Features of the Latin-English-Ukrainian translation of anatomical terms-metaphores with the modifier – the name of the receptacle

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Lysenko N., Berestova A., Lytvynenko O., Shutak L. PECULIARITIES OF THE LATIN-ENGLISH-UKRAINIAN TRANSLATION OF ANATOMICAL TERMS-METAPHORS WITH THE MODIFIER - THE NAME OF THE RECEPTACLE

The article examines the peculiarities of the Latin-English-Ukrainian translation of anatomical metaphors with the modifier – the name of the receptacle. Terminologia Anatomica and the publication "International Anatomical Terminology (Latin, Ukrainian, Russian and English equivalents)" edited by V. Cherkasov (2010) have been chosen as the actual source. This analysis has been done for the first time.

The continuous sampling method was used to find the appropriate anatomical metaphorical binaries, as well as the semi-component analysis and the comparative method have been used to explain the available translational transformations. The translation of such terminological compounds as laryngeal sac, lacrimal sac, hair follicle sac, mucous (synovial) bursa, milk cistern, lumbar cistern, auditory capsule, joint capsule, ampulla of the vas deferens, chamber of the eyeball etc. has been studied.

The majority of the mentioned metaphorical terms are constructed by similarity, taking into account color, shape, etc., or functional similarity.

Key words: anatomical metaphor, metaphorical binary, modifier, term-metaphor.

## Лисенко Н., Берестова А., Литвиненко О., Шутак Л. ОСОБЛИВОСТІ ЛАТИНСЬКО-АНГЛІЙСЬКО-УКРАЇНСЬКОГО ПЕРЕКЛАДУ АНАТОМІЧНИХ ТЕРМІНІВ-МЕТАФОР ІЗ МОДИФІКАТОРОМ – НАЗВОЮ ВМІСТИЛИЩА

У статті розглядаються особливості латинсько-англійсько-українського перекладу анатоміних метафор із модифікатором — назвою вмістилища. Фактичним джерелом обрано Теrminologia Anatomica та видання «Міжнародна анатомічна термінологія (латинські, українські, російські та англійські еквіваленти» за редакцією В. Черкасова (2010 р.). Зазначений аналіз робиться вперше.

Застосовано метод суцільної вибірки для пошуку відповідних анатомічних метафоричних бінарм, а також використано семно-компонентний аналіз та порівняльний метод, що пояснює наявні перекладацькі трансформації. Досліджено переклад таких термінологічних сполук, як мішечок гортані, сльозовий мішок, сумка волосини, слизова (синовіальна) сумка, молочна цистерна, поперекова цистерна, слухова капсула, суглобова капсула, а м п у л а с і м'я в и н о с н о ї протоки, камера очного яблука тощо.

Переважна більшість зазначених метафоричних термінів побудована подібності, до уваги беруться колір, форма тощо або функційній схожості.

Ключові слова: анатомічна метафора, метафорична бінарма, модифікатор, термінметафора.

Statement of the problem and its connection with important scientific tasks. Medical terminology is a popular topic for scientific research among modern Ukrainian linguists, which is explained by the rapid development of the field. Medical science, practice and medical education are international in nature and require a common, understandable, and universally recognized language.

Latin is such a language. Equally important is the use of uniform, official terminology in the state language in the state system of health care and education, in scientific publications and medical documents.

Each metaphor, in particular a metaphor-term, is a consequence of mental and linguistic activity of a person, which in the process of creation relies on a set of presuppositional background knowledge, marked by the peculiarities of the national worldview. Hence, there is a need for a comparative analysis of meaning transformations when translating medical metaphorical vocabulary from Latin into English and Ukrainian, as well as English-Ukrainian translation.

Actuality of the topic. As of today, there is no thorough research that would comprehensively describe the processes of the emergence of metaphorical valence in the medical terminology, in particular in anatomical and pathoanatomical terminology; a comparative analysis of the equivalents of terms-metaphorical binaries in Ukrainian, English, and Latin languages (international nomenclature) is also missing.

Analysis of recent studies that have begun to address the problem. The analysis of special literature proves that there is a number of approaches to the classification of translation transformations.

The semantic processes which took place during the formation of anatomical metaphorical binary terms in the Ukrainian language, comparison with the English equivalent and the international version in TA are considered to be an interesting and relevant topic for research.

Analyzing the borrowed medical terminology in the English language, O. Belyaeva and M. Melashchenko grouped lexical units into three main categories:

- 1) adapted (assimilated) Latin and Latinized Greek terms that have undergone certain changes in modern English and French;
- 2) non-adapted (non-assimilated) words that retain the original form of classical languages;
- 3) "hybrid borrowings" as a special combination of the two previous types. The authors note that the study revealed the fact that modern French assimilated significantly more terms from classical languages, while English most often retains their original (unadapted) form<sup>1</sup>.

For the translation of anatomical terms, Yu. Makarenko and I. Tkachenko suggest using the following methods:

- 1. transcoding and match selection: lateral ligament латеральна зв'язка;
- 2. match selection: calcaneofibular ligament п'яткова малогомілкова зв'язка;
- 3. descriptive translation: mucosal що відноситься до слизової оболонки<sup>2</sup>.

Unfortunately, the authors do not detail the methods and do not give separate examples of the translation of metaphorical binaries.

- P. Newmark offers the following translation options for metaphors:
- 1) preserving the image in the translation language;

<sup>&</sup>lt;sup>1</sup>Melaschenko M., Bieliaieva O., Lysanets Yu. Lexical Borrowings from Classical Languages in the English and French Medical Terminologies: A Comparative Study. *Wiadomości Lekarskie*. 2018. Vol. 71. Nr.5. P. 1081

<sup>&</sup>lt;sup>2</sup>Makarenko Yu., Tkachenko I. Do problemy perekladu medychnykh termieiv v naukovomu anhlomovnomu medychnomu teksti. [To the problem of translation of medical terms in a scientific English-language medical text]. *Naukovi zapysky Mizhnarodnoho humanitarnoho universytetu.* 2014. Vol. 21. P. 267.

- 2) replacing the image of the source language with a standard image of the translation language, which does not contradict with the culture of the target language;
- 3) reproduction of a metaphor using a figurative comparison with the preservation of the image (but with a possible change of expression);
- 4) translation of a metaphor (or figurative simile) using a figurative simile (or, sometimes, a metaphor) with an interpretation of the meaning (this facilitates understanding, but may lead to a loss of expressiveness of the statement);
- 5) rendering the semantics of the metaphor descriptively (can be used if the metaphor is vague and preservation is inappropriate, although certain aspects of the instruction of the statement may be lost);
  - 6) omitting the metaphor if it is redundant (optional);
- 7) preservation of the metaphor with the concretization of the meaning in order to strengthen the image <sup>3</sup>.

But the classification of modifier types of the metaphorical term according to V. Karaban seems to be the most successful<sup>4</sup>:

- a metaphorical word that has the same or a very similar character of imagery;
- a metaphorical word that has a different character of imagery;
- a non-metaphorical word that conveys only the denotative meaning of the English metaphorical word, not imagery.

**The aim of the research.** To analyze the peculiarities of the Latin-English-Ukrainian translation of anatomical metaphors with the modifier name of the receptacle.

**Presentation of the main research material.** To select the lexical material for the study, we used the continuous sampling method from the publication "International Anatomical Terminology (Latin, Ukrainian, Russian and English equivalents)" edited by V. Cherkasov (2010)<sup>5</sup>, also used TA (Terminologia Anatomica), published on the website International federation of associations of anatomists<sup>6</sup>.

<sup>&</sup>lt;sup>3</sup>Newmark P. About Translation. Clevedon: Philadelphia Multilingual Matters, 1991. P. 87-90

<sup>&</sup>lt;sup>4</sup>Karaban V. Posibnyk-dovidnyk z perekladu anhliiskoi naukovoi ta tekhnichnoi literatury na ukrainsku mov. [Handbook for translating English scientific and technical literature into Ukrainian]. Vinnytsia: Nova knyha. 2001. P. 22. [in Ukrainian]

<sup>&</sup>lt;sup>5</sup>Cherkasov V., Bobryk I., Huminskyi Yu., Kovalchuk O. Mizhnarodna anatomichna terminolohiia (latynski, ukrainski, rosiiski ta anhliiski ekvivalenty [International anatomical terminology (Latin, Ukrainian, Russian and English equivalents)] / za red V. Cherkasova. Vinnytsia: Nova knyha, 2010. 391 p.

<sup>&</sup>lt;sup>6</sup>Terminologia Anatomica. URL: https://fipat.library.dal.ca/ta2/

Metaphors belonging to the semantic class «name of the receptacle», — the fourth largest group among the anatomical medical terms which we have analyzed. The most popular modifier is **мішок (мішечок)** (мішечок гортані, сльозовий мішок, анальний мішок, пневризматичний мішок, черевний мішок, горловий мішок, грижовий мішок, защічний мішок, зародковий мішок, шкірний мішок, перикардальний мішок, суглобний мішок, ембріональний мішок etc.) and **сумка** (серцева сумка, суглобова сумка, підм'язова сумка, підшкірна сумка, глоткова сумка etc.).

Also, long metaphorical series form modifiers **цистерна** (міжніжкова цистерна, молочна цистерна, поперекова цистерна, мозолиста цистерна etc.) and **капсула** (слухова капсула, суглобова капсула, капсула кришталика, жирова капсула, носова капсула). A typical option for emergence is external similarity and functional similarity.

In binaries with a modifier *Μίωοκ (Μίωενοκ)* the nuclear sema remains relevant: "a container sewn from a piece of coarse fabric for storing and transporting loose bodies and various things, as well as a large paper bag for the same purpose» <sup>7</sup>, the emphasis is on the "receptacle" component. Accordingly, when forming an anatomical term - a metaphor, functional similarity is taken as a basis.

Lat.	sacculus laryngis	saccus lacrimalis
Eng.	laryngeal saccule	lacrimal sac
Ukr.	мішечок гортані <sup>8</sup>	сльозовий мішок <sup>9</sup>

The translation from Latin and English is carried out by a metaphorical word that has the same figurative character: sacculus (saccus) (Lat.) – sac (Eng.) and – мішок (мішечок) (Ukr.). The only difference, which is a generally isolated phenomenon, is the translation of the genitive metaphor from Latin into English adjectival binary.

In metaphorical binaries with the component **cymκa**, the meaning "a structure of connective tissue that surrounds or contains joints, internal organs, etc." is actualized <sup>10</sup>, included in the dictionary codification. From a morphological point of view, binaries retain their features when translated.

<sup>&</sup>lt;sup>7</sup>Slovnyk ukrainskoi movy: V 11-ty tomakh. [Dictionary of the Ukrainian language: In 11 volumes]. Kyiv: Naukova dumka,. 1970-1980. Vol. IV. P. 762 [in Ukrainian].

<sup>&</sup>lt;sup>8</sup>Cherkasov V., Bobryk I., Huminskyi Yu., Kovalchuk O. Mizhnarodna anatomichna terminolohiia (latynski, ukrainski, rosiiski ta anhliiski ekvivalenty [International anatomical terminology (Latin, Ukrainian, Russian and English equivalents)] / za red V. Cherkasova. Vinnytsia: Nova knyha, 2010.  $\Phi\Phi_{p}$ .

<sup>&</sup>lt;sup>9</sup>Ibidem. ФФР.

<sup>&</sup>lt;sup>10</sup>Slovnyk ukrainskoi movy: V 11-ty tomakh. [Dictionary of the Ukrainian language: In 11 volumes]. Kyiv: Naukova dumka,. 1970-1980. Vol. IX, P. 837 [in Ukrainian].

Lat.	bursa pili	bursa synovialis
Eng.	bursa pili	synovial bursa
Ukr.	сумка волосини <sup>11</sup>	слизова (синовіальна) сумка <sup>12</sup>

The translation from Latin and English is carried out by a metaphorical word that has the same figurative character.

In metaphorical compounds with the modifier cistern, the term "storage, tank for water and other liquids" remains relevant "13, the transfer occurs on the basis of functional similarity.

Lat.	cisterna chyli	cisterna lumbalis
Eng.	chyle cistern	lumbar cistern
Ukr.	молочна цистерна <sup>14</sup>	поперекова цистерна <sup>15</sup>

The translation from Latin and English is carried out by a metaphorical word that has the same figurative character: cisterna (Lat.) – cistern (Eng.) – цистерна (Ukr.).

A sufficiently productive modifier in the formation of metaphorical series is a **capsule**. The lexeme actualizes the term "a thin membrane that covers internal organs or painful formations in the body" <sup>16</sup>. Transfer occurs on the basis of functional similarity - the ability to wrap and protect internal organs.

Lat.	capsula lentis	capsula articularis
Eng.	capsule of lens	articular capsule
Ukr.	слухова капсула <sup>17</sup>	суглобова капсула <sup>18</sup>

<sup>&</sup>lt;sup>11</sup>Cherkasov V., Bobryk I., Huminskyi Yu., Kovalchuk O. Mizhnarodna anatomichna terminolohiia (latynski, ukrainski, rosiiski ta anhliiski ekvivalenty [International anatomical terminology (Latin, Ukrainian, Russian and English equivalents)] / za red V. Cherkasova. Vinnytsia: Nova knyha, 2010. ΦΦΡ.

<sup>&</sup>lt;sup>12</sup>Ibidem. ФФР.

<sup>&</sup>lt;sup>13</sup>Slovnyk ukrainskoi movy: V 11-ty tomakh. [Dictionary of the Ukrainian language: In 11 volumes]. Kyiv: Naukova dumka,. 1970-1980. Vol. IX, P. 219 [in Ukrainian].

<sup>&</sup>lt;sup>14</sup>Cherkasov V., Bobryk I., Huminskyi Yu., Kovalchuk O. Mizhnarodna anatomichna terminolohiia (latynski, ukrainski, rosiiski ta anhliiski ekvivalenty [International anatomical terminology (Latin, Ukrainian, Russian and English equivalents)] / za red V. Cherkasova. Vinnytsia: Nova knyha, 2010. ΦΦΡ.

<sup>&</sup>lt;sup>15</sup>Ibidem. ФФР.

<sup>&</sup>lt;sup>16</sup>Slovnyk ukrainskoi movy: V 11-ty tomakh. [Dictionary of the Ukrainian language: In 11 volumes]. Kyiv: Naukova dumka,. 1970-1980. Vol. IV, P. 97 [in Ukrainian].

<sup>&</sup>lt;sup>17</sup>Cherkasov V., Bobryk I., Huminskyi Yu., Kovalchuk O. Mizhnarodna anatomichna terminolohiia (latynski, ukrainski, rosiiski ta anhliiski ekvivalenty [International anatomical terminology (Latin, Ukrainian, Russian and English equivalents)] / za red V. Cherkasova. Vinnytsia: Nova knyha, 2010. ΦΦΡ.

<sup>&</sup>lt;sup>18</sup>Ibidem. <mark>ФФР.</mark>

The translation from Latin and English is carried out by a metaphorical word that has the same figurative character.

Much smaller in number is the group of binarms with the ampoule modifier and the camera modifier. In the lexeme, the nuclear ampoule remains as "a hermetically sealed glass vessel for storing medicinal and other substances in a sterile state" <sup>19</sup>.

Eng. ampulla of ductus deferens diverticula of ambulla Ukr. ампула сім'явиносної дивертикули ампули <sup>21</sup>	diverticula ambullae	ampulla ductus deferentis	Lat.
Ukr. ампуласім'я виносної дивертикули ампули <sup>21</sup>	diverticula of ambulla	ampulla of ductus deferens	Eng.
протоки <sup>20</sup>	дивертикули ампули <sup>21</sup>		Ukr.

The transfer takes place on the basis of functional similarity - the ability to wrap, contain.

In the lexeme, the camera acquires relevance as "the inner hollow part of any building, machine or device" 22.

Lat.	c a m e r a e bulbi
Eng.	chambers of eyeball
Ukr.	камера очного яблука <sup>23</sup>

Transfer occurs on the basis of functional and external similarity – the ability to wrap, contain, have a hollow inside. In addition, the anatomical binary term *συμε πόλιγκο* is translated into English as *eyeball*, into Latin – *bulbus oculi* (eye bulb). Here a translation with a metaphorical word is observed that has a similar character of imagery (similarity of form is taken as the basis of the transfer).

Metaphors belonging to the semantic class "world of objects" are one of the most numerous groups among anatomical medical terms.

When forming metaphorical anatomical terms belonging to the semantic class «name of the receptacle», the most popular modifier is *μίωοκ (μίωενοκ), сумка* and *μμεπερμα*.

<sup>&</sup>lt;sup>19</sup>Slovnyk ukrainskoi movy: V 11-ty tomakh. [Dictionary of the Ukrainian language: In 11 volumes]. Kyiv: Naukova dumka.. 1970-1980. Vol. I. P. 40 [in Ukrainian].

<sup>&</sup>lt;sup>20</sup>Cherkasov V., Bobryk I., Huminskyi Yu., Kovalchuk O. Mizhnarodna anatomichna terminolohiia (latynski, ukrainski, rosiiski ta anhliiski ekvivalenty [International anatomical terminology (Latin, Ukrainian, Russian and English equivalents)] / za red V. Cherkasova. Vinnytsia: Nova knyha, 2010. P. 128

<sup>&</sup>lt;sup>21</sup>Ibidem. P. 128

<sup>&</sup>lt;sup>22</sup>Slovnyk ukrainskoi movy: V 11-ty tomakh. [Dictionary of the Ukrainian language: In 11 volumes]. Kyiv: Naukova dumka,. 1970-1980. Vol. IV, P. 82 [in Ukrainian].

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Less productive modifiers for the formation of metaphorical binaries are капсула, ампула, камера.

## Conclusions and prospects for further research.

In the metaphorical binaries studied in this research, the translation is usually carried out by a metaphorical word that which the same figurative character, sometimes by a non-metaphorical word, then a non-metaphorical binary term is formed. We also observe the translation from Latin into English with a monoterm.

The research can be used in teaching the theory of translation for philology students, as well as in higher educational institutions of a medical profile when teaching the disciplines "Ukrainian language for professional purpose", "English language for professional purpose", "Latin medical terminology", as well as in translation practice.

The study of metaphorical binaries among folk names of medicinal plants is considered to be a productive material for further research.

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