ON THE ORIGIN OF THE POLISH WORD \textit{FARMACJA}

The aim of this paper is to discuss the origin of the Polish word \textit{farmacja} and establish its deep-rooted etymology. The author provides an outline of the history of the word in Polish and presents its direct source, i.e. the Latin word \textit{pharmacia}, describes the word family in Latin and indicates that the Greek etymon \textit{φαρμακεία} provided the basis of the Latin form. The analysis of the word family, to which the Greek word belongs, showed a close relationship with semantic fields such as making poison and practising magic. The key expression turned out to be the Greek form \textit{φάρμακον}, the origin of which remains unclear. Many hypotheses have been proposed, none of which, unfortunately, is satisfactory.

Keywords: etymology, loanwords, borrowings, meaning

1. Introduction

The aim of this article is to explore the history and etymology of the word \textit{farmacja} in Polish. This topic is not new, as it has been the focus (at least partially) of a number of earlier studies (cf. Tadajczyk 2000, 2002). Nowadays the word functions as a general term\footnote{Based on the division into general and specific terms proposed by Waniakowa (2003: 15, 18), the literature on this subject also includes a number of other analyses. General terms name general concepts, and specific terms name specific concepts that cover only some of the objects of a given general class. In this case, the general term is \textit{farmacja}, while the specific terms are, for example, \textit{farmacja szpitalna} and \textit{farmacja stosowana}.}. Its basic definition is as follows: ‘the science and art concerned with the preparation and standardization of drugs’. As such, it has numerous counterparts in foreign languages (cf. Engl. \textit{pharmacy}, Fr. \textit{pharmacie}, Germ. \textit{Pharmazie}, Russ. \textit{фармация}). It is obvious that both the Polish term and its foreign equivalents originate from the same primal etymon
(see below), although their direct language sources could be different. Research on the origin of words is usually limited to the following issues only: determining whether a given word is native (inherited) or a borrowing, and identifying its direct source, i.e. the word from which it is derived. However, it is possible to go further, namely to try and locate the oldest, most primal source of the investigated lexeme and describe the path that leads from the contemporary word to this basic form. This path appears particularly interesting in the case of loanwords. Then we deal not only with a vast area where words travel through history, but also with the interpenetration of different cultures, which is reflected in the semantics of the studied lexemes.

Reaching back to the oldest roots of modern words, which are borrowings, is therefore an opportunity to trace the semantic development of subsequent links in the chain of forms and meanings, starting with the oldest, most primary form that can be established. As a consequence, such an analysis makes it possible to determine the original meaning from which – through various semantic transformations – a modern expression derives its meaning. The aim of these reflections is to show the origin of the term farmacja precisely in this way. The starting point is the Polish contemporary form, and the analysis covers forms increasingly more ancient in origin, back to the earliest primary source that can be distinguished. This approach provides a platform not only for discovering the oldest possible roots of a particular word, but also for determining the scale and nature of semantic transformations.

2. The word farmacja in Polish

The Polish term farmacja is an internationalism (see above). The first attestation of this word in Polish is the form farmacyja from 1595 (SP XVI s. v.) meaning ‘sorcery with poisoned foods’. This is a generalized form presented by the authors of SP XVI, because the actual record that appears in the source is as follows: phārmātiā (acc. sg.). As can be seen, here this form is characterized, on the one hand, by its Latin spelling, and on the other by its adaptation to Polish inflection, as evidenced by the feminine accusative ending -ą. The word has no continuity of attestations in the historical dictionaries of the

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2 Bogdan Walczak (1997: 269–280) wrote an article about the “depth” of etymology. The author discussed various approaches to presenting the etymology of foreign words. One of these is to show only the direct source of the borrowing. Another one involves presenting only the basic foreign source from which it is derived, without presenting forms in intermediary languages. The most comprehensive and profound approach entails an analysis of all words – ranging from a borrowed word in the recipient’s language and successive forms in the chain of loanwords, right through to the basic form, which is the source of all subsequent forms.

3 All the abbreviated dictionary titles are expanded in full in References.
Polish language. It does not appear either in TPLG or in LSJP, which means it is absent from the 17th century up to the beginning of the 19th century. We may wonder about the reasons for this state of affairs. The word probably did not yet exist as a common term, most likely because it lacked a medicinal meaning at the time. There is also the possibility that it was only used in narrow social groups and did not appear in the sources used by the above-mentioned dictionaries.

It is attested much later, namely in SWil (1861) and SW (1900). Both dictionaries claim that it originates directly from Greek. They note that it means: 1) ‘the science of making drugs’ (SWil, SW) and 2) ‘field of study’ (SW). The word is then listed in the DSJP (mid-20th century), where it is defined as ‘drug science, involving the preparation, processing, control, storage and distribution of all kinds of medicaments’. According to this dictionary, the term farmacja comes from Latin pharmacia, which was a loanword from Greek φαρμακεία. Nowadays, the term farmacja has five particular meanings: 1) ‘industry involved in manufacturing and distribution of drugs’, 2) ‘drug science’, 3) ‘a field of study at a university devoted to pharmacy as a science’, 4) ‘an administratively separated unit of a university where knowledge about drugs is taught’, 5) ‘a school or university subject devoted to teaching pharmacy as a science’ (WSJP s. v. farmacja).

As noted in TSWO (s. v. farmacja), the Polish word comes from Medieval Latin pharmacia, ultimately a loanword from Greek φαρμακεία. This is confirmed in SŁŚ (s. v. pharmacia, farmacia), where we read that the word pharmacia has two senses: 1) ‘use of drugs’, 2) ‘medicine’, and comes from Gr. φαρμακεία. Bańkowski (in ESJP, s. v. farmacja) claims that the word farmacja was first attested in Polish as late as 1861. As shown above, this is an evident mistake. Moreover, Bańkowski wrongly suggests that farmacja originates from German Pharmazie and/or French pharmacie, which both supposedly come from Greek.

When discussing the 16th-century form farmacyja, we should refer to the work of Moszyńska (1975), who analyzes numerous ancient Greek and Latin borrowings in Polish. Although, unfortunately, she does not discuss the form farmacyja itself, it is analogous to many other feminine nouns borrowed from Latin which in Polish have the ending -cia/-cja/-cyjå, such as prowincja (from Lat. prōvincia ‘conquered territory’). They all originate from Latin nouns ending in -cia and have been adapted to the Polish morphological system

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4 The word, the meaning of which was associated with the preparation of medicines, was aptekarstwo, attested since 1567 (SP XVI s. v.).
5 The authors of these dictionaries probably did not know that the word had already been attested in the 16th century in a form that proves its origin from Medieval Latin. Moreover, they may have described the origin of the word without paying attention to the form in the intermediate language(s).
exactly in the same way as Latin feminine nouns ending in -tia (cf. Moszyńska 1975: 26–27).

Over the course of its history, the Polish word farmacja has completely changed its meaning: from originally ‘sorcery with poisoned foods’ to modern ‘drug science, involving the preparation, processing, control, storage and distribution of all kinds of medicaments’, thus evolving into a precise and strictly scientific term. It is worth noting that the foreign equivalents of Polish farmacja also have Latin rather than direct Greek origin, e.g. English pharmacy via Old French or Anglo-Norman farmacie (AND and OED s. v.)\(^6\), which was a continuation of Latin pharmacia (TLFI s. v.). Also German Pharmazie (EWD s. v.) and Russian фармация\(^7\) originated from Medieval Latin pharmacia.

3. The word pharmacia in Latin

Medieval Latin pharmacia continues the same Classical Latin form\(^8\). It constitutes the basis of quite a large word family in Latin, which includes nouns and adjectives, such as pharmaceuticus ‘concerning medicaments’, pharmaceutria ‘fairy, sorceress’, pharmacopōla ‘drug seller; charlatan’ and pharmicum 1) ‘poison’, 2) ‘medicine’\(^9\). The meanings of these words are rooted in three principal notions: sorcery, poison and medicine. We may wonder what these concepts have in common. It seems that they are linked, above all, by mystery and magic.

The preparation of poisons and magic was by its very nature mysterious and unfathomable. The oldest healing practices were shrouded in mystery and close in function to magic (Roeske 1991: 13–14). The production of poisons and healing agents involved similar enigmatic, impenetrable practices. Hence, medicine and poison were kindred spirits. For a drug to become a poison, one simply had to change the proportions of the components of a concoction or increase the amount of one of the substances it contained. And, vice versa,

\(^6\) More precisely, the order of borrowing in this case was as follows: Gr. φαρμακεία – Lat. pharmacia – Old French and/or Anglo-Norman farmacie – (Middle) English farmacie. According to the AND (s. v. farmacie) the form farmacie is first attested c. 1300 in the sense of ‘a purgative’. According to the TLFI (s. v. pharmacie) OFr. farmacie is first attested in 1314 (the same sense). The MED (s. v. farmacie) has the first quotation from Chaucer’s Canterbury Tales (c. 1385) and the only sense found in late medieval English was ‘A medicine that rids the body of an excess of any of the ‘humors’ except blood; also, treatment, or the theory of treatment, with such medicines; a purgative’. I am very grateful to the Reviewer for the above valuable additions.

\(^7\) Russian etymological dictionaries do not mention the origin of this word. Only the ESSRJ presents the etymology of the word фармацевт which comes from MLat. pharmaceuticus.

\(^8\) It should be noted that the medieval Latin form is the same as in post-classical Latin when the form pharmacia was first certified (SLP).

\(^9\) Latin examples from the SLP.
a small dose of poison may have healing properties. It is worth noting that the
aura of arcane ritual involved in the preparation of both poisons and medicines is
also evident in the Polish uses of the word farmacyja discussed above.

The etymology of the Latin word pharmacia is so obvious that it does not
appear in the LEW, DELL or EDL, viz. Latin pharmacia comes from Greek
φαρμακεία, in the same way as, e.g. Lat. malacia ‘silence (at sea)’ is a loanword
of Greek μαλάκας ‘silence (at sea)’. Greek words ending in -κεία, when adapted
to Latin, regularly acquired the ending -cia. The Greek origin of the entire Latin
word family of the form pharmacia is also noted by SLP.

4. The word φαρμακεία in Greek

According to SGP Greek φαρμακεία is in fact an Ionian word. It has multiple
senses and at least two synonyms: φαρμακεία Ion. = φαρμάκευσις = φαρμακία
Ion. 1) ‘the use of medications’, 2) ‘the use of drugs, witchcraft’, 3) ‘poisoning’,
4) ‘sorcery’, 5) ‘remedy’. All its meanings refer to drugs, poisons or sorcery.
Moreover, it is a member of a large word family. The SGP, ChDELG (s. v.
φάρμακον) and EDG (s. v. φάρμακον) list many words that are related to it, as
shown below. Although the extensive polysemy and synonymy of the words
make it impossible to classify them according to their meanings, I have decided
to group the vocabulary into pertinent parts of speech.

a) nouns
φαρμακεύς = φαρμακευτής = φάρμακος = φαρμακτήρ = φαρμάκτης 1) ‘who
prepares φ., poisoner’, 2) ‘enchanter, magician, sorcerer’;
φαρμακεύτρια ‘fairy, sorceress, enchantress’;
φαρμάκον ‘healing or harmful medicine; mild drug’;
φαρμακις = φαρμακεία 1) ‘enchantress’, 2) ‘witch, poisoner (fem.)’;
φαρμακίων = φαρμακοπώλης (Att.) ‘pharmacist, chemist, medicine seller’;
φαρμακώδης subst. ‘magician, sorcerer’;
φάρμαξις 1) ‘cure, treatment’, 2) ‘hardening (of metals)’;
φαρμακοποΐα ‘preparation of drugs, pharmaceutics’;
φαρμακοποσία 1) ‘taking medicines’, 2) ‘drinking poison’;
φαρμακοτρίβης ‘rubbing, preparing drugs, paints’;
φαρμακώδης subst. ‘poison’
φαρμακών ‘dye-house, dye works’;
φάρμαξις 1) ‘cure, treatment’, 2) ‘hardening (of metals)’;
b) adjectives
πολυφάρμακος ‘having many φ., skilled in many φ.’;
φαρμακευτικός = φαρμακτήριος ‘concerning drugs’;
φαρμακίς adi. ‘venomous (fem.)’;
φαρμακίτης 1) ‘concerning witchcraft, magical, wizarding’, 2) ‘containing φ.,
concerning φ.’, 3) ‘spiced (wine)’;
φαρμακώδης adi. ‘concerning drugs, treating with drugs’;
φαρμακέως adi. ‘poisoned’;
φαρμακοπωλέω ‘making medicine’;
φαρμακτός ‘poisoned’;
φαρμακώδης adi. 1) ‘curative, healing’, 2) ‘poisonous’, 3) ‘rich in φ., rich in
medicinal herbs’;

c) verbs
φαρμακάω 1) ‘I am intoxicated by poison, poisonous drink’, 2) ‘I require, I need
medicine’;
4) ‘I drug someone, I administer a powerful drug’, 5) pass. ‘I am treated, I take
medication’;
φαρμακόομαι ‘I am poisoned, bewitched’;
φαρμακοπωλέω ‘I sell medicines, pharmaceutical supplies’;
φαρμακόω ‘I ensure effective treatment’;
φαρμάττω 1) ‘I use a pharmacy, pharmaceutical remedy’, 2) ‘I treat, bring relief
by administering medicine’, 3) ‘I poison; I poison with venom’; 4) ‘I enchant,
I bewitch with a magic potion’, 5) ‘I prepare using pharmaceutical means’,
6) ‘I add something (to a dish)’, 7) ‘I season (the dish)’, 8) ‘I dye, I put lipstick
on’, 9) ‘I harden (the metal)’.

All these nouns, adjectives and verbs include many synonyms, which often
differ only in terms of labelling (positive or negative) or emotional tinge. Besides, many of them developed several senses.

As is also evident, the meanings of these words are concentrated in a few
main semantic fields, namely: poisons (usually in the form of potions) and their
preparation (from poisonous plants and venom), medicines, their preparation and
use, and magic. The first area also includes terms for poisoners. The second
comprises the names of people who prepare drugs, i.e. pharmacists. The third
semantic field encompasses practitioners of witchcraft, such as sorcerers and
witches. All three areas appear to share a sense of mystery and even secret rites
and recipes. People who make poisonous, magical or healing potions possess
secret knowledge that they wish to guard. Perhaps the same people are capable of
making both poisons and drugs. Perhaps these people – because of their secret
practices and ceremonies - were regarded as sorcerers or considered themselves to be sorcerers (or at least they wanted to be perceived as such).

Other meanings arose from the subsequent semantic transition of the word towards more practical (and less mysterious) areas of life, such as the preparation and use of paints or the tempering of metals. The vastness of the word family certainly proves its antiquity. Over the course of time, successive derivatives and new meanings were formed on the basis of this word. The etymological dictionaries of the Greek language clearly indicate that the basic word (or at least one of the first, basic words) in the family may have been the lexeme φάρμακον, the polysemy of which is exceptionally extensive (see above). Hence the conclusion that the Greek word φαρμακεία that we are interested in (alongside its numerous synonyms shown above) also originates from φάρμακον. Thus, it can be concluded that the Polish term farmacja via Medieval Latin pharmacia and Greek φαρμακεία is also ultimately derived from Greek φάρμακον.

5. Etymology of Gr. φάρμακον

Greek φάρμακον is a very ancient word, already recorded in the Iliad (c. 8th cent. B.C.), cf. BDELG (s. v.). Beekes (in EDG s. v.) claims that its original meaning cannot be established with certainty. He believes that the word is clearly Pre-Greek10. Its origin is an intriguing question. There are only two possibilities at play here: either it is an inherited form, or it is an old borrowing. Etymologists have failed so far to provide an unequivocal solution to this problem. Several theories have been proposed, none of which are entirely satisfactory. Some researchers, e.g. Frisk (in GEW s. v.)11, Aura Jorro (in DM s. v. pa-ma-ko) and Beekes (in EDG s. v.) juxtapose Greek φάρμακον and Mycenaean pa-ma-ko, suggesting in this way that the Greek form comes from the Mycenaean dialect12 but Chantraine (in ChDELG s. v. φάρμακον) believes that such an approach is pointless: „Il n’y a rien à tirer de l’hapax myc. pamako dont le contexte n’éclaire pas le sens”. Certain etymologists separate the form *φαρμ(α)- which can be linked with PIE *bher- (this opinion is quoted by GEW s. v. φάρμακον)13. Some

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10 He refers to Furnée (1972: 220) who compares the form φάρμακα with some other words (used by Homer) and shows the variations α // o and μ // β, well-known from Pre-Greek.
11 However, in Frisk’s dictionary there is a question mark next to the Mycenaean form.
12 It is – as it is well known – the oldest certified stage of the Greek language (16th – 11th cent. B.C.).
13 But compare IEW (s. v. 3. bher-), where the Greek root φαρ- as in φάρος ‘plough’ and φάρυγξ ‘throat’ is supposed to be derived from PIE *bher- ‘to cut, pierce, scrape’. However, further on in the entry we read: “Mit einer Grundbed. ‘kerben’ lit. bùrtai Pl. ‘Los, Zauber’ = lett. burts ‘Zeichen des Zauberers, Buchstabe’, lit. bùrti ‘zaubern’, lett. bûtr ‘zaubern’, bûrtains ‘mit Kerbschnittzerei versehen’; gr. φάρμακον ‘Heilmittel, Zaubermittel’ (wohl nichtidg.) hat nichts
linguists connect the form φαρμα- with Lithuanian buriù, būrti ‘bewitch’ (this view is quoted by BDELG s. v. φάρμακον), but it is not known whether its original meaning is ‘witchcraft’. Others consider φάρμακον as a haplological form from *φαρμ-μακον (this is the hypothesis quoted by Frisk in GEW). Some other suggestions have been put forward (most of them discussed by Frisk), but none of them are convincing enough.

It is worth emphasizing that the foreign origin of φάρμακον was already postulated by Chantraine (1933: 384) and Schwzyzer (1939: 497). Chantraine repeats this later in his dictionary (ChDELG s. v. φάρμακον): „φάρμακον est isolé en grec, au point qu’on a pensé à un terme emprunté, comme le sont vraisemblablement les noms de plantes […]”. Pokorny (in IEW s. v. 3. bher-) also supports the thesis of the non-Indo-European origin of the Greek φάρμακον (see footnote 13).

This is a very interesting opinion and some researchers take it seriously. For example, Roeske (1991: 15–16) suggests that φάρμακον may have been derived from the nickname ph-arm-aki given to the Egyptian god Thoth15. The latter was worshiped primarily as the moon god, inventor of the calendar and writing, and guardian of the scribes, but it must also be remembered that he was considered the physician of the gods16. He was also considered the founder of chemistry and was portrayed as a boat pilot probing the river with a stick. His nickname ph-arm-aki meant ‘the one who guards’ (Kamiński, Wesołowski 2010: 25). This form seems to be quite close to the Greek φάρμακον. Such an origin of the Greek word would be a tempting hypothesis. However, the alleged nickname of the Egyptian god Thoth in the form ph-arm-aki does not actually exist. Tadajczyk (2000: 568) shows that the hieroglyphic inscription in the drawing of Thoth17 should be read as iret maket (and not ph-arm-aki)18. The inscription means ‘making protection’ and is a religious formula. Indeed, when we analyze the characters of this inscription from top to bottom19, we come to the conclusion that it can be transliterated as ir-t-m-(e)-k-f. Like Frisk (in GEW), Aura Jorro

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14 The second part would come from the verb μάσω ‘I knead’.
15 This view appears in many studies on the history of pharmacy.
16 According to Egyptian mythology, Thoth healed Set and Horus from their wounds.
17 The author includes in his article a drawing of the god Thoth (with an inscription). This drawing is also found in many studies on the history of pharmacy.
18 In this statement, the author refers to the outstanding egyptologist, Professor Jadwiga Lipińska.
19 Egyptian hieroglyphic inscriptions found on columns are the oldest. We should read them from top to bottom.
20 Egyptian hieroglyphs almost exclusively denote consonants. It is not known what all Egyptian words sounded like. Egyptologists conventionally add vowels to be able to pronounce what they
(in DM) and Beekes (in EDG), and contrary to what Chantraine (1933) and Schwyzer (1939) claim, Tadajczyk (2000: 568) juxtaposes Gr. φάρμακον with Myc. pa-ma-ko21. If pa-ma-ko is indeed a Mycenaean version of the Greek φάρμακον, its origin dates back to the 16th century B.C. In his opinion, the word is connected with Lithuanian būrti ‘work magic, practice sorcery’22 and PIE *bher- ‘to cut, pierce, scrape’. But Smoczyński (SEJL s. v. būrti) claims that Lith. būrti does not have a clear etymology and doubts if it can be linked with PIE *bher-23 and concludes that Greek φάρμακον was not derived from PIE *bher-, either. It is also worth noting that Gr. φάρμακον does not appear in the context of Lith. būrti and būrtas ‘lot, superstition, (pl.) sorcery’ in EDBIL (s. v.). Neither does it appear in any context in the LIV, which may indicate a non-Indo-European origin. Thus the origin of Gr. φάρμακον remains an open question.

6. Conclusions

The conclusions that emerge from the above analyses concern several aspects related to the history and origin of the Polish word farmacja derived via Medieval Latin pharmacia from Greek φάρμακον and φαρμακεία. Nowadays, this lexeme is neutral with regard to its labelling and emotional content. It is an internationalism, and as a consequence can be found widely distributed throughout the world and has the same or very similar meaning everywhere. In contemporary Polish, the entire word and the conceptual family are primarily associated with the world of science. And yet, its semantic origins differ markedly from all the features that characterize it today. Namely, the conceptual sphere from which farmacja is derived refers not only to drugs, but also in a negative sense to poisons, prepared according to carefully guarded recipes shrouded in mystery. In addition, this sphere includes witchcraft and magic as well as arcane practices and rituals. The semantic shifts were undoubtedly connected with the archaic senses of the word. Thousands of years separate the today’s term from its etymon. In ancient times, when the linguistic foundation of the modern term first took shape, healing and magic were closely connected, and the few people who knew how to make mysterious potions were considered sorcerers. Moreover, most likely the same people prepared not only healing drugs, but also poisons. It is also important to add that the conditions in which

read. Characters can be transliterated using a list of Egyptian hieroglyphs which is available at: https://en.wikipedia.org/wiki/List_of_Egyptian_hieroglyphs (access: 8 april 2021).

21 He reiterates this view in another article (see Tadajczyk 2002: 49).
22 It is worth noting that Lith. būrti and Gr. φάρμακον had already linked by Reinhold Trautmann (BSW 40).
23 He reiterates this opinion in LED (s. v. būrti): “no established etymology”.
medicines and poisons were produced changed only slowly over time. The affinity between the two fields persisted for many centuries, certainly throughout the Middle Ages and beyond, despite the progress made in medical science. After all, it often happened that a court physician would, when necessary, make poison.

Finally, it is worth emphasizing that the modern term farmacja is a loanword, and a “multi-step” borrowing at that, because its linguistic basis refers to at least two languages. Regrettably, the origin of its ultimate archaic Greek etymon φάρμακον remains unexplained, as none of the solutions proposed so far is satisfactory.

References

ON THE ORIGIN OF THE POLISH WORD FARMACJA


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