersemes to all the other semes uniting the SRs of time. These semes of the highest level of semantic hierarchy are those components that represent the main features of the notion of time. After this procedure, the semantic network of the CNF of the notion of time was visualized.

Step 7. With a great number of LSVs of the analyzed synonyms, it was logical to suggest that the relations between the integral hypersemes of the time nominations should also be based on these associations. Time is an abstract phenomenon and humans usually operate the notions of material objects, more understandable to them, to interpret things like that (Barcelona, 2002, p. 225–226; Lakoff, 1993, p. 207). That is why the reconstruction of the CNF of time was finally finished with consideration of the semantic ‘traces’ left by metaphor and metonymy in its boundaries. Though metonymical ties are realized, for example, in partitive or hyper-hyponymic relations mentioned above, this type is considered separately in this study.

To sum up, the following linguistic methods of analysis were used in the article: lexical, componential, descriptive, interpretative, quantitative methods as well as grouping and modelling.

Results and Discussion

The elaborated methodological procedure made it possible to establish the composition and structure of the CNF of time headed by the noun lexical unit time. The study of all the LSV₁ of the lexeme and their synthesis into one generalized meaning (to avoid certain lexicography subjectivity of the present-day English dictionaries) enabled us to compose its all-embracing definition:

<table>
<thead>
<tr>
<th>LSV₁</th>
<th>Definition</th>
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<tbody>
<tr>
<td>time (LSV₁)</td>
<td>the unlimited continued progress of existence that is measured in terms of events that succeed one another from past through the present to the future regarded as a whole.</td>
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Taking into account all the other LSVs of the unit time, we offer the following arrangement and specification of the LSVs within an expanded semantic structure:

a. LSV₁₁: the continued progress of existence as affecting people and things;
LSV₁₁₁: any system for reckoning or expressing time including systems of recording hours used in different parts of the world;
LSV₁₁₂: the personification of time, typically as an old man with a scythe and an hourglass.

b. LSV₁ a particular point in time measured and expressed in hours, minutes, or days, months and years, and as can be read from a clock, or watch or told by a calendar.

- LSV₁₃: the moment at which childbirth or death is expected;
- LSV₁₄: the particular point in the day at which people who are drinking in a bar in the UK have to finish their drinks and leave.

c. LSV₃ a particular moment that is suitable for a particular activity, or at which something is expected to happen, begin or end.
LSV₃₁: the moment at which childbirth or death is expected;
LSV₃₂: the particular point in the day at which people who are drinking in a bar in the UK have to finish their drinks and leave.

d. LSV₄ an indefinite period:
- LSV₄₁: a fairly long period of time;
- LSV₄₂: an indefinite but usually short period of time;
- LSV₄₃: an indefinite period extending into the future.

e. LSV₅ finite duration:
- LSV₅₁: a particular period being considered, especially the present;
- LSV₅₂: a historical period;
- LSV₅₃: season.

f. LSV₆ a period of life as allotted, available or used.
LSV$_{6.1}$: leisure; interval;

LSV$_{6.2}$: the hours and days that one spends at work as well as the normal rate of pay for time spent working.

g LSV$_{7}$ an instance of something happening or being done; an occasion; one of a number or series of occasions or repeated actions.

h LSV$_{8}$ a period or occasion, especially a personal one, characterized by some quality or experience; period of existence; lifetime:

LSV$_{8.1}$: conditions at present or at some specified period;

LSV$_{8.2}$: the successful, fortunate, or influential part of a person’s life or career; an exciting or noteworthy event;

LSV$_{8.3}$: a period of apprenticeship;

LSV$_{8.4}$: a term of military service;

LSV$_{8.5}$: (informal) a prison sentence.

i LSV$_{9}$ the rhythmic pattern or tempo of a piece of music; rate of speed in marching, driving, working, etc.

Thus, a great number of meanings of the lexeme time in the dictionaries can be reduced to these nine LSVs that reflect various aspects of time interpretation in English. As these key meanings are those semantic grounds for a further selection of the units that denote the notion of time in present-day English (AHDEL; CD; CCD; CED; CET; CT; CRS; DC; FDF; LDCE; LED; LET; MD; MT; MWD; MWT; OLD; POED; RT; SD; TC; WNLDE), we succeeded in constructing twenty-seven SRs of the CNF of time using the methods of componential analysis and grouping.

SR$_{1}$ is united by the SD time, with its meaning as an archeseme present in the semantics of all the units. However, the seme ‘time’ or ‘progress of existence’ constitutes a complex unity with another integral seme ‘reification’ (the process or result of representing something abstract as a material or concrete thing; giving definite content and form to a concept or idea) (MWD; MWT) that additionally specifies it as a reflection of the attempt of English-speaking people to grasp the essence of time in less abstract forms.

Thus, SR$_{1}$ (that comprises 3.3% of all the 456 lexical units) consists of, e.g.:

1 the fourth dimension (time (LSV$_{1.1}$)); time scale (LSV$_{1.2}$), local time / standard time (time (LSV$_{1.2}$)); (Old) Father Time, the soul of the world, the greatest innovator, the devourer of things, the nurse and the breeder of all good, that old common arbitrator, Old Time the clock-setter (time (LSV$_{1.3}$)), etc.

SR$_{2}$ (2.4%) is headed by the SD period (LSV$_{3}$) (an amount of time of indefinable length) with semantic reference to LSV$_{2}$. e.g.:

2 stretch, space, tract, while, length (LSV$_{1}$), way (LSV$_{2}$), distance (LSV$_{1}$), etc.

The ‘amount of time’ is a complex seme that unites SR$_{2}$.

SR$_{3}$ (0.9%) which also refers to LSV$_{1}$ consists of four lexical elements with infinity (unlimited extent of time) in the role of its SD:

3 eternity, perpetuity, sempiternity.

The SR is based on the components ‘endless’ and ‘time’.

SR$_{4}$ (5.9%) is led by the SD aeon (an indefinite and very long period of time) based on LSV$_{4}$ of the lexeme time, e.g.:

4 months, cycle, forever, blue moon, (many) moons, long (run), hours, ages (and ages), a coon’s age, a lifetime/all one’s life, (light/donkey’s) years, a dog’s age, etc.

The union of the semes ‘indefinite’ (lasting for an unknown or unstated length of time) and ‘long period’ (with gradational semes ‘very’/ ‘relatively’/ ‘seemingly’) forms SR$_{4}$.
The SD of \( \text{SR}_5 \) (5.7%) **moment / mo** (a short indefinite period of time) clings to LSV4.2. of time:

5 instant, no time, twinkle, wink, trice, eye-blink, snatch, (split) second, flash, heartbeat, tick, minute, sec, nanosecond, twinkling, shake, blip, etc.

The semes ‘indefinite’ and ‘short period’ integrate the units into \( \text{SR}_5 \).

\( \text{SR}_6 \) (the most extended SR: 13.2%), with the SD **period** (LSV.) (a particular length of time with a beginning and an end), possesses the units that belong to LSV\(_2\), LSV\(_5\) and LSV\(_6\) of time and is subdivided into six sub-rows. The synonyms of \( \text{SR}_6 \) are banded together by the complex seme **particular period**:

6 a \( \text{SR}_{6,1} \) (of LSV\(_6\)), e.g.: (the) hour(s) (LSV\(_7\)), day(s), season (LSV\(_7\)), phase, spell, passage, patch, moment, window (of opportunity), etc.

\( \text{SR}_{6,1} \) is based on the complex seme **particular point** and can be referred both to LSV\(_2\) and LSV\(_{5,1}\), e.g.:

point, moment, juncture, second, instant, minute, timing, stage, stroke, etc.;

\( \text{SR}_{6,2} \) is formed around **period when something happens** (LSV\(_7\)), e.g.:

6 b timing, episode, date, timescale (LSV\(_7\)), round, term, occasion (LSV\(_7\)), standing, session, interlude (LSV\(_7\)), longevity, etc.

\( \text{SR}_{6,2} \) is based on the **allotted period** (LSV\(_7\)), e.g.: the fullness of time, the sands of time, time slot, all the time in the world.

\( \text{SR}_{6,3} \) is united by the **period between two events** (LSV\(_7\)), e.g.:

6 c the intervening years/month/period, interval, lapse, interim, interlude (LSV2), (time)lag, etc.

The sub-row \( \text{SR}_{6,3} \) with an integral seme **period when something does not happen** contains the lexemes gap, hiatus.

The SD of \( \text{SR}_7 \) (0.4%) is **season** (LSV\(_7\)) (a period of the year characterized by a particular climatic feature or marked by a particular activity, event, or festivity) (LSV\(_{5,3}\) of time):

7 season, time of year.

The members of the set are united by the complex seme **period of the year** and belong to LSV\(_{5,3}\).

The meaning of **past** (the period of time or a segment of it that has elapsed; the events, phenomena, conditions, etc., that characterized an earlier historical period) plays the role of the archeseme for \( \text{SR}_7 \) (2.2%) and is realized in LSV\(_{5,2}\) of time:

8 history, yesterday, yesteryear, the (good) old days, bygone age/era/days, days of yore, etc.

A separate SR which also refers to LSV\(_{5,2}\) of time is \( \text{SR}_8 \) (3.7%) with the SD of **period** (LSV\(_7\)) (a particular amount of time in history):

9 era, age, epoch, day(s), years, chapter, page (in/of (something’s) history), world, floruit (LSV\(_7\)), generation, etc.

The complex seme **period in/of history** (you can refer to the events of the past or the length of time that something has existed as history) is central for \( \text{SR}_8 \).

\( \text{SR}_{9} \) (3%) has **present** (the period of time now occurring; a moment or period in time perceptible as intermediate between past and future; present occasion or affair) as a SD with the reference to LSV\(_{5,1}\) of the unit time:

10 now, nowadays, the here and now, today, the (present) day, moment, instant, etc.

\( \text{SR}_{11} \) (2%) is based on the SD **future** (a period of time following the moment of speaking or writing; events that are still to occur; the condition of a person or thing at a later date) referring to LSV\(_{4,3}\) of time:

11 futurity, time to come, aftertime, hereafter, tomorrow, by-and-by, offing, mañana, etc.
SR_{12} (2.9%) is based on the SD life (the period between birth and death, or the experience or state of being alive; the amount of time that something exists or works) with the reference to LSV_{6} of time:

12 lifetime, age, one's years, life expectancy, natural life, lifespan, one's days, allotted span, time on earth, experience (LSV_{5}), etc.

SR_{13} (5%) headed by the SD beginning is constructed by two sub-rows.

SR_{13a} is with the SD beginning proper (the point or occasion at which something starts) that refers to LSV_{3}, e.g.:

13 a start, inception, commencement, outset, genesis, era (LSV_{1}), origination, epoch (LSV_{2}), dawn(ing), prime, breakthrough (LSV_{2}), the off, get-go, kickoff, etc.

LSV_{3}, that realizes its first differential seme birth (the beginning or coming into existence of something) is a basis for building SR_{13a}:

13 b birth, date of birth / birthdate, due date, confinement.

A complex SR_{14} (5.5%) with the SD end(ing) consists of four parts.

SR_{14a} is headed by the SD end(ing) proper (the point in time when an action, event, or phenomenon ceases or is completed; a situation in which something is finished or no longer exists) clinging to LSV_{3} of time, e.g.:

14 a passing, expiration, expiry, finish, the end of the road/line, the final curtain, curtains, last gasp, endsville / Endville, etc.

SR_{14b} contains the SD death (the end of the life of a person or animal; the state of being dead; an occasion when someone dies) that realizes the second differential seme of LSV_{3}:

14 b great divide, one's last hour, dissolution.

SR_{14c} is united around LSV_{32} and has a SD close (the end of an event or of a period of time or activity):

14 c close, closing time.

SR_{14d} with orientation to LSV_{3} is led by the SD time limit (a date or time by which something must be done or completed):

14 d time limit, deadline.

SR_{15} (7%) has the SD spare time and is divided into two sub-rows. SR_{15a} with the SD spare time proper (the time when one is not working) is formed around LSV_{6}, e.g.:

15 a odd minute / moment, leave, holiday(s) / hols, vacation / vacay / vaca, etc.

SR_{15b} is led by the SD rest (a period of relaxation or freedom from work, activity, worry, etc.; a state of motionless or inactivity) subordinate to LSV_{61} of time, e.g.:

15 b R&R, leisure, pause, break(time), layoff, coffee break, spell, downtime, breather, smoko/ smoke-oh/smoke-ho, etc.

The definitions of the lexical units in SR_{15} contain the semes 'period', 'work' and semes of negation ('not'/'stop'/'away from'/'freedom from').

SR_{16}, SR_{17}, SR_{18} and SR_{19} are linked by the semes 'period' and 'serve' (spend a period in office, in an apprenticeship, or in prison; be employed as a member of the armed forces).

SR_{16} (2.4%) has a unit work (the period of time one spends in paid employment; mental or physical activity as a means of earning income; employment) as the SD orientated towards the time (LSV_{62}), e.g.:

16 office hours, day, workday/week, stint, full time, shift, watch, trick, etc.

SR_{16} is built around the semes 'period' and 'work'.

The SD apprenticeship (the period of time when a person is an apprentice (someone who works for an employer for a fixed period of time to learn a particular skill or job) heads SR_{16} (0.4%) of LSV_{83} of time:
17 apprenticeship, traineeship.

The semes ‘period’ and ‘learn skills’ are the key ones for the SR.

The unit enlistment (the period of time for which someone is a member of one of the armed forces) proves to be the SD of $\text{SR}_8$ (1.3%) of LSV$_{8,4}$ of time:

18 tour (of duty), duty (tour), hitch (LSV$_s$).

The $\text{SR}_8$ is bound by the semes ‘period’, ‘military service’ (service is the work done by people or equipment in the army, navy, or air force).

The SD of $\text{SR}_8$ (2.4%) is imprisonment (the punishment of being put into prison, the state of being in prison, or the time someone spends there) and it refers all its units to LSV$_{8,5}$ of the lexeme time, e.g.:

19 (custodial / prison) sentence, (prison) term, jail term / sentence, captivity, hitch (LSV$_s$), pondidge, etc.

The semes ‘period’, ‘punishment’, ‘prison’ unite the lexical units in $\text{SR}_8$.

$\text{SR}_{20}$ (8.3%) is headed by the unit heyday (the period of a person’s or thing’s greatest success, popularity, activity, or vigour) and is semantically subordinate to LSV$_{8,2}$ of time:

20 glory days/years, the good old days, prime (LSV$_s$), vigour, flower(ing), blossom, floruit, springtime, breakthrough (LSV$_s$), height, zenith, pinnacle, etc.

The combination of the semes ‘period’ and ‘glory’ (a state of great gratification or exaltation; extreme happiness or prosperity) gathers the words into $\text{SR}_{20}$.

$\text{SR}_{21}$ (2.4%) is headed by happening (something that occurs) with the reference to LSV$_1$ of time, e.g.:

21 occurrence, event, occasion (LSV$_s$), episode (LSV$_s$), round (LSV$_s$), experience (LSV$_s$), happenstance, case, clip.

The units of $\text{SR}_{21}$ are united by the complex seme ‘something that happens’ (to have existence or come into existence). The nominations instance, case and clip form $\text{SR}_{21}$ as the meanings additionally contain a component ‘example’ (of something happening).

$\text{SR}_{22}$ (3.2%) is characterized by the SD process (a series of changes that happen naturally; the course of time) with its reference to LSV$_{11}$ of time:

22 alteration, transformation, progress, development, flow, progression, advance, succession, evolution, etc.

The complex seme that unites $\text{SR}_{22}$ is ‘a series of changes’.

$\text{SR}_{23}$ (8.3%) is led by the SD situation (the set of conditions (a particular state of being or existence) that exist at a particular time in a particular place). The SR is in the frame of the LSV$_{8,4}$ of the lexeme time:

23 condition(s), position, circumstance(s), factor, (the) way, matrix, matters, background, the score, (the way of) life, fortunes, kettle of fish, etc.

The SD opportunity (an occasion or situation (the physical state of something) that makes it possible to do something that you want to do or have to do) is a leading unit of $\text{SR}_{24}$ (3.9%) which refers to LSV$_2$, e.g.:

24 golden opportunity, moment (LSV$_s$), season (LSV$_s$), day (LSV$_s$), place, opening (LSV2), window (of opportunity) (LSV$_s$), show, go, inning(s), etc.

$\text{SR}_{25}$ (0.9%) has existence (the state of being a real or living thing, or being present in a particular place, time, or situation) as a SD with the reference to LSV$_8$:

25 life (LSV$_s$), subsistence, presence (LSV$_s$).

Semantically subordinate to LSV$_{8,2}$ of time, $\text{SR}_{26}$ (11%) possesses the SD rate of pay (the amount of money workers are paid per hour, week, etc.; an hourly rate pay):
26  pay rate, (basic / base) wage, wages.

The component ‘amount (a quantity of something) of money workers are paid’ is a complex seme uniting these nominations into \( SR_{26} \).

\( SR_{27} \) (2.2%) is headed by the SD tempo (rate or speed; characteristic rate, rhythm, or pattern of work or activity) with its LSV, of time orientation:

27  rhythm, beat, metre / meter, cadence, pulse, measure, pace, stress, accent.

The seme ‘rate’ (a quantity, amount, or degree of something measured per unit of something else; the number of times something happens within a particular period of time) is pivotal to the units of \( SR_{27} \).

As the research proves, the established SRs are united through a great variety of semantic ties. Firstly, we shall deal with the obligatory ties of the CNF of time.

Hyper-hyponymic relations can be demonstrated on the example of the units of \( SR_4 \) with an integral seme ‘amount of time’, which are hypernyms to the units of \( SR_6 \) and \( SR_8 \) with the components ‘indefinite’ and ‘long period’ / ‘short period’ being at a higher level of hierarchical organization. The logic of the presentation of the established relations (twenty-nine cases) is that the first SR stands for a hyperonym, while the second SR is viewed as a hyponym:

1  \( SR_2 \) and \( SR_8 \);
2  \( SR_6 \) and \( SR_9 \);
3  \( SR_6.1 \) and \( SR_6.2 \);
4  \( SR_6.1.1 \);
5  \( SR_6.2 \) and \( SR_6.2.1 \);
6  \( SR_6.3 \) and \( SR_6.3.1 \);
7  \( SR_7 \);
8  \( SR_9 \);
9  \( SR_{12} \) and \( SR_{13} \);
10 \( SR_{13.1} \) and \( SR_{13.2} \);
11 \( SR_{18} \) and \( SR_{19} \);
12 \( SR_{20} \) and \( SR_{21} \);
13 \( SR_{22} \) and \( SR_{23} \);
14 \( SR_{24} \) and \( SR_{25} \);

As an example of intersecting, there is a unit lifetime that belongs to both \( SR_7 \) and \( SR_{12} \). While it denotes a very long period of time (LED) in \( SR_7 \), it names the duration of a person’s life (LED) in \( SR_{12} \). Therefore, \( SR_7 \) and \( SR_{12} \) intersect on the basis of the nomination lifetime. There are seventeen examples revealed between the SRs:

1  \( SR_2 \) and \( SR_{22} \) (way);
2  \( SR_4 \) and \( SR_{13} \) (lifetime);
3  \( SR_6.1 \) and \( SR_{24} \) (season, day);
4  \( SR_6.1.1 \) and \( SR_{24} \) (moment);
5  \( SR_{12} \) and \( SR_{24} \) (opening);
6  \( SR_6.2 \) and \( SR_{6.3} \) (interlude);
7  \( SR_{9.2} \) and \( SR_{21} \) (occasion, episode, round);
8  \( SR_9 \) and \( SR_{13.1} \) (era, epoch);
9  \( SR_{12} \) and \( SR_{23} \) (life);
10 \( SR_{13} \) and \( SR_{20} \) (prime);
11 \( SR_8 \) and \( SR_{18} \) (hitch);
12 \( SR_8 \) and \( SR_{20} \) (the good old days);
13 \( SR_{20} \) and \( SR_9 \) (floruit);
14 \( SR_{20} \) and \( SR_{13.1} \) (breakthrough).
As for **partitive** relations, an example of the tie between \( \text{SR}_3 \) (with an integral seme ‘period’), \( \text{SR}_31 \) (‘beginning’) and \( \text{SR}_141 \) (‘end’) can be demonstrated because a **period** is a particular length of time with a **beginning** and an **end** (LDCE). The logic of the presentation of the established ties (twelve cases) is the same: 1) \( \text{SR}_6 \text{ and } \text{SR}_131 \); \( \text{SR}_{141} \); 2) \( \text{SR}_2 \text{ and } \text{SR}_{12} \); \( \text{SR}_{132} \); \( \text{SR}_{142} \); \( \text{SR}_{143} \); \( \text{SR}_{144} \); \( \text{SR}_{16} \text{ } \text{SR}_{20} \).

As we see, hyper-hyponymic relations are the dominant type of obligatory ties in the CNF of **time**.

All the subtypes of optional ties were established. The subtype of convergence is realized in 1) **phase** relations (between 1. \( \text{SR}_1 \text{ and } \text{SR}_2 \), \( \text{SR}_3 \), \( \text{SR}_4 \) and 2. \( \text{SR}_5 \text{ and } \text{SR}_6 \); 2) **attraction** (\( \text{SR}_{16} \text{ and } \text{SR}_{25} \)); 3) **reminiscent** relations (between \( \text{SR}_{141} \) and \( \text{SR}_{25} \); \( \text{SR}_{142} \); \( \text{SR}_{12} \); \( \text{SR}_{144} \) and \( \text{SR}_{93} \)); 4) **temporal** relations (\( \text{SR}_{21} \text{ } \text{SR}_{25} \) and \( \text{SR}_{6} \text{ } \text{SR}_{12} \)).

**Divergence** is demonstrated by the antonymic (polar) relations between

1. \( \text{SR}_5 \text{ and } \text{SR}_3 \);
2. \( \text{SR}_3 \text{ and } \text{SR}_5 \);
3. \( \text{SR}_{6,2} \text{ and } \text{SR}_{6,3} \);
4. \( \text{SR}_6 \text{ and } \text{SR}_{11} \);
5. \( \text{SR}_{131} \text{ and } \text{SR}_{141} \);
6. \( \text{SR}_{132} \text{ and } \text{SR}_{142} \);
7. \( \text{SR}_{15} \text{ and } \text{SR}_{16} \).

When it comes to the polarity in the lexical structure of the same unit, then this phenomenon is called enantiosemy (Melikyan et al., 2016, p. 129). As the results show, lexeme **time** turns out to be a bright example of enantiosemy.

The **inconsistency** was revealed between 1) \( \text{SR}_{144} \text{ and } \text{SR}_{25} \); 2) \( \text{SR}_6 \text{ and } \text{SR}_{20} \).

The **opposition** between the SRs of **time** is absent. Thus, convergence (forty-one cases) is the most represented subtype of the ties with dominating temporal relations.

Undoubtedly, all the SRs of the CNF of **time** are interlinked. After establishing all the ties, we have reconstructed a hierarchically organized semantic network of the CNF of **time** (see Fig. 1). It is clear that the SRs verbalize a complex system of four hypersemes: 1) ‘progress of existence (‘time’), reification’; 2) ‘quantity’ (a blue circle on Fig. 1); 3) ‘something that happens’ (a yellow circle on Fig. 1), 4) ‘state’ (a pink circle on Fig. 1). The singled out semantic components are of the highest degree of generalization as they represent the basic features of the verbalized notion of time.

The combinations of the hypersemes determine the semantics of **time** (LSV,) and are present in the meaning of every synonym of the CNF of **time**. Let us take a closer look at the semantic components. The complex seme ‘progress of existence (‘time’), reification’ is an integral component on the background of which all the other hypersemes are profiled. It is an inseparable union of the sèmes that fixes the attempt of English-speaking people to understand the abstract essence of **time** phenomenon in more concrete forms, as, for example, the units of \( \text{SR}_1 \), \( \text{SR}_2 \), \( \text{SR}_3 \), \( \text{SR}_{14} \), \( \text{SR}_{22} \) etc. brightly demonstrate. The component ‘quantity’ is a hyperseme for the units of \( \text{SR}_2 \text{ } \text{SR}_{20} \) and \( \text{SR}_{25} \). The sème ‘something that happens’ is a hyperseme for \( \text{SR}_{21} \text{ } \text{SR}_{22} \). The semantic component ‘state’ is a hyperseme for \( \text{SR}_{23} \text{ } \text{SR}_{25} \).

The sèmes construct different configurations in the semantics of the synonyms. One of the hypersemes becomes a dominant one in this or that LSV, while the other sèmes specify it. For example, the definitions of the units of \( \text{SR}_2 \text{ } \text{SR}_{20} \) with the hyperseme ‘quantity’ contain the component ‘something that happens’ as a hyposeme, whereas the sème ‘quantity’ functions as a hyposeme in \( \text{SR}_{22} \text{ } \text{SR}_{25} \).

It is time to shed light on the associative interpretation of the notion of time embodied in its synonyms. The union of its notional features ‘progress of existence (‘time’), and ‘reification’ is primarily based upon the analogy between time and living beings, objects or phenomena. It makes the meanings of a number of the units, for example, of \( \text{SR}_4 \), metaphorical (e.g., **Father Time**, **that old bald cheater**, **the soul of the world**, **the devourer of things**, etc.). The units that actualize ‘quantity’ (e.g., \( \text{SR}_2 \text{ } \text{SR}_{20} \)) also tend to represent metaphorical connections of the notions of time and objects of reality (e.g., **fullness of time**, **twinkle**, **the sands of time**).
The lexemes of SR\textsubscript{21} and SR\textsubscript{25} that disclose the notional features of ‘state’ (e.g., imprisonment, glory days, experience, one’s last hour, etc.) and ‘something that happens’ (e.g., progress, chance, evolution, advance, etc.), or their intersection, in the meanings, realize metonymical connections.

The semantics of the lexical units of the CNF of time can also reveal both metaphorical and metonymical relations observed, for example, in SR\textsubscript{2}–SR\textsubscript{20}, SR\textsubscript{23}, SR\textsubscript{26} (e.g., great divide, a dog’s age, one’s days, hiatus, kettle of fish, window, bloom, page, summit, etc.). SR\textsubscript{27} is an exceptional row. Although it is connected with ‘quantity’, it is metonymical to SR\textsubscript{2}. The other examples of the metonymical shift are noticed in the case of SR\textsubscript{21} in regard to SR\textsubscript{21.1}, and SR\textsubscript{16} in regard to SR\textsubscript{26}.

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The semantic network of the CNF of the notion of time in present-day English

| ‘future’ | ‘particular period’ | ‘life’ |
| ‘present’ | ‘particular point’ | ‘beginning’ |
| ‘period when sth happens’ | ‘period between two events’ | ‘birth’ |
| ‘allotted period’ | ‘period when sth does not happen’ | ‘end’ |
| ‘period of the year’ | | ‘death’ |
| ‘indefinite’, ‘short period’ | | ‘close’ |
| ‘indefinite’, ‘long period’ | | ‘period by which sth must be done’ |
| | ‘amount of time’ | | |
| | ‘endless’, ‘time’ | ‘period’, ‘work(ing)’ |
| | | ‘rest’ |
| ‘rate’ | | | |
| ‘amount of money workers are paid’ | | | |
| | | | |
| ‘existence’ | | | |
| | | | |
| ‘opportunity’ | | | |
| | | | |
| | ‘situation’ | | |
| | | | |
| | ‘series of changes’ | | |
| ‘time’ | ‘reification’ | | |
| ‘quantity’ | | | |

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Fig. 1 The semantic network of the CNF of the notion of time in present-day English
In this paper, the noun lexemes that verbalize the notion of time in present-day English were established, analyzed and grouped into synonymic rows within the CNF of time headed by the lexeme time. The semantic network of the CNF was revealed and thus the contents of the notion of time was reconstructed.

The starting point for the research was the study of the key lexeme time, which was discovered to possess nine LSVs. The selection of the synonyms to these LSVs from the contemporary English lexicographical sources enabled us, first, to define the composition of the CNF of time (456 units), and, second, to construct twenty-seven SRs of its structure with such SDs as time (SR1), period (SR2,6,9), infinity (SR3), onan (SR4), moment (SR5), season (SR6), past (SR7), present (SR8), future (SR9), life (SR10), beginning (SR11), end (SR12), spare time (SR13), work (SR14), apprenticeship (SR15), enlistment (SR16), imprisonment (SR17), heyday (SR18), happening (SR19), process (SR20), situation (SR21), opportunity (SR22), existence (SR23), rate of pay (SR24), tempo (SR25). It should be noted that SR1 (13.2% of all the lexical units) and SR20,23 (8.3%) are the largest among the SRs, whereas SR17 (0.4%) and SR25 (0.9%) are the smallest sets of the CNF.

The SRs are formed on the basis of the central hypersemes, which organize the semantic network of the CNF of time, namely ‘progress of existence’ (‘time’), ‘reification’; ‘quantity’; ‘something that happens’ and ‘state’. These semes are of the highest degree of generalization and represent the main features of the notion of time expressed in the semantics of the lexical units of the CNF.

The research proves that all the hypersemes are profiled on the background of the semantic union of ‘progress of existence’ (‘time’), reification’. This is because various aspects of time fixed by the synonyms are interpreted in terms of ‘quantity’ in close connection to ‘something that happens’ and ‘state’. It is clear that to understand the phenomenon of time, the notions of less abstract things are actively employed by English-speaking people by association. As a result, the nominations of time represent – metaphorically and metonymically – such aspects of reality as living beings or objects, their qualitative and quantitative measurement, events or particular conditions that someone or something is in. In sum, it also means that obligatory and optional ties between the SRs of the CNF of time coexist with the metaphorical and metonymical connections revealed in the synonyms. The results of the research demonstrate that the semantic network of the CNF is mainly based on hyper-hyponomic relations as the most fundamental among the other semantic ties.

The proposed study will be continued. It is necessary to carry out further research on the other constituents (adjectival, adverbial, verbal) of the nominative field of time to widen our understanding of time interpretation fixed in present-day English.

References


4 Borysov, O. O. (2010). Krytyka rozuminnia terminu "konsept" u suchasni lnhvistytsy [The criticism of understanding of the term "the concept" in modern linguistics]. Funktsionalnaya lingvistika, 1(1), 63-65. [In Ukrainian].


Marija Mai, Oleksii Borysov. „Laiko“ sąvokos verbalizacija šiuolaikinėje anglų kalboje

Universali „laiko“ sąvoka kartu su pagrindine „erdvės“ sąvoka lemia daugybės kitų žmogaus sąmonės sampratų formavimąsi. Laiko interpretacijos rezultatai fiksuojami visų pirma nacionalinių kalbų leksinių vienetų semantikoje. Šio tyrimo naujovė yra ta, kad buvo nustatyti ir išanalizuoti šiuolaikinės anglų kalbos leksemos time daiktavardžių sinonimai, o po to jie sugrupuoti į sinonimų eiles vardinio lauko „laikas“ šerdies ribose.

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