MAREK STACHOWSKI Jagiellonian University, Cracow stachowski.marek@gmail.com

## REMARKS ON THE PHONETIC VALUE OF THE LETTERS (Y) AND (Ü) IN FRANCISCUS MENINSKI'S OTTOMAN TURKISH *THESAURUS* (1680)

**Keywords:** Ottoman Turkish, historical phonology, transcription texts, graphemics, lexicography

## Abstract

Franciscus Meninski generally used the letter  $\langle y \rangle$  as a symbol for today's Turkish *t*. However, this letter also appears in front vocalic words which contradicts the palato-velar aspect of Turkish vowel harmony. Mertol Tulum has recently attempted to show that the phonetic value of  $\langle y \rangle$  in front vocalic words was a central, high vowel placed between the Turkish *i* and *t* (one that would probably be rendered [i] in the IPA; however, since this letter is barely visible in print, especially in the footnotes, I have decided to replace it with its Fenno-Ugristic equivalent [j] here). The present author, thus, examines Tulum's line of reasoning and dicusses the possibility of reinterpreting the functions fulfilled by  $\langle y \rangle$  and  $\langle \ddot{u} \rangle$  in Meninski's work.

Mertol Tulum's (2007) interesting and thought-provoking analysis was published in a Festschrift for Professor András J. E. Bodrogligeti.<sup>1</sup> For those who do not read Turkish the most important (in my view) issues in this article are summarized below:

F. Meninski uses the letter (y) in his *Thesaurus* ('Treasury', see MenG, L, O) to denote a velar, high, non-labial vowel which is represented by the IPA symbol [u] (= modern Turkish *t* = Russian *bt*) today.

<sup>&</sup>lt;sup>1</sup> There is some confusion about the dates in this Festschrift. Although a jubilee volume, it actually appeared in 2009, i.e. two years after A. J. E. Bodrogligeti's eightieth birthday; even so, it bears the date 2007 on the title page, with the year 2009 not mentioned in the volume (cf. Knüppel 2009: 342). One cannot therefore be surprised that no reactions to Tulum's article have been – so far as I can tell – published as yet because the publication is relatively recent.

NB: This system was also used (or borrowed from Meninski?<sup>2</sup>) by Bernardino Pianzola in the late 18<sup>th</sup> century but in a much more uniform and, by the same token, a much more user-friendly manner:  $\langle y \rangle = [uu]$  (in Rocchi 2009: 16, [i], i.e. [i]<sup>3</sup> is given as the phonetic value of Pianzola's  $\langle y \rangle$  but this author without doubt meant [uu] because it is virtually impossible to prove, on the basis of Pianzola's dictionary, that his  $\langle y \rangle$  exactly denotes a central vowel [i], not the velar [uu] that is standard today).

- 2) <y> sometimes occurs in front vocalic words which contradicts the rules of Turkish vowel harmony.
- 3) On the basis that the Turkish (fewerüm) 'I love/like' is often pronounced in a way that is close to the Polish vowel *y*, i.e. "*quasi fewerym*" (MenG 72), as well as in the light of certain comparisons with transcription systems in works by other authors, Tulum concludes that Meninski's (y) is used to render a slightly palatalized variant of the Turkish *i*.<sup>4</sup>

In the remainder of this article a further analysis of Meninski's graphemes will be undertaken and certain new suggestions made.

Tulum's conclusion concurs quite well with phonetic characteristics<sup>5</sup> of the Polish vowel (y) although it is somewhat more centrally pronounced than in the case of the Turkish *t*.<sup>6</sup>

Tulum's (2007: 353) observation that the vowel written as  $\langle y \rangle$  generally occurs after dental and alveolar consonants (*t*, *d*, *n*, *s*, *z*, *l*, *r*) is doubtless correct; nevertheless, there is one fact that Tulum fails to address:<sup>7</sup>

<sup>&</sup>lt;sup>2</sup> It would be equally interesting to know to what extent Father Wieczorkowski imitated Meninski's orthography in his 1721 Turkish *Compendium*; we can, for one, note forms like ‹Katolik dyn› for *Katolik din* 'Catholic religion' (Podolak 1995: 78, line 13), ‹janghyłmaz› for *yaŋılmaz* 'infallible' (Podolak l.c., line 2) and ‹isterym› = *isterim* (?) ~ *isterüm* (?) 'I want' (Podolak l.c., line 16). The description of Wieczorkowski's orthography in Podolak (1990) follows the traditional rules which were the only way of reading transcription texts at that time.

<sup>&</sup>lt;sup>3</sup> A consistent use of a Fenno-Ugristic-based diacritics might prove useful because with them, unambiguous symbols like *i* for a velarized *i*, or *i* for a palatalized *t*, and so on, can be created. However, this would lead to introducing a whole series of new symbols, dependent on the starting point and the phonetic process involved in each case, which are not necessarily well-known and, in addition, the aim of this article is to establish the pronunciation of certain letters used by Meninski, rather than interpret them historically. Nevertheless, the Fenno-Ugristic symbol *i* which stands for a centrally articulated *i* (regardless of whether it is historically *i* or *i*) appears adequate for our purpose and is, at the same time, fairly well visible. For other problems connected with Turkological and Fenno-Ugristic transcriptions see Stachowski K. 2011 passim.

<sup>&</sup>lt;sup>4</sup> "Bu /1/ [written as ‹y› – M. S.] donuk, silik, belli belirsiz bir sestir, bulunduğu fonetik çevrede kimi kez /i/'ye yakın bir ses verir, ve de bu ses /1/ – /i/ aralığında renk kazanan, bir yandan /1/'nın, öte yandan /i/'nin bir değişiği gibi değerlendirilmelidir." (Tulum 2007: 351).

<sup>&</sup>lt;sup>5</sup> However, apart from attributes like *donuk* 'frozen; dim, unclear', *silik* 'worn; indistinct, insignificant, *belli belirsiz* 'unclear, hardly perceivable' (see previous footnote) because they really cannot characterize vowels.

<sup>&</sup>lt;sup>6</sup> Cf. also the description of (y) in MenG 5. – This is probably due to the fact that (y) was sometimes used in Old Polish for both [i] and [i], as for instance in *kot y mysz* 'a cat and a mouse' [kot i miʃ] (which would be *kot i muş* in modern Turkish orthography).

<sup>&</sup>lt;sup>7</sup> Tulum adduces numerous examples from Meninski's *Thesaurus*; however, without citing the volume and the page. Since the whole *Thesaurus* comprises five large volumes, it is for

The above is only true for front vocalic words. How could an  $[\underline{i}]$  be rendered in back vocalic words in which  $\langle y \rangle$  actually was used for  $[\mathbf{u}]$ ?

Leaving the *Thesaurus* aside, it is necessary to consider Polish and German – two languages very well known to Meninski. The letters  $\langle y \rangle$  and  $\langle \ddot{u} \rangle$  are both used to denote [y] in German. Moreover, the Polish  $\langle y \rangle = [i]$  is often (albeit not always) reflected by  $\langle \ddot{u} \rangle = [y]$  in German, e.g. in the following Polish place names: Pol. *Bytów* > Germ. *Bütow*, Pol. *Leszyce* > Germ. *Leschütz*, Pol. *Lęczyca* > Germ. *Lentschütz*, and so on. Also the German  $\langle \ddot{u} \rangle = [y]$  is sometimes reflected by  $\langle y \rangle = [i]$  in Polish, as is the case with the Germ. place name *Grünwalde* > Pol. *Grywald*, as well as with the Germ. *Schlafmütze* 'night cap' > Pol. *szlafmyca* id., Germ. *Düse* 'nozzle' > Pol. *dysza* id., Germ. *Meisterstück* 'masterpiece, chef d'oeuvre' > Pol. *majstersztyk* id.

Meninski would have known this and, thus, the following might have occurred to him: If the Polish letter  $\langle y \rangle$  can stand for a delabialized and somewhat backed  $\ddot{u}$  in front vocalic words, the German letter  $\langle \ddot{u} \rangle$  can be used for a delabialized and somewhat fronted *u* in back vocalic words. Thus,  $\langle al\ddot{u}r \rangle$  (MenG 73) 'he takes' is to be read as *alir* (= an intermediary guise between the earlier *alur* and the modern *alur*).

The general scheme is then as follows:

in velar words:  $\langle \ddot{u} \rangle = [i]$  (but see further below)  $\langle y \rangle = [u]$ in palatal words:  $\langle i \rangle = [i]$  $\langle y \rangle = [i]$ 

This is, of course, a bold and somewhat risky hypothesis. Moreover, it cannot explain all the cases of (y), for example:

The personal suffixes of the Ottoman Turkish preterite were originally labial in the 1. and 2. person singular and plural (*-dum*, *-duŋ*; *-duk*, *-duŋuz*) but illabial in the 3. person singular and plural (*-du* for both; for plural sometimes also *-dular*). Therefore, the attested preterite forms of <ol-> 'to be' (MenG 75) become:

| Sg. 1. ‹oldüm› (= <i>oldim</i> ) | Pl. 1. <olduk> (= <i>olduk</i>) [!, not yet *<oldük> = *<i>oldik</i> ?]</oldük></olduk> |
|----------------------------------|---|
| 2. ‹oldün› (= <i>oldin</i> )     | 2. ‹oldünüz› (= <i>oldiniz</i> )  |
| 3. «oldy» (= <i>oldı</i> )       | 3. (oldyler) (= $oldiler$ ) <sup>8</sup>  |

Why was ‹olduk› not affected by this change? This may just be a printing error (but see below). However, a much more important question is the following: Why should labial suffixes like *-dum*, *-dun* and *-dunuz* have been delabialized after a labial vocalic stem *ol-*? The same question concerns ‹altunlü› = *altunli* 'golden' (MenL 382), which is found instead of the original and harmonically more regular *altunlu*. Perhaps all these forms of *ol-*, as well as ‹altunlü›, should be read with an inconsistent

the most part virtually impossible to identify the place of their attestation. It is because of this that I decided to use my own examples in what follows.

<sup>&</sup>lt;sup>8</sup> For palatal suffixes after velar stems see below.

palatal harmony, just as they are written because Meninski seemed to prefer palatal sounding suffixes. If this is accepted, the first line in the above scheme should be reformulated as follows:

in velar non-labial words:  $\langle \ddot{u} \rangle = [\underline{i}]^9$ 

A further example:  $\langle jazylü \rangle$  and  $\langle jazülü \rangle$  'inscribed' (MenL 5542) are easily understood as *yazıli* and *yazili*, respectively. However, was *i* palatal to such an extent that a variant like  $\langle jazilü \rangle$  (l.c.) was also possible? Is it then to be read *yazilü* or *yazili* (or in another way)? This is not really clear, as such an unusual palatalization is surprising, but notations like  $\langle karśüfinde \rangle$  'against' (MenO 271) seem to confirm the palatalizing effect of *i*.

In addition, how should the difference between (i) and (y) in (artürilmiś) 'increased, augmented' vs. (artürylmak) 'to become increased/augmented' (MenL 131) be explained? Should the palatalization in the former somehow be connected with ( $\ddot{u}$ ) = [ $\dot{i}$ ]? This is not a simple case. A dialectal form of Vidin *verdikçe* (Németh 1965: 314) [= modern Turkish *verdikçe* 'whenever he gave'] clearly shows that the non-final suffix (*-dik-*) can break the palatal harmony without affecting the following syllable(s). Based on this Prokosch (1980: 14sq.) decided that the word  $g_{g_{i}}$ should be read as *verilduģi*, rather than *verilduģi*. Following this interpretation we might say that exactly the same process – albeit with a velar stem (*art-*) and a palatal suffix (*-ür-*) – can be observed in (artürylmak), whereas (artürilmiś) reflects the next step in the evolution of the vowel harmony.

All this makes the conjecture concerning  $\langle \ddot{u} \rangle = [\underline{i}]$  not entirely reliable (even if the system appears likely and symmetrical). In addition, another factor should be considered in this context, as well:

Meninski seems to have taken the view that full harmonization of all vowels in every word signals a rural Anatolian pronunciation and is thus a sociolinguistic sign of the lower classes. It is well-known that there was indeed such a tendency among the Ottomans, who wished to disassociate themselves from such people. Indeed the fact that the Arabic short *a* was mostly reflected by *e* in the literary Ottoman Turkish language shows that this vowel was a great favourite with the Ottomans. At the same time, this fact explains why Meninski gave both velar and palatal variants of plural forms of velar stems, e.g. (atlar) ~ (atler) 'horses', (awlar) ~ (awler) 'hunts, chase, acts of hunting' (MenG 27). Indeed, his rule for the construction of plurals is yet more rigorous: "Pluralis numerus fit in omnibus regulariter, ut hic للمالية kalpakler, كوپكل k'öpek'ler" (1.c.).<sup>10</sup>

<sup>&</sup>lt;sup>9</sup> For delabialization -*üm* > -*im* cf. Evliya Çelebi's forms: regular *gördüm*, sporadic *gördim* (Develi 1995: 84). – As labial harmony evolved mainly in the 17<sup>th</sup> century (Develi 1998: 31), comparative insights into this aspect of transcription texts are especially desirable.

<sup>&</sup>lt;sup>10</sup> The same can be also observed in older documents, for instance, in a 1551 letter from Suleiman the Magnificent to Sigismund II Augustus, which was written by a Polish translator who, as Ibrāhīm Beg, served at the Ottoman court (Zajączkowski 1936: 103sq.); cf. Heffening (1942: 58):

In this case there is actually no possibility (and, I think, no need) to assume there is a centrally pronounced vowel in the plural suffix *-lar* ~ *-ler*. Rather, all these forms should be read just as they are written, that is, *atler, avler* and *kalpakler*, reflecting Meninski's more or less private preference for front vocalic suffixes.

And yet, forms with palatal suffixes after velar stems were not just a phoneticstylistic fiction created by Meninski. Other Ottoman authors also confirm their existence (albeit not so often as Meninski), e.g. in Evliya Çelebi's *Seyahatname* (17<sup>th</sup> century), both دوتح *dutmak* and دوتح *dutmek* 'to hold' (Duman 1995a: 5) are attested, and Giovanni Molino's 1641 dictionary lists ‹oghlangikler› = *oġlancikler* or *oġlancikler* 'boys'<sup>11</sup> (Duman 1995a: 8).

The adjective suffix  $-lu \sim -l\ddot{u}$  can be seen in *bahāłu* 'expensive' (Zajączkowski 1934: 154), a form attested in a 1490 copy of Kälīla vä Dimna whose Ottoman Turkish original dates back to the end of the 13<sup>th</sup> or the beginning of the 14<sup>th</sup> century. In Meninski's Thesaurus we have "behālü, vul. pahalu" id. (MenL 955). Since the modern shape of this word is *pahali*, Meninski's (behālü) = behāli possibly displays evidence of the evolution of -lu > -li > -li. This form is especially interesting because of the 1680 be- that is more conservative than the 1490 ba-, as the word formation basis was a Persian word behā 'price'; in other words, the 1490 form has an innovative anlaut and a conservative auslaut, yet the 1680 form has the opposite. In my opinion, the 1680 form with be- was one used by educated people who knew Persian and were thus aware of the correct pronunciation of the noun behā (i.e. with both a palatal -e- and a long  $-\bar{a}$ -). However, those who were educated probably also paid attention to the non-rural pronunciation of the suffix vowel, which means that behālü is actually preferred over behali. It was probably not just coincidence that neither *\*bahalü* nor *\*pahalü* was attested in our source because they both display the same unrealistic composition of a dialectal vowel sequence a - a and the literary sounding of the suffix -lü.12 However, one might ask why the word-medial syllable was not palatalized, which would yield a perfectly palatal guise: \*behelü. If the Ottoman speakers were literate, and they were, they, of course, knew that the Persian etymon had a long  $-\bar{a}$ - in this position, yet it was only a Persian short -a- that was palatal-

Die gleichen Schwankungen [between palatal and velar suffix vowels – M. S.] wie unsere Texte weisen [...] Argenti [...] und Ferraguto [...] auf, während der Pfortendolmetsch Ibrāhīm Beg, ein polnischer Renegat, der zweifellos die gebildete Aussprache der damaligen Zeit wiedergibt, in der Urkunde Süleimans vom Jahre 1551 nach schweren Stämmen die leichten Suffixe offensichtlich bevorzugt.

<sup>&</sup>lt;sup>11</sup> The reading oġlancikler is, according to the "verdıkçe type" above, not really possible because if a next to the last syllable was non-harmonic the last syllable restored the palatal harmony, thus \*oġlanciklar would be expected but the spelling with ‹-ler› makes this reading unacceptable. In this situation, the reading oġlancikler is preferred. – In the Şerh-i Cezîre-i Mesnevî of 1629 the form *iste-duk-de* 'while wanting' (Duman 2005: 87) is attested; thus, should, the form *dinle-me-duk-lar-i* 'which they did not listen to (or hear)' (Duman l.c.) not be read *dinleme-duk-ler-i*? However, dialectal records sometimes include, e.g., two non-harmonic syllables étdihlari (Erzurum) 'what they have done' or a harmonically divided suffix (-ecağ-, in lieu of \*-eceğ-) gelecaği (Van) 'that will come', and so on (Duman 2005: 85). Even in both these examples, the word-final suffix restores the palatal harmony. The problem merits further discussion.

<sup>&</sup>lt;sup>12</sup> On the other hand, cf. a somewhat peculiar Tabriz Azeri variant: *bahali* 'expensive' (Pomorska 1995: 73).

MAREK STACHOWSKI

ized in Ottoman Turkish, so *\*behelü* would presumably have been perceived as the hypercorrect pronunciation of an Ottoman Turkish word by an illiterate Turk. Thus, it is clear, Meninski did his best to correctly reflect the pronunciation of the Ottoman intelligentsia.

It is now necessary to return to Meninski's command of languages. He spoke Polish, so he knew the Old Polish orthography with its  $\langle y \rangle = [i]$  and [i], and he also knew the German orthography with its  $\langle y \rangle = \langle \ddot{u} \rangle = [Y]$ . Besides, as the author of a *Grammatica seu Institutio Polonicae Linguae*... (Danzig/Gdansk 1649), he must have known that Polish consonants preceding  $\langle i \rangle$  are audibly palatalized, whereas their Turkish equivalents are not. Thus, Meninski's hesitation in choosing between  $\langle fewerim \rangle$  and  $\langle fewerym \rangle$  might have originated from his wish not to suggest any consonant palatalization to those who could read Polish. One has to bear in mind that Meninski was sent to Istanbul three times as a Polish envoy, and then, in 1660, he prepared a project of a school for interpreters and diplomats in the Polish Orient Service (Stachowski 2000: XIV, XXIV). For himself as well as for his future students, well-versed in Polish readings, the notation  $\langle fewerym \rangle$  stood for *severim*, whereas  $\langle fewerim \rangle$  might have suggested the pronunciation *severim*.

The 1. person plural forms (feweriz) ~ (feweriz) (for what is today *severiz*) should probably likewise be read *severiz* ~ *severüz*. As the suffix of the 1. person plural originally had a labial vowel in the Ottoman Turkish language:  $-(v)uz \sim -(v)\ddot{u}z$  (Adamović 1985: 35sq.), the form *severüz* is simply more conservative (and certainly more elegant) while the form *severiz* a more innovative (and certainly more colloquial) alternative. Even if *severiz* cannot be categorically excluded there is in fact no actual need for it to be introduced.

The interpretation of the conjugational forms of *ol*- 'to be' (see above) initially seems somewhat unclear. Both possibilities (1. a symbol for [i]; 2. a palatal pronunciation of suffix vowels) seem equally likely. One detail, however, suggests a more probable solution. As mentioned above, it seems possible that ‹olduk› (instead of the expected \*‹oldük›) might just be a misprint. On the other hand, this is the only form with *-k* after a velar vowel, i.e. a *-k* in this paradigm, and a Turkish *-k* is a strongly velar consonant. It is necessary to note that in all the remaining forms with labial suffixes, there is always either a bilabial *m* or a dental *n* in the suffix. It can easily be imagined that the originally velar vowel *u* when positioned directly before a bilabial or dental consonant tended to fronting (*-um/n* > *-um/n* [= *-um/n*] ~ *-um/n* [? ~ *-um/n*], whereas one before a velar *-k* tended to remain velar.

It is somewhat different with regard to Meninski's notations of what today is *kendi* 'self', namely (g<sup>i</sup>endü) and (g<sup>i</sup>endi) (MenL 4037)<sup>13</sup> which can easily be read as an older (*gendü*) or a more recent (*gendi*) variant. More problematic is the interpretation of the syntagm (g<sup>i</sup>endyni öldürmek<sup>i</sup>) 'to commit suicide' (MenO 250 s.v. "confcifcere fibi mortem"). The easiest way to interpret this notation is to identify (y) with

<sup>&</sup>lt;sup>13</sup> The variant with g- is actually much older than the 1794 grammar by Cosimo Comidas de Carbognano, as opposed to what can be understood from the context in Prokosch (1980: 18). – For this and other works by Carbognano see Duman (1995b passim, esp. 98sq).

‹ü› and, by the same token, ‹g<sup>i</sup>endy...› with ‹g<sup>i</sup>endü›, and, thus, to read it as *gendüni öldürmek*. One could, of course, ask if the fact that ‹-dü› is stressed, whereas ‹-dy-› is not, could have affected the pronunciation of this vowel. Indeed, this is a good question. Again, only a comparative study of different transcription sources for the Ottoman Turkish language in the 17<sup>th</sup> century could provide an acceptable answer (or, more likely, a set of rules and a number of answers).

If one managed to unequivocally show that (g<sup>i</sup>endy) should be read with *j* it would certainly be easier to also suggest that (altün) (MenG 36) 'gold' stands for *altin*, rather than for *altün*. However, the situation is not clear because even a notation like \*(altünlar) could be interpreted according to the "*verdıkçe* type".

Although it is not possible to solve the problem only on the evidence of Meninski's data (paradoxically, the more thorough an analysis of a single source, the more numerous the readings) one should consider the following *possibilities* when editing Ottoman Turkish transcription texts (at least those written after Meninski's *Thesaurus*):

```
<ü> stands 1. for [Y] in palatal words;
```

- 2. for  $[i] \sim [u]$  or [y] in velar words and in originally non-labial suffixes.
- stands 1. for [u] in velar words;
  - for [Y] or [i] ~ [i] (which do not palatalize the preceding consonant)<sup>14</sup> in palatal words.

As far as the practical rules of reading and editing transcription texts are concerned, the distinctions between [u] and a hypothetical Turkish [i] as well as those between [i] and a non-palatalizing [i] seem to be so individual and so fine that they can easily be ignored without affecting the correctness of the description of Ottoman-Turkish sound changes. Thus, a simplified and practical scheme of the phonetic values of <ü> and <y> in Meninski's *Thesaurus* is as follows:

stands 1. for [Y] in palatal and velar words;

- 2. for [ul] in velar words.
- stands 1. for [w] in velar words;
  - 2. for [Y] or [i] in palatal words.

In other words:

From letter to sound:

|                  | <ü>     | <y></y> |
|------------------|---------|---------|
| in palatal words | [Y]     | [Y] [i] |
| in velar words   | [Y] [ɯ] | [ɯ]     |

<sup>&</sup>lt;sup>14</sup> This is a necessary device for Polish students, rather than for Turks, Turkologists and non-Slavs.

## From sound to letter:

|                  | [i]     | [Y]        | [ɯ]        |
|------------------|---------|------------|------------|
| in palatal words | <y></y> | ⟨ü⟩<br>⟨y⟩ |            |
| in velar words   |         | <ü>        | ‹y›<br>‹ü› |

## References

- MenG = F. à Mesgnien Meninski: Thesaurus Linguarum Orientalium Turcicae Arabicae Persicae, vol. 4: Linguarum Orientalium Turcicae, Arabicae, Persicae Institutiones seu Grammatica Turcica..., Viennae 1680 [new edition by M. Ölmez & S. Stachowski, İstanbul 2000].
- MenL = F. à Mesgnien Meninski: Thesaurus Linguarum Orientalium Turcicae Arabicae Persicae, vol. 1–3: Lexicon Turcico-Arabico-Persicum..., Viennae 1680 [new edition by M. Ölmez & S. Stachowski, İstanbul 2000].
- MenO = F. à Mesgnien Meninski: Thesaurus Linguarum Orientalium Turcicae Arabicae Persicae, vol. 5: Complementum Thesauri Linguarum Orientalium, seu Onomasticum Latino-Turcico-Arabico-Persicum, simul idem Index Verborum Lexici Turcico-Arabico-Persici..., Viennae 1687 [new edition by M. Ölmez & S. Stachowski, İstanbul 2000].

Adamović M. 1985. Konjugationsgeschichte der türkischen Sprache. Leiden.

- de Carbognano C. C. 1794. Primi principi della Grammatica Turca ad uso dei missionari apostolici di Costantinopoli. Roma.
- Develi H. 1995. Evliya Çelebi Seyahatnamesine göre 17. yüzyıl Osmanlı Türkçesinde ses benzeşmeleri ve uyumlar. Ankara.
- Develi H. 1998. 18. yüzyıl Türkiye Türkçesi üzerine. Doğu Akdeniz 1: 27-36.
- Duman M. 1995a. Evliya Çelebi Seyahatnamesine göre 17. yüzyılda ses değişmeleri. Ankara.
- Duman M. 1995b. Türkiye Türkçesi'nin tarihî kaynaklarından Carbognano'nun grameri ve imlâ-telaffuz ilişkisi bakımından önemi. *İlmî Araştırmalar* 1: 95–106.
- Duman M. 2005. Klâsik Osmanlı Türkçesi döneminde dil uyumuna aykırı örnekler üzerine. Siemieniec-Gołaś E., Pomorska M. (eds). Turks and non-Turks. Studies on the history of linguistic and cultural contacts [= Studia Turcologica Cracoviensia 10 = Festschrift for S. Stachowski]. Kraków: 85–90.
- Heffening W. 1942. Die türkischen Transkriptionstexte des Bartholomaeus Georgievits aus den Jahren 1544–1548. Ein Beitrag zur historischen Grammatik des Osmanisch-Türkischen. Leipzig.

Knüppel M. 2009. (rev.) Öztopçu 2007. – *Journal of Oriental and African Studies* 18: 341–342. Németh J. 1965. *Die Türken von Vidin* Budapest.

Öztopçu K. (ed.) 2007. Festschrift in honor of András J. E. Bodrogligeti [= Türk Dilleri Araştırmaları 17]. İstanbul.

- Podolak B. 1990. Die türkische Sprache in *Breve compendium fidei Catholicae Turcico textu* (1721) von Michał Ignacy Wieczorkowski (1). *Zeszyty Naukowe UJ CMLXII. Prace Językoznawcze* 101: 97–114.
- Podolak B. 1995. Der Transkriptionstext von Michał Ignacy Wieczorkowski Breve compendium fidei Catholicae Turcico textu... (1721). – Studia Turcologica Cracoviensia 1: 23–89.
- Pomorska M. 1995. New Persian and Arabic loan words in the Azeri dialect of Tabriz. *Folia Orientalia* 31: 71–88.
- Prokosch E. 1980. Studien zur Grammatik des Osmanisch-Türkischen unter besonderer Berücksichtigung des Vulgärosmanisch-Türkischen. Freiburg.
- Rocchi L. 2009. Il lessico turco nell'opera di Bernardino Pianzola. Materiali per la conoscenza del turco parlato di fine Settecento. Trieste.
- Stachowski K. 2011. Remarks on usefulness of different types of transcriptions, with a particular regard to Turkic comparative studies. *Journal de la Société Finno-Ougrienne* 93: 303–338.
- Stachowski S. 2000. François à Mesgnien Meninski ve Thesaurus Linguarum Orientalium (in: MenL XIII-XXII) = François à Mesgnien Meninski und sein Thesaurus Linguarum Orientalium (in: MenL XXIII-XXXIV).
- Tulum M. 2007. Meninski'ye göre XVII. yüzyıl İstanbul Türkçesi'nde /ı/ ünlüsü. Öztopçu 2007: 345–357.
- Zajączkowski A. 1934. Studja nad językiem staroosmańskim, I: Wybrane ustępy z anatolijsko--tureckiego przekładu Kalili i Dimny || Études sur la langue vieille-osmanlie, I: Morceaux choisis de la traduction turque-anatolienne de Calila et Dimna. Kraków.
- Zajączkowski A. 1936: List turecki Sulejmana I do Zygmunta Augusta w ówczesnej transkrypcji i tłumaczeniu polskiem z r. 1551. – *Rocznik Orjentalistyczny* 12: 91–118.