MORE HARM THAN GOOD: WHY DICTIONARIES USING ORTHOGRAPHIC TRANSCRIPTION INSTEAD OF THE IPA SHOULD BE HANDLED WITH CARE

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Abstract

The aim of the present paper is to shed more light on using L1 (Polish) orthographic spelling to represent the pronunciation of English words in English-Polish dictionaries (e.g. *journey* /dżerni/, *ship* /szyp/) and discuss multiple drawbacks of this practice. While there are numerous advantages of using the International Phonetic Alphabet (IPA) in foreign language teaching, some Polish lexicographers insist on, what they call, a "simplified" phonetic transcription. In my paper I conduct an overview of three English-Polish dictionaries which use orthographic transcription instead of the IPA and exemplify inevitable confusion and serious problems they present the learner with. The analysis reveals that orthographic transcription intensifies interference between L1 and L2 and contributes to the fossilization of the most persistent mispronunciations stemming from phonetic transfer. Inconsistent and inaccurate transcription prevents learners from spotting patterns and rules (such as e.g. non-rhoticity, vowel reduction, silent letters, etc.). It is argued that relying on ordinary spelling rather than the IPA is a short-sighted alternative which presents more problems than solutions.

Key words: phonetic transcription, dictionaries, the International Phonetic Alphabet, orthographic spelling, pronunciation practice

1. Introduction

Even though providing the pronunciation of words is not the primary function of dictionaries and they "are not prototypical resources used for the acquisition of foreign pronunciation" (Sobkowiak, 2007:138), learners do extract phonetic information from their dictionaries. Moreover, since learning a foreign language means the acquisition of rules, it is expected that dictionaries, even though not perceived as such, are repositories of such rules, including phonological ones. By frequent use of dictionaries EFL learners can benefit in terms of acquiring the phonetic content, either explicitly or implicitly (Sobkowiak, 2007). On the other hand, "including pronunciation is often under-estimated by the critics of dictionaries as being a secondary business" (Magay, 1981:86), which may result in restricting phonetic information to inconsistent (or even careless), impressionistic and, worst of all, incorrect transcriptions. When this happens,

dictionaries no longer perform their pedagogical function and serve as a reliable reference book, but rather jeopardize the learning process.

The aim of the present paper is to shed more light on using L1 (Polish) orthographic spelling to represent the pronunciation of English words in English-Polish dictionaries (e.g. *journey* /dżerni/, *ship* /szyp/) and discuss multiple drawbacks of this practice. While there are numerous advantages of using the International Phonetic Alphabet (IPA) in foreign language teaching (Wells, 1996; Mompean & Lintunen, 2015), some Polish lexicographers insist on, what they call, a "simplified" phonetic transcription, explaining (on the cover, blurb or in the introduction to their dictionaries) that this system is less complicated, "increasingly more popular" and "recommended by teachers in particular." Needless to say, substituting the IPA symbols with Polish letters may be potentially problematic, because "if ordinary spelling reliably indicated actual pronunciation, phonetic transcription might be unnecessary, but often it doesn't" (Wells, 1996).

In my paper I conduct an overview of three English-Polish dictionaries which use orthographic transcription instead of the IPA in order to verify their accuracy and pedagogical value.. This topic is considered both worthy of investigation and urgent, because the dictionaries in question are primarily aimed at children, whose potential as language learners is unjustifiably underestimated. In a similar way that "a myth persists that pronunciation should not be taught to beginning-level learners because it is deemed too complicated, too intimidating and difficult to explain" (Jones, 2018:372) phonetic transcription is also ruled out from the outset implying that children would not be able to learn it. Even though the scope of the present work is restricted to the Polish context, the undesirable and counterproductive practice of substituting the IPA with orthographic transcription is present in other countries as well (e.g. Italy, Spain, Macedonia) and, therefore, I believe that the findings reported here can be used for learners of other L1s.

2. The IPA in pronunciation teaching

The main function of phonetic transcription is to provide a straight specification of a word's pronunciation (Wells, 1996). Because ordinary spelling is not a reliable indicator of actual pronunciation, phonetic transcription in the form of the International Phonetic Alphabet is used to convey precise and explicit information on how a word is pronounced. Using a separate set of phonemic symbols to represent English sounds is necessary, because otherwise "a learner risks being misled either by an inadequately trained ear or by the dazzling effect of the ordinary spelling" (Wells 1996).

As observed by numerous authors, (Collins, & Mees, 2003; Hancock, 1994; Mompean, 2005; Mompean, & Lintunen, 2015; Mompean, & Fouz González,

2021; Tench, 1992; Underhill, 2005) using phonetic symbols in foreign language teaching and learning is potentially beneficial. One of the main advantages of the IPA is that it provides the user with a systematic and unambiguous way of representing sounds in which one symbol always stands for one value. Given that the English language abounds in irregularities, including various unpredictable grapheme-to-sound and sound-to-grapheme correspondences and silent letters, phonetic notation can be helpful in discussing spelling inconsistences and their relationship to pronunciation. Moreover, phonetic symbols can comprehensively represent all allophonic variants of phonemes, connected speech phenomena (elisions, assimilations, insertions) as well as prosodic features (e.g. stress, rhythm and intonation).

Another aspect which makes the IPA superior to traditional alphabetic systems is its usefulness in raising phonetic awareness of features which may go unnoticed (Harmer, 2001; Taylor, 1990). These include the composition of L2 sound inventory and features, L2 accent variations, citation forms of words vs. their modifications in connected speech, phonological and sound-to-spelling differences between L1 and L2, most common mispronunciations, etc. Many researches emphasize that noticing is a pre-requisite to successful pronunciation learning (Celce-Murcia, Brinton & Goodwin, 2010; Gilner, 2008; Kelly, 2000) and plays a crucial role not only during the initial stage of introducing a phonetic feature, but also in its subsequent revision and fixation (Kelly, 2000). Because learners may not always spontaneously spot phonetic features of the target language, or may fail to perceive certain phonetic contrasts (because they process them through the filter of their L1), meta-phonological tools are very helpful in highlighting what needs to be learnt and practiced. Phonetic symbols constitute a part of meta-language which is essential for an accurate and precise communication between teachers and learners about English sounds (Couper, 2011; Fouz González, 2020). Empirical evidence (Lintunen, 2005) confirms that pronunciation and transcription skills correlate and that the IPA is particularly helpful for learners accustomed to a close grapheme-sound correspondence in their native language. Furthermore, it has been suggested that raising phonological awareness can enhance learners' writing and reading skills (Dufva, & Vauras, 2002).

One more benefit of using the IPA relates to its visual quality, namely it allows teachers and learners to 'capture' and 'freeze' sounds, which, by nature, are less tangible and more elusive than written language (Mompean, & Lintunen, 2015:5). Visual displays of phonetic symbols can foster the formation of conceptual images of sounds for reference, focus and further training. In this way the phonemic alphabet is a reminder of real auditory stimuli and a more concrete representation of abstract notions. It enables learners to establish separate phonetic categories (independent of spelling and their L1) for the target sounds as well as provides information about their features, e.g. using separate symbols for /I/ and /i:/ indicates visually the contrast both in the vowel quality and quantity (Mompean, & Fouz González, 2021).

The use of the graphic representation of sounds enables multisensory approach to pronunciation teaching and acknowledges the needs of learners with different learning styles, because in addition to the sense of hearing, it engages the sense of sight and may also activate the sense of touch. Using various colours, fonts and styles (e.g. bold to indicate word-stress) renders teaching materials and techniques more attractive and helps learners (visual learners in particular) to memorize the correct pronunciation of items. Asking students to write words in the phonemic transcription encourages them to reflect on L2 phonetic inventory and observe patterns present there (e.g. vowel reduction in unstressed syllables). It should be noted that children can draw, colour, cut out the symbols or manipulate play dough into appropriate shapes. Not only are such activities phonetically beneficial and familiarize children with the symbols, but they also introduce the necessary element of fun and create an opportunity for practicing fine motor skills. In this way, using the IPA becomes one more means of implementing integrated teaching, rather than adding a burden to the educational process.

Last but not least, the awareness-raising potential and visual character of the phonemic script entails one more advantage, namely the power for autonomous learning (Mompean, & Lintunen, 2015). Autonomy has been defined in multiple ways in relevant literature, but, on the whole, it is understood as the ability to be in charge of one's own learning and self-development in and out of the classroom and to make decisions to achieve certain educational goals (Holec, 1981). In the context of phonetic practice, learner's autonomy is of vital importance, because of its interplay with intrinsic motivation (Dickinson, 1995; Ushioda, 1996; van Lier, 1996), which, in its turn, has been reported to be one of the most determining factors as far as acquiring native-like pronunciation is concerned (Brown, 2008; Celce-Murcia et al., 2010; Moyer, 2004; Moyer, 2007; Purcell, & Suter, 1980; Smit, 2002). Simultaneously, pronunciation training contributes to developing self-efficacy and independence (Pawlak, 2006; 2008; 2011). The "technical" perspective of autonomous learning (Oxford, 1990) emphasizes the role of skills and strategies necessary for unsupervised learning and it is the teacher's role to introduce their students to certain materials and tools so that learners can make the most of available resources, especially outside the classroom (Waite, 1996). Not knowing the IPA places learners at a disadvantage, because they are not able to check how a given word is pronounced correctly, especially in a situation when they come across a new lexical item with no teacher being around to provide the missing information. Easily accessible online dictionaries give learners a possibility to listen to the correct pronunciation, which is much simpler and does not require familiarity with phonetic symbols. However, it should be remembered that many learners (especially those who rely on a visual modality to a greater extent than on the auditory one) may be unable to notice and / or imitate certain phonetic contrasts unless explicitly shown which sounds are found in a given word.

Using phonemic script when introducing even phonetically simple words is a very good idea, because it helps learners to form the habit of checking pronunciation in the dictionary and transcribing new items. It results in enhancing learner's autonomy, which is illustrated by the following comment of a teenage student: "At first it was difficult to learn all those strange symbols, but now I cannot imagine learning a new word without transcribing it – it has become a habit with me." (Szpyra-Kozłowska, 2015:45).

Despite numerous long-term benefits stemming from the use of the IPA, there have been some controversies around it among academicians and, consequently, confusion has been planted among teachers and learners. Varied responses towards the phonetic transcription range from its complete rejection to the restricted acceptance of the IPA as useful and necessary only to the minority, because "most people are *not* seriously interested in pronunciation" (Fraser, 1996: 34).

As argued by Paikeday (1993: 42), "(...) the IPA has great academic value, but it has little practical value as a teaching tool because even those who can transcribe English into IPA will continue to speak with the sounds of their home language or first language unless they are put through a rigorous program of practical training early in life." The author continues explaining that the IPA was justified at the time when it was created (in the 1880s), but is unnecessary in the era of mass media which provide a direct access to acoustic input. He argues that average dictionary users are not likely to benefit from the IPA and that academics have "a vested interest in teaching it just as surgeons have a vested interest in operating on people" (1993:42).

One of the most frequent alternative forms of transcription that has been proposed is respelling which uses the orthographic conventions of the English language or learner's L1. The argument behind respelling is that it is much simpler and removes the burden of mastering a set of difficult and unfamiliar symbols. As explained by Fraser (1996), respelling can be phonemic or non-phonemic. While in both of them ordinary English letters are used for representing sounds, nonphonemic respelling uses the rules of English spelling and does not preserve the one-symbol-one-phoneme systematicity, e.g. the diphthong /eI/ is transcribed as /a/ in phase /faze/ and /ai/ in vague /vaig/. Fraser (1996: 34) maintains that "the English spelling system is capable of providing an unambiguous representation of words, at least in the majority of cases." She designed and tested empirically the helpfulness of non-phonemic respellings and they proved more effective in eliciting the correct pronunciation than both phonemic respellings and the IPA. It must be noted, however, that all the participants were adult native speakers, familiar with the rules of English spelling and in their case non-phonemic respelling facilitated the pronunciation of selected words, all of which were rather infrequent and usually of foreign origin (such as acebulum, cocatrice, oleaginous, yarmulka, etc.). The average ESL learner would most probably find this form of transcription less than helpful, given the fact English spelling itself is a source of pronunciation errors and the spelling conventions of L1 would interfere with that of respelling. Moreover, English native speakers do not need to worry about unfamiliar sounds the same way that non-native speakers do, e.g. not only do native speakers know how to interpret the sequence of letters in, for example, *three*, but they will also be able to pronounce the interdental fricative and the long vowel correctly, which cannot be taken for granted in the case of ESL learners.

As regards the utility of the IPA which has been questioned by e.g. Paikeday (1993) and Fraser (1996), research shows that both university and secondary school learners appreciate the phonemic script as an effective tool in practicing pronunciation (Jarosz, 2021; Mompean, & Lintunen, 2015; Szpyra-Kozłowska, 2015; Tergujeff, 2013). As one of the students observes: "Transcription shows exactly how to pronounce difficult words, but someone has to teach you" (Jarosz, 2021:277). As can be seen, assuming from the start that the IPA is too difficult and unnecessary for ESL learners contradicts their expectations and needs.

It needs to be stressed that phonemic script is often met with apprehension by learners and even some teachers, because the symbols seem strange and difficult to remember. Crookston (2001:7) claims that "phonemic transcription seems to be virtually effortless for a small minority of students" and "the majority of learners, even the majority of successful learners require non-negligible effort to get to the point of being able to transcribe the "citation forms" of, say, two-syllable words with a reasonable degree of accuracy." Such comments may be off-putting to some teachers, but it should be noted that as many as 17 phonetic symbols look identical as letters from the Latin alphabet: /p, b, t, d, k, g, f, v, s, z, h, m, n, l, r, j, w/. The stage when the unfamiliar looking symbols of the remaining 7 consonants are introduced should not be treated as an additional pedagogical burden, but rather a good illustration of certain phonetic facts such as the existence of sounds which are not found in the learners' native inventory, or which are found there but whose distribution or the place of articulation is different. Similarly, introducing vocalic symbols constitutes an opportunity to comment on important distinctions and phenomena which exist in English, e.g. vowel length, vowel complexity, vowel reduction, etc. Also, it is important to remember that for many learners (beginners in particular) it is enough to be able to use the alphabet receptively, that is to recognize the symbols and know which sounds they represent.

As noted by Lee (1989:120), "even a slow learner can master, for recognition purposes, and with a good tutor's help, four or five variant IPA systems within an easy-going hour." Of course, the way and the pace of familiarizing learners with the IPA should be adjusted to their level and age and it would be overwhelming and pedagogically flawed to present very young learners with all the symbols at once. The question, therefore, is not whether the phonemic script should be used or not, but how to introduce it in a learner-friendly way. As shown in literature (Szpyra-Kozłowska, 2015), it can be done successfully in a systematic and attractive way and, contrary to the skepticism of some teachers and the abovementioned lexicographers, children enjoy getting to know the phonetic symbols and even invent names for them.

Moreover, Fraser's comment that "most people are *not* seriously interested in pronunciation" is not entirely true. Empirical studies exploring learners' views and attitudes consistently show that L2 learners of English consider pronunciation to be an important element of effective communication and strive to attain a good pronunciation for pragmatic and aesthetic reasons (Buczek-Zawiła, 2017; Jarosz, 2021; Szpyra-Kozłowska, 2013). It should be stressed that intelligible and native-like pronunciation is appreciated not only by students who have chosen English as their major at university, but also by international users of English likely to communicate in English as a lingua franca with other non-native speakers (Bryła-Cruz, 2006). Moreover, as noted by (Kenworthy, 1987:8), "learners' lack of concern about phonetics may stem from the fact that they are simply not aware that the way they speak is resulting in difficulty, irritation or misunderstanding for the listener." The more phonetically aware they become, the more conscious effort they invest in improving their pronunciation (Sardegna, Lee, & Kusey, 2018; Szyszka, 2015).

3. Polish vs. English phonemic system

In this section we briefly present the main differences between the sound systems of English (in its Standard British variety) and Polish to indicate the areas of potential phonetic interference which will be of primary interest in the conducted analysis. Standard British English (hence SBE) is chosen as a point of reference, because this accent has traditionally been taught in Poland and teaching materials use this variety as the model. To begin with, the two languages do not have the same number of consonants (25 in English compared to 29 in Polish). In addition to 10 that are identical in both languages /p, b, k, g, f, v, m, l, j, w/, in a few consonants the place of articulation differs, namely /t, d, s, z, n/ are alveolar in English but (post)dental in Polish, /h/ is glottal in English, but velar in Polish, and the counterparts of the palato-alveolar English /f/, /z/, /tf/, /dz/ are post-alveolar in Polish (/s, z, ts, dz/). The approximant r/ is articulated as a post-alveolar trill in Polish, and not as a frictionless continuant. Some phonemes of English are not found in Polish. The improper rendition of the interdental fricatives θ , δ / (as /t, f, s/ and /d, v, z/, respectively) constitutes one of the most persistent and the most difficult to eradicate errors made by Polish learners. The dark /l/ is not found in Polish, which means the learners use clear /l/ in all contexts. The velar nasal is found in Polish as an allophone of /n/ before /k, g/ and not as a separate phoneme. As a result, its distribution remains problematic and Polish speakers of English are able to pronounce $/\eta$ / in isolation or in a familiar context, but have difficulty suppressing the velar stop in word-final or pre-vocalic positions. Among consonant-related phenomena which pose problems to Poles learning English there is also maintaining word-final fortis / lenis distinction and syllabicity of /m, n, l/. In the former case, Polish learners tend to devoice completely word-final voiced obstruents with no compensation in vowel length (so that the contrast between e.g. $dog \sim dock$ is neutralised) and in the latter, words like *cotton* or *table* are pronounced with an inserted vowel /koton/, /teibul/).

The vocalic inventories of Polish and English differ to the extent that not a single vowel is identical in the two languages. Polish has only 6 vowels /a, ε , i, o, u, i/ which is a very limited set compared to the 12 monophthongs /i:, I, e, æ, A, ϑ , 3:, u:, υ , \neg :, D, a:/ and 8 diphthongs /eI, \neg I, \exists I, υ ϑ , I ϑ , e ϑ , ϑ , ϑ υ / in English. Polish vowels are characterized by durational invariability, meaning that inherent and relative vowel length, as well as vowel reduction are very difficult for Polish learners to acquire.

Since Polish has fewer vowels than English, Poles typically employ one vowel as a substitute for two, three or even four target vowels (e.g. /u/ for /u:/ and /u/; /a/ for /æ/, / Λ / and /a:/; /ɛ/ for /e/, /æ/, /ə/ and /3:/), thereby neutralizing a number of contrasts (e.g. *cut*, *cat* and *cart* are all pronounced with the same Polish vowel /a/).

4. Orthographic transcription in selected English-Polish dictionaries

This section analyses the ways in which three dictionaries for young learners explain the pronunciation of English lexical items using orthographic transcription. It needs to be noted that the first versions of a simplified (orthographic) transcription for Polish users of English were proposed already in the past, e.g. BENNI was the system used in *English ortophony (Ortofonia angielska)* as early as in 1922; JASSEM was used in *English phonetics (Fonetyka języka angielskiego)* originally published in 1954; BAŁUTOWA appeared in the popular reference book *English pronunciation for everyone (Wymowa angielska dla wszystkich)* originally published in 1965. Importantly, while the three transcription systems were adjusted to the orthographic conventions of Polish and allowed certain concessions to Polish phonetics and orthography, they remained rigidly bi-unique, that is each English phoneme was represented differently and each symbol stood for a separate phoneme (Sobkowiak, 1997).

Later on, orthographic transcription started being employed in phrase books, which are not expected to serve as reference books, nor are they used for pedagogical purposes. Their main aim is to enable their user, usually a tourist with a rudimentary knowledge of English, to produce a comprehensible utterance (so called "survival English"). Consequently, orthographic transcription present in phrase books does not need to reflect the exact phonetic nature of a piece of speech; it can be reduced to the basic representation of the understandable version of a given word or phrase (Sobkowiak, 1997). Simplified orthographic transcription encountered in phrasebooks is thus more user-friendly, simpler and less opaque than the IPA. Yet, it must be stressed again that what is acceptable and justified in communication-oriented booklets (e.g. the lack of bi-uniqueness or the neutralization of some phonemic contrasts like e.g. /u:/ vs. / υ /) is not permitted in materials which are expected to provide the learner with correct phonetic representation and teach English phonetics.

5. Data analysis and discussion

The following dictionaries constitute the basis for the present analysis: *Great Illustrated English-Polish Dictionary for Children and Young Learners*, (Wielki ilustrowany słownik angielsko-polski dla dzieci i młodzieży), My First English-Polish Dictionary, (Mój pierwszy słownik polsko-angielski), Illustrated Polish-English and English-Polish Dictionary (Ilustrowany słownik polsko-angielski i angielsko-polski). As signaled in the titles, the publications are targeted at children and the youth, who constitute a fairly sensitive group of learners and should receive the most accurate model of pronunciation, because it is much easier to form a good habit early on than to eradicate a fossilized one.

Table 1. presents how the dictionaries in question contribute to the improper realization of the most notorious phonetic mistakes that Polish learners typically make. The first column contains a selected phonetic aspect that is problematic to Poles and the following three exemplify how it is treated in each of the dictionaries.

Phonetic aspect	My First Engl Dictionary	lish-Polish	Great Illustrated English-Polish Dictionary for Children and Young Learners	Illustrated Polish- English and English-Polish Dictionary
substitutions of the dental fricatives	athlete /eflit/, breath earth /erf/, healthy /he /norf/, smooth /smuf /fander/, thank /fenk/, thread /tred/, three // /fader/, feather /feder/	elfi/, north /, thunder thief /tif/, tri/, father	bath /baf/, earth /erf/, third /ferd/, brother /brader/, weather /weder/	tooth /tuf/, three /fri/, thousand /tauzend/, they /dej/, breathe /briw/, brother /brader/
improper pronunciation of the velar nasal	among /emang/, evening /iwning/, tongue /tang/, singer /synger/, bang /bang/, something /samfing/, spring /spring/		tongue /tang/, running /ranyng/, hang /heng/	amazing /amejzing/, singer /singer/, king /kyn(g)/; also: bring /brin/, wrong /ron/, ring /rin/, tongue /tan/
substitutions of the palato-alveolar/ʃ/shark /szark/, invention /inwenszyn/,		shop /szop/, ocean /ołszen/	ship /szyp/, vanish /wenysz/	

Table 1: The treatment of phonetic aspects problematic to Polish learners in the dictionaries.

	1	11		
post-alveolar counterparts		pollution /poluszyn/,		
counterparts		push /push/,		
		fish /fish/,		
		paintbrush		
		/peintbrash/,		
		sure /siur/		
	/3/	television	television	leisure /leżer/
		/telewiżn/,	/telewyżen/	
		treasure /	/telewyzell/	
	~	treżer/		
	/tʃ/	church	kitchen /kyczyn/,	chair /czer/,
		/czercz/, cherry	armchair /armczer/	peach /picz/
		/czeri/,		
		furniture		
		/ferniczer/,		
		rich /ricz/,		
		research		
		/risercz/	1 /1 1./	
	/dʒ/		luggage /lagydż/,	job /dżob/,
		jungle /dżangl/,	giant /dżajent/	large /lardż/
		edge /edż/,		
		religion		
		/relidżin/		
trilled /r/ and		er /peiper/, heart	farmer /farmer/,	fa r m /fa(r)m/,
inconsistent	/ha r t/, fo r k	,	fishe r man	hammer $/\text{hame}(\mathbf{r})/,$
rhoticity	/habor/, newborn /niubon/,		/fyszemen/, plumbe r /plame r /,	careless /kerlys/, bear /ber/, after
	supermarket /supemarkit/		f ir eman	/after/, before
			/fajerman/,fireplace	/bifor/, barber
			/fajeplejs/	/barber/, armchair
				/armczer/
word-final	boys /bojs/, leaves /liws/, dogs		news /nius/,	clothes /klołws/
obstruent	0,	s /szus/, seasons	five /faif/	
devoicing improper and	/sizens/ impression /ir	npreszyn/	bottom /botem/,	common /komon/,
inconsistent		lym/, mountain	cushion /kuszen/,	cotton /koton/,
rendition of		poison /poizen/,	button /batn/, cotton	kitten /kytyn/,
syllabicity	muzzle /ma		/kotn/, table /tejbl/,	ribbon /ryben/,
		al /medl/, model	bottle /botl/	freedom /fridom/,
		1 /metal/, mineral		bottom /botom/,
		ten /rotn/, temple		freckle /frekl/,
	/templ/, rido /padl/	lle /ridl/, pudle		prison /pryzn/ passion /peszyn/,
	/paul/			pension /penszn/
problems with				Pension / pensin
the quality and		(finle (from /	1.:
quantity	/1 1	/miks/ but lynx ks/, image /imydż/	fish /fysz/, winter /łynter/, seal /sil/,	big /byg/, bee /bi/
of	vs. /I/ /lynl sorr		sweet /słit/, repeat	
monophthongs	/biin	•	/rypit/	
		,	21 1	

		peel /piil/, beach		
		/bicz/, beak /bik/,		
		dream /drim/, greedy		
		/gridi/		
		bad / bad /, bad habit	stand /stend/, carrot	accent /eksent/, cat
		/bed habit/, happy	/karet/, angry	/ket/, channel
	/æ/	/hapi/,	/engry/, sad /sad/	/czanel/, lamb /lam/
	vs.	hand /hend/, hat /het/,		
	///	rabbit /rebit /		
	vs.	uncle /ankl/, drum	summer /samer/,	dull /dal/, honey
	/a:/	/dram/, gun /gan/, luck	suntan /santan/,	/hani/
		/lak/	trumpet /trampet/	,
			r r r	
		half /haf/, path /paaf/,	ask /ask/, bath /baf/,	bath /baf/,
		plant /plant/, last	grass /gras/, harp	dancer /danse(r)/,
		/last/, large /lardż/, ask	/harp/	aunt /aant/
		/esk/, glas /glas /	. 1	1 / 1. / 1. 1
	/3:/	work /łerk/, nurse /ners/, burn /bern/	turkey /terky/, bird /berd/, skirt /skert/	early /erli/, bird /berd/, fur /fer/
	/p/ vs.	always /olłeiz/,	autumn /otem/, rock	hot /hot/, naughty
	/ɔː/	autumn /otm/, body	/rok/	/noti/, law /lo/
	, 5.,	/bodi/,		
		law /lo/, lawn /loon/		
	/ʊ/ vs.	book /buk/, foot /fut/,	foot /fut/, book	book /buk/, hood
	/uː/	food /fud/, group	/buk/, queue /kju/,	/hud/, foot /fut/,
		/grup/, moon /muun/,	school /skul/,	food /fud/
		move /muuv/, school /skuul/	school bag /skul	
		/skuul/	bag/, root /ruut/, roof /ruf/	
problems with	/eɪ/	danger /deindżer/,	train /trejn/	lake / lejk /,
diphthongs	/ 01/	escape /iskeip/	, and the second s	pain /pejn /
	/27/	coin /koin/, noise	voice /wojs/, boil	noise /nojs/, boy
	/JI/		-	/boj/
		/noiz/	/bojl/	, J,
	/aɪ/	eyesight /aisait/, five	eye /aj/, wide /łajd/	kite / kajt/, size
		/faif/		/sajz/
			1 / 1 1 / .	1 4 4 4
	/əʊ/	shadow /szedoł/,	alone /elołn/, toe	boat /bout/, go
		down /dałn/, swallow /słolou/, slow /slou/,	/toł/	/gou/
		yellow /jelou/, smoke		
		/smouk/, boat /bout/,		
		old /ould/ cold /kold/,		
		only /onli/, open		
		/open/, comb /keum/		
	/aʊ/	shout /szaut/, south	town /tałn/, mous	mouse /maus/,
		/sauf/	/małs/, house /haus/	cloud /klaud/
	/I9/	deer /diir/, dear /dier/,	gearshift /girszyft/,	ear /ijer/, near
		sphere /sfier/, spear	sphere /sfir/	/nijer/
1		r		

	/eə/	/sper/, tear /tir/, here /hijer/, hear /hir/ idea /aidia/, hare /heer/, rare /rer/, repair /riper/, pair /per/	wear /łer/, care /ker/	wear /łer/, hair /her/
no vowel reduction in the unstressed syllable / problems with weak forms	/riper/, pair /per/ tomorrow /temorou/, arrive /eraiw/, attention /etenszyn/, banana /banana/, carrot /kerot/, correct /korekt/, dinner /diner/,		customer /kastemer/, difficult /dyfykelt/, husband /hazbend/, forget /ferget/	about /ebaut/, forgive /forgiw/, husband /hazbend/, umbrella /ambrela/, on the right /on de rajt/, in front of /in front of/, helpless /helplys/, harmless /harmles/, tomorrow /tumorou/, together /togeder/

As can be observed, the orthographic transcription contributes to the fossilization of the most typical pronunciation errors made by Polish learners and does not foster the formation of accurate phonetic categories. First of all, because the Polish alphabet has fewer letters than there are sounds in English, one and the same letter is used to refer to two or three different phonemes, thereby a number of vocalic contrasts is neutralized, e.g. 'a' represents $\frac{3!}{\sqrt{N}}$ and $\frac{2}{\sqrt{\pi}}$, 'e' is used to refer to /e/, $\partial e/$, $\partial and \partial z/$, 'o' represents both /p/ and /z:/, 'u' - /v/ and /u:/. Secondly, even if the contrast is maintained, e.g. /I/ is transcribed as 'y' and /i:/ as 'i' or /I/ as 'i' and /i'./ as 'ii', the quality of the target vowel is not still right, because both Polish /i/ and /i/ differ from English /I/ with respect to the position of the tongue and it is not enough to prolong Polish /i/ (which is suggested by the double 'ii') to pronounce English /i:/. Thirdly, the voiceless and voiced interdental fricatives are transcribed with 'f' or 't' and 'v' and 'd', respectively, reinforcing the substitutions commonly made by Polish learners instead of drawing their attention to the place of articulation of the problematic sounds. The same happens with the English palato-alveolars which are transcribed as Polish post-alveolar counterparts ('sz,' 'ż,' 'cz,' 'dż').

Importantly, this type of transcription fails to meet the criteria advocated by (Abercrombie, 1978:124): "(...) whatever method of indicating pronunciation is

adopted, it should be consistently and correctly used in the body of the work." The dictionaries discussed here are, on the whole, devoid of internal consistency and accuracy. The reader is presented with a high degree of variation e.g. in My First English-Polish Dictionary the diphthong /əu/ is transcribed in three different ways as 'ol' (shadow/szadoł/), 'ou' (boat/bout/) and 'o' cold/kold/; in Great Illustrated English-Polish Dictionary for Children and Young Learners the diphthong /au/ is transcribed as both 'al' (town /taln/) and 'au' (house /haus/); in Illustrated Polish-English and English-Polish Dictionary the velar nasal is represented as /ng/ (amazing /amejzing/) and /n/ (bring /brin/, wrong /ron/). Moreover, most transcriptions are incorrect and the reason for this is that in order to convey the proper pronunciation additional symbols are simply necessary. The velar nasal, the interdental fricatives, the palato-alveolars and the vowels cannot be precisely represented without the phonemic alphabet. Yet, even where no special phonetic symbols are needed, the transcriptions are erroneous. This can be seen, for example, on the basis of word-final obstruent devoicing in plural forms where /z/zis replaced with /s/. Polish learners of English have problems with maintaining the fortis / lenis distinction in word-final position and the transcriptions such as boys /bojs/, dogs/dogs/, leaves /liws/ encourage the inappropriate behaviour and foster bad habits rooted in linguistic transfer.

One of the consequences of the inconsistent transcription is preventing dictionary users from spotting patterns as well as phonological rules and phonotactic constraints, e.g. non-rhoticity can be explained in a transparent way that in accents such as SBE /r/ is pronounced only before a vowel. The transcriptions such as paper /peiper/, heart /hart/, but fork /fok/ (My First English-Polish Dictionary) or farmer /farmer/, plumber /plamer/, but fisherman /fyszemen/ (Great Illustrated English-Polish Dictionary for Children and Young Learners), however, contradict the rule and are likely to trigger completely random realization of this phoneme in other contexts as well (word-finally and before a consonant). The same applies to syllabicity, which constitutes a problem for Polish learners, who tend to insert a vowel before a sonorant which should be syllabic, e.g. table /tejbul/, button /baton/, etc. The dictionaries reinforce this inappropriate practice as they include transcriptions such as e.g. common /komon/, impression /impreszyn/, muzzle /mazyl/. At the same time, in each dictionary versions such as button /batn/, pension /penszn/, medal /medl/, freckle /frekl/ can be found along those with the inserted vowel, which introduces further confusion.

Another area where a rule formation is hindered is vowel reduction in the unstressed syllable. As suggested by Szpyra-Kozłowska (2015), a good way to familiarize with vowel reduction those learners who do not have this phenomenon in their L1 is to place on the blackboard several transcribed words which contain schwa and elicit the rule regarding the type of syllable in which this vowel is found. Without using the schwa symbol it is hardly possible to make an easy explanation and exemplification of vowel reduction and weak forms, which can be observed in the dictionaries discussed here. The unstressed syllables in both content and function words contain full vowels, e.g. /e/ in e.g. *tomorrow* /temoroł/,

about /ebaut/, *husband* /hazbend/, *on the right* /on de rajt/; /o/ in e.g. *carrot* /kerot/, *correct* /korekt/, *ecology* /ikolodżi/, *short of* /szort of/; /a/ in e.g. *umbrella* /ambrela/, *banana* /banana/. What is more, word-stress (a crucial element of word's phonetic identity) is completely absent from My First English-Polish Dictionary.

The lack of internal consistency and logic is additionally accompanied by the lack of unified pattern across dictionaries with each of them presenting their reader with its own idiosyncratic transcription. This practice results in the situation in which some words have a different transcription depending on the dictionary.

word	My First English- Polish Dictionary	Great Illustrated English-Polish Dictionary for Children and Young Learners	Illustrated Polish- English and English- Polish Dictionary	
happy	/hapi/	/hepy/	/hepi/	
interesting	/interesting/	/yntrystyng/	/yntrestyin/	
aunt	/aunt/	/ant/	/aant/	
factory	/fektori/	/faktery/	/fektri/	
hospital	/hospitl/	/hospytl/	/hospytal/	
museum	/miusiem/	/mjuziem/	/mjuzijem/	
penguin	/penguin/	/pengłyn/	/pyngłyn/	
ring	/ring/	/ryng/	/rin/	
exam	-	ygzam	ygzem	

Table 2: Examples of words transcribed differently across the dictionaries.

In addition to mispronunciations rooted in sound substitutions, Polish learners make spelling-induced mistakes. These deviations, or so called local errors, are not caused by the learners' inability to articulate L2 sounds, but result from interference either from sound or spelling in their native language and English, e.g. many Polish learners pronounce *Disney* as /d'isnej/, not /¹dIznI/ or *climate* as /klajmejt/, not /¹klaImət/ (Szpyra-Kozłowska, 2013). Such phonetic distortions affecting the whole word and sometimes rendering it unrecognizable have been found to impede intelligibility as well as contribute to the impression of foreign accent and evoke native listeners' annoyance (Bryła-Cruz, 2016; Szpyra-Kozłowska 2013). As a result, they should be pedagogically prioritized.

Using phonemic transcription is an invaluable tool in helping students to notice the relationship between spelling and sounds, whereas orthographic transcription hinders this process and creates the false impression that many letters are read in the same way as they are spelt. The mispronunciations included in Table 3. are notorious among Polish learners as well as native speakers of other L1s.

spelling-based	My First English-	Great Illustrated	Illustrated Polish-
errors	Polish Dictionary	English-Polish	English and English-
		Dictionary for	Polish Dictionary
		Children and Young	
		Learners	
	aunt /aunt/, overall	beard /bird/, calm	area /erija/, worse
	/oweral/, palm /palm/,	/kalm/, devil /dewel/	/łors/, work /łork/
	climb /klaimb/, lamb		purple /parpl/, suit
	/lemb/ (but limb		/slit/, tired /tajred/,
	/lim/), wonderful		knowledge /noulydż/,
	/łonderful/, onion		fabric /fajbryk, above
	/onion/, oar /oa/,		/abouw/, drawer
	pocket /pakit/, turkey		/drołer/, Poland
	/tarki/, gnome		/polend/, Polish
	/gnoum/, example		/polysz/, protect
	/iksampl/, difficult		/proutekt/,
	/difikalt/, computer		photographer
	/kampiuter/, compas		/foutografer/
	/kompas/, resistant		
	/resistant/,		
	handkerchief		
	/hendkerczif/, hare		
	/heer/, helicopter		
	/helikoupter/		

Table 3: Examples of spelling-induced mispronunciations found in the dictionaries.

As can be seen in Table 3, the dictionaries discussed here contain transcriptions which are overtly erroneous and inaccurate, e.g. silent letters are pronounced (*palm* /palm/, *lamb* /lemb/, *gnome* /gnoum/) or certain sounds are substituted inappropriately due to the heavy reliance on spelling or an inappropriate rule overgeneralization, e.g. /3:/ is replaced with 'a'- *turkey* /tarki/, *purple* /parpl/ and 'o' - *worse* /łors/, *wonderful* /łonderful/; / 1 / is substituted with 'o' - *onion* /onion/, *compass* /kompas/ and 'ou' - *above* /abouw/; *knowledge* is transcribed with a vowel suggesting the same diphthong-like vowel as in *know* - /noulydż/ and the same happens in *photographer* /foutografer/.

One more way in which the dictionaries in question are misleading relates to the fact that they create the false impression that some cognate words sound exactly the same in English and Polish. The English orthographic transcription is identical to how these words are both spelt and pronounced in Polish, which encourages speaking English with Polish sounds.

cognate word	phonemic transcription	orthographic transcription	Polish equivalent	My First
hacker	/ˈhækə/	/haker/	haker	English- Polish
scorpion	/'skɔːpɪən/	/skorpion/	skorpion	Dictionary
shock	/'∫¤k/	/szok/	szok	
sport	/'spɔːt/	/sport/	sport	
problem	/'prɒbləm/	/problem/	problem	
metal	/'metl/	/metal/	metal	
panda	/'pændə/	/panda/	panda	
camera	/'kæmrə/	/kamera/	kamera	Great Illustrated English- Polish Dictionary for Children and Young Learners
garage	/ ^ı gæraːʒ/	/garaż/	garaż	Illustrated Polish-
essay	/'esei/	/esej/	esej	English and English-
finish	/ˈfɪnɪʃ/	/finisz/	finisz	Polish
karate	/kəˈraːtɪ/	/karate/	karate	<i>— Dictionary</i>

Table 4: The treatment of cognates in the dictionaries.

The dictionaries discussed here claim to "simplify" English pronunciation and, as shown above, this is largely done by indicating that English sounds can be substituted with Polish ones. It is rather surprising then that these books should introduce extra confusion and introduce distinctions in their transcriptions between words which should be represented in the same way, because they are homophones e.g. *deer* /diir/ but *dear* /dijer/, *here* /hijer/ but *hear* /hir/, *key* /ki/, but /kii/ in the *keybord*; *sea* /sii/, but /si/ in *seagull*; *open* /open/ (adj.), but /oupen/ (v.); *can* /kan/ (container/, but /ken/ (modal verb); *coat* /kołt/, but *waistcoat* /weiskełt/; *work* /łork/, but *housework* /hausłerk/; *everybody* /ewribody/, but *nobody* /noubadi/.

6. Conclusion

The overview of the three dictionaries conducted in the present paper shows that implementing orthographic transcription instead of the IPA is not pedagogically justified and can be harmful for a few reasons. Firstly, it fails to fulfil its primary task, that is to inform the learner about the accurate and precise pronunciation of words. Secondly, contrary to what these dictionaries intend to do, the user is not offered a "simplified" transcription, but quite the opposite. The system they propose obscures the relationship between sounds and letters and hinders the formation of proper phonetic awareness. Orthographic transcription intensifies interference between L1 and L2 and contributes to the fossilization of the most persistent mispronunciations stemming from phonetic transfer (e.g. plosive insertion after the word-final velar nasal, substitutions of the dental fricatives, neutralizing vocalic contrasts) as well as, so called, local errors. As has been demonstrated, the powerful impact of English orthography cannot be effectively overcome without the IPA. Last but not least, inconsistent transcription prevents learners from spotting patterns, rules and phonotactic constraints (such as e.g. nonrhoticity, vowel reduction, silent letters, etc.). As a result, relying on ordinary spelling rather than the IPA is a short-sighted option which presents more problems than solutions.

A great deal of variation between the dictionaries is one more argument against orthographic transcription which fails to be unambiguous and reliable. If learners discover that one word can be pronounced in three different ways (or more), it may give them a false impression that what is acceptable and permitted is largely arbitrary. As a consequence, they may develop a very undesirable conviction that pronunciation does not deserve too much attention or conscious practice, because there is no stable reference point, but rather multiple possibilities which will do as well.

It should be added that in the preface to one of these dictionaries there is a note to parents: "Successful communication in English requires knowing correct pronunciation, at least in its basic form. Due to the fact that children usually have problems with reading the classic phonetic transcription, we have decided to use its simplified and increasingly popular version." (Great Illustrated English-Polish Dictionary for Children and Young Learners). The cover of Illustrated Polish-English and English-Polish Dictionary contains a comment making "the simplified" pronunciation an asset of the book and informing a potential buyer about the teachers' recommendation. In the light of our data, such explanatory additions (resembling sale strategies rather than trustworthy guidelines) appear to be rather harmful, because they validate the pedagogically unjustified practice and mislead the book buyer and/or user, whose intentions may be good and who may be unaware of the problems which stem from relying on orthographic transcription. Hopefully, the present paper contributes to raising awareness of teachers, and subsequently parents and learners, as well as lexicographers. While the simplified type of orthographic transcription employed in the dictionaries discussed above could be acceptable in phrase books, it does not fulfil the criteria of phonetic correctness and violates the principle of bi-uniqueness expected from reference books.

References

- Bryła, Agnieszka. 2006. European veto to the ideological assumptions of the LFC voiced by continental learners of English (survey analysis). In W. Sobkowiak & E. Waniek-Klimczak (eds.), Dydaktyka fonetyki języka obcego w Polsce. Referaty z Szóstej Konferencji Naukowej Mikorzyn 8-10 V 2006, 18-35. Konin: Państwowa Wyższa Szkoła Zawodowa
- Bryła-Cruz, Agnieszka. 2016. Foreign Accent Perception: Polish English in the British Ears. Newcastle upon Tyne: Cambridge Scholars Publishing
- Brown, Adam. 2008. Pronunciation and good language learner. In C. Griffiths (ed.), Lessons from good language learners, 197–207. Cambridge: Cambridge University Press. https://doi.org/10.1017/CBO9780511497667.018
- Buczek-Zawiła, Anita. 2017. ELF or NELF? English Pronunciation Standards Preferences among Younger Generation of Polish Speakers. *Kwartalnik Neofilologiczny* LXIV, 1, 95–110
- Abercrombie, D. 1978. The Indication of Pronunciation in Reference Books. In P. Strevens (ed.), *In Honour of A. S. Hornby*, 119–126. Oxford: Oxford University Press
- Celce-Murcia, Marianne, Brinton, Donna M., and Goodwin, Janet M. 2010. *Teaching Pronunciation: A Reference for Teachers of English to Speakers of Other Languages (2nd edition)*. Cambridge, UK: Cambridge University Press
- Collins, Beverley, and Mees, Inger. 2003. *Practical Phonetics and Phonology: a resource book for students.* London, UK: Routledge
- Couper, Graeme. 2011. What makes pronunciation teaching work? Testing for the effect of two variables: Socially constructed metalanguage and critical listening. *Language Awareness*, 20(3), 159–182. https://doi.org/10.1080/09658416.2011.570347
- Crookston, I. 2001. Alphabetic literacy and practical phonetics teaching: some preliminary connections.

http://citeseerx.ist.psu.edu/viewdoc/download?doi=10.1.1.570.8834&rep=rep1&type=pdf (accessed June, 17th, 2022).

- Dickinson, Leslie. 1995. Autonomy and motivation: a literature review. System, 23(2), 165–174. https://doi.org/10.1016/0346-251X(95)00005-5
- Dufva, Mia, and Vauras, Marja. 2002. Promoting at-risk pupils' foreign language literacy learning. In L. Verhoeven, C. Elbro and P. Reitsma (eds.), *Precursors of Functional Literacy*, 317–337. Amsterdam: John Benjamins. https://doi.org/10.1075/swll.11.22duf
- Fouz-González, Jonas. 2020. Using apps for pronunciation training: An empirical evaluation of the English File Pronunciation app. *Language Learning* & Technology, 24(1), 62–85.
- Fraser, Helen. 1996. Guy-dance with pro-nun-see-ay-shon. *English Today*, *12*(3), 29–37. https://doi.org/10.1017/S0266078400009135
- Gilner, Leah. 2008. Pronunciation: A review of methods and techniques. *Journal of the School of Foreign Languages*, 35, 93–108.
- Häcker, Martina. 2012. The Change from Respelling to IPA in English Dictionaries: Increase in Accuracy or Increase in Prescriptivism? *Language & History*, 55, 1, 47–62. https://doi.org/10.1179/1759753612Z.0000000004
- Hancock, Mark. 1994. On using the phonemic script in language teaching. Retrieved from: http://hancockmcdonald.com/sites/hancockmcdonald.com/files/filedownloads/On%20Using%20the%20Phonemic%20Script%20in%20Language%20Teaching.p df (accessed May, 30th 2022)

- Harmer, Jeremy. 2001. *The Practice of English Language Teaching* (3rd edition. New York, NY: Longman
- Jarosz, Anna. 2021. Incidental development of pronunciation learning strategies. *Research in Language*, 19(3), 267–271. https://doi.org/10.18778/1731-7533.19.3.03
- Jones, Tamara. 2018. Pronunciation in other areas of language. In: O.K. Kang, R. Thomson, J. M. Murphy (eds.), *The Routledge Handbook of Contemporary English Pronunciation*. Abington, UK: Routledge. https://doi.org/10.4324/9781315145006-23
- Kelly, Gerald. 2000. How to teach pronunciation. Malaysia: Pearson Education Limited
- Kenworthy, Joanne. 1987. Teaching English Pronunciation. New York: Longman
- Lintunen, Pekka. 2005. Phonemic transcription and its effect of learning. https://www.academia.edu/12808547/Phonemic_Transcription_and_its_Effect_on_Learning (accessed May, 30th 2022)
- Magay, Tamas. 1981. On the phonetic transcription of English words in bilingual dictionaries. Hungarian Studies in English, 14, 85–92
- Mompean, Jose A. 2005. Taking advantage of phonetic symbols in the foreign language classroom. In Maidment J. A. (ed.), *Proceedings of the phonetics teaching and learning conference London*, *UK*, 27–30 July 2005. London: University College London, Department of Phonetics and Linguistics.
- Mompean, Jose, and Lintunen, Pekka. 2015. Phonetic Notation in Foreign Language Teaching and Learning: Potential Advantages and Learners' Views. *Research in Language*, 13(3), 292-314. https://doi.org/10.1515/rela-2015-0026
- Mompean, Jose, and Fouz-Gonzalez, Jonás. 2021. Phonetic symbols in contemporary pronunciation instruction. *RELC Journal*, 52(1), 155–168. https://doi.org/10.1177/0033688220943431
- Oxford, R. 1990. Language learning strategies. New York: Newbury House Publisher
- Moyer, Alene. 2004. Age, Accent, and Experience in Second Language Acquisition: An Integrated Approach to Critical Period Inquiry. Clevedon: Multilingual Matters. https://doi.org/10.21832/9781853597190
- Moyer, Alene. 2007. Do language attitudes determine accent? A study of bilinguals in the USA. *Journal of Multilingual and Multicultural Development*, 28(6), 502–518. https://doi.org/10.2167/jmmd514.0
- Paikeday, Thomas M. 1993. Who needs IPA? *English Today*, 9(1), 38–42. https://doi.org/10.1017/S026607840000691X
- Pawlak, Mirosław. 2006. On the use of pronunciation learning strategies by Polish foreign language learners. In W. Sobkowiak and E. Waniek-Klimczak (eds.), *Dydaktyka fonetyki języka obcego* w Polsce. Referaty z szóstej konferencji naukowej, 121–135. Mikorzyn, 8–10 maja 2006. Konin: Państwowa Wyższa Szkoła Zawodowa w Koninie. https://doi.org/10.2478/v10015-010-0005-6
- Pawlak, Mirosław. 2008. Another look at the use of pronunciation learning strategies. An advanced learner's perspective. In E. Waniek-Klimczak (ed.), *Issues in accents of English*, 304–322. Newcastle upon Tyne: Cambridge Scholars Publishing
- Pawlak, Mirosław. 2011. Students' successes and failures in learning foreign language pronunciation: Insights from diary data. In J. Arabski & A. Wojtaszek (eds.), *The acquisition of L2 phonology*, 65–182. Bristol, Buffalo, Toronto: Multilingual Matters. https://doi.org/10.21832/9781847693761-014
- Purcell, Edward, and Suter, Richard. 1980. Predictors of pronunciation accuracy: A re-examination. *Language Learning*, *30*, 271–287. https://doi.org/10.1111/j.1467-1770.1980.tb00319.x
- Sardegna, Veronica G., Lee, Juhee, and Kusey, Crystal. 2018. Self-efficacy, attitudes, and choice of strategies for English pronunciation learning. *Language Learning*, 68(1), 83–114. https://doi.org/10.1111/lang.12263
- Sobkowiak, Włodzimierz. 1997. Radically simplified phonetic transcription for Polglish speakers. In R. Hickey & S. Puppel (eds.), *Trends in Linguistics. Studies and Monographs 101. Language History and Linguistic Modelling. A Festschrift for Jacek Fisiak on his 60th Birthday Volume 2*, 1801-1830. Berlin, New York: Mouton de Gruyter.

- Sobkowiak, Włodzimierz. 2007. E-dictionaries and phonolexico-grapic needs of EFL users. *Lexikos*, 17 (AFRILEX-reeks/series 17), 134-151. https://doi.org/10.4314/lex.v17i1.51528
- Smit, Ute. (2002). The interaction of motivation and achievement in advanced EFL pronunciation learners. *IRAL*, 40, 89–116. https://doi.org/10.1515/iral.2002.009
- Szpyra-Kozłowska, Jolanta. 2013. On the irrelevance of sounds and prosody in foreign-accented speech. In E. Waniek-Klimczak and L. Shockey (eds.), *Teaching and Researching English Accents in Native and Non-native Speakers* (pp. 15–29). Berlin: Springer Berlin Heidelberg https://doi.org/10.1007/978-3-642-24019-5_2
- Szpyra-Kozłowska, Jolanta. 2015. Pronunciation in EFL Instruction. A Research-Based Approach. Bristol: Multilingual Matters. https://doi.org/10.21832/9781783092628
- Szyszka, Magdalena. 2015. Good English Pronunciation Users and their Pronunciation Learning Strategies. *Research in Language*, 13(1), 93-106. https://doi.org/10.1515/rela-2015-0017
- Taylor, D. S. 1990. The place of phonetics, phonology and transcription in language teaching. In V. Bickley (ed.), *Language Use, Language Teaching and the Curriculum*, 384–392. Hong Kong, China: Education Department / Institute of Language in Education
- Tench, Paul. 1992. Phonetic symbols in the dictionary and in the classroom. In Brown, A. (ed.), *Approaches to Pronunciation Teaching*, 90–102. London: Macmillan
- Tergujeff, Elina. 2013. Learner perspective on English pronunciation teaching in an EFL Context. *Research in Language*, *11*(1), 81–95. https://doi.org/10.2478/v10015-012-0010-z
- Underhill, Adrian. 2005. Sound Foundations (3rd ed.). London: Macmillan Publishers Ltd.
- Ushioda, Ema. 1996. Learner Autonomy 5: the Role of Motivation. Dublin: Authentik
- van Lier, Leo. 1996. Interaction in the Language Curriculum: Awareness, Autonomy, and Authenticity. Harlow: Longman
- Waite, Sarah. 1994. Low-resourced self-access with EAP in the developing world: the great enabler? ELT Journal, 48(3), 233–242. https://doi.org/10.1093/elt/48.3.233
- Wells, John C. 1996. Why phonetic transcription is important. *Masori* (Journal of the Phonetic Society of Korea), 31, 239–242.