Phonological Rules in Torbatian Dialect

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Abstract

This research is a fieldwork and has been done as follows. Torbatian dialect is a current language variation and its corpus has been collected by tape-recording and after transcribing, the materials have been analyzed on the basis of phonology. In collecting the data of the study, the direct method has been applied and the fieldworker, as the native speaker of dialect, has gone to informants and sometimes to local poets, and in a natural situation has recorded his desired sample of his dialect. In the relationship of dialectology to linguistic theory, generative dialectology for phonological processes has been applied. The main difference from phonetic and phonological point of view is phonological in nature though minor phonetic differences also exist. The historical change of the final /a/ has not taken place in Torbatian dialect yet. The phonological differences between the two dialects are captured by at least some of the phonological rules which 23 of them presented in this paper.

Keywords: dialect, dialectology, phonological rules, phonetic, generative.
Introduction

This research is about the study of Torbatian dialect as a variation of Dari language, which is spoken in Torbat-e Heydariye. In fact, it is a study of dialect and dialectology. Dialect is a regionally or socially distinctive variety of language which is identified by a particular set of words and grammatical structures, i.e. dialects are subdivisions of languages and the study of all forms of dialect, especially regional dialect, is called dialectology [1].

The first problem that faces the collector of a dialect is how to sample the language and the community of its speakers. The historical linguist's corpus consists of those written samples of texts, and when s/he reaches to the point which there is no text, s/he must proceed by difficult and complicated methods of hypothetical reconstruction. But the one who studies current language variation is more fortunate. S/He is armed with a notebook, or, in these days, tape recorder, simply records whatever which is based on aspect or aspects of his study, that is, phonology, morphology, syntax or ….

Once the samples of language and of speakers have been decided upon, the dialectologist must decide how the actual collecting is to be managed. That is, the first important decision that must be made is whether the collecting is to be done by the direct method, the indirect method, or the combination of the two. In brief, the direct method involves the use of questionnaire, or tape-recording as the instruments of an interview, in which the fieldworker attempts, to get the dialect speaker or informant to produce the desired sample of his dialect, the virtue of the direct method is thus the face-to-face contact between the fieldworker and the informant in an environment conducive to natural use of the dialect. The indirect method, on the other hand, involves delivering the questionnaire, usually by post or email, either directly to a previously identified informant, or, more often to some intermediary, who in turn finds an appropriate informant who fills it in and returns it.

It is true that the ultimate aim of dialectology is to broaden and deepen our knowledge about language by taking into account all the facts about linguistic variation that can be assembled. Four different approaches, on the relationship of dialectology to linguistic theory are: The traditional which focuses on individual items; The structural, which views a language or dialect as a self-contained system; The generative, that uses the data of linguistic performance as a key to the speaker's internalized knowledge of his language; The sociolinguistics, which investigates the relationship between linguistic field, including dialect variation and the social organization of the speech community [2].

Methodology

This research is a fieldwork and based on above definition has been done as follows. Torbatian dialect is a current language variation and its corpus has been collected by tape-recording and after transcribing, the materials have been analyzed on the basis of phonology, and, as far as possible, they have been compared with those of the standard language. In collecting the data of the study, the direct method has been applied and the fieldworker, as the native speaker of dialect, has gone to informants and sometimes to local poets, and in a natural situation has recorded his desired sample of his dialect. This method has been chosen because if the study takes place in a natural situation and face-to-face contact, the results of fieldwork will be at a higher level of validity and adequacy. In the relationship of dialectology to linguistic theory, generative dialectology for phonological processes has been applied.
A short geographical and historical background
Torbat-e Heydariye is located in the north eastern part of Iran (in Khorasan province). It is bordered from the north by Mashhad, Nishabur and Fariman, from the west by Kashmar, from the south by Mahvelat and from the east by Taybad, Torbat-e Jam and Roshtkhar. Its population, based on 1390 census, amounts to 210390 [3].
The center of Torbat-e Heydariye is Torbat which its population based on 1390 census is 131150. It was built next to Ghotboddin Heydar's cemetery by Eshagh Khan-e Gharai and that is why this town has been entitled Torbat-e Heydariye [4].

The significance and purpose of the study
The question arises in studying dialects is: Why do we study? What are the motives behind the considerable expenditure of time, money, and energy which is needed for the serious collection, presentation, and analysis of dialect data? Francis says: "There are at least four kinds of motivation for dialect study which can be called the curious, the anthropological, the linguistic, and the practical"[5]. The main purpose of this study is to find and describe phonological processes (rules). Under the effect of immigration, education, broadcasting (newspapers, magazines, radio and TV), travelling and ... this dialect will be eradicated and there will be no speaker of the dialect. Hence, it is very essential and also of prime importance to have some written evidence about this dialect. On the other hand, it is useful to know the relation between the Torbatian dialect and the standard language.

The limitation of the study
In Khorasan province, each group living in a region speaks a somewhat distinctive variation of standard language and a few numbers of them speak Turkish, Kurdish or Arabic. Khanlari quotes from Moghadasi that every village of a small town in Khorasan has a different variation of the language [6].
In Torbat-e Heydariye each town, or even each village has a somewhat different dialect (For example, Bayg speaks a distinctive dialect which is rarely understood by others) and also there are differences in pronunciation of other villages which make up an accent, and more important is that, even certain words seem to have local distribution.
All these factors make the accomplishment of this study rather difficult. So, the fieldworker of this study, who is a native speaker of Torbat, the center of Torbat-e Heydariye, has to collect his data from all over the town.

Phonological rules
When morphemes are combined to form words, the segments of neighboring morphemes become juxtaposed, and sometimes undergo change. For example, consider:

/deraxt/+plural morpheme /-â/→[derextâ] 'trees' (/a/ changes to /e/)
/pomba/+plural morpheme /-â/→[pombâ] 'cottons' (final /a/ is deleted)

Changes, also, occur in environments other than those in which two morphemes come together, for example, word central and word final position. Consider:

/xâla/ →[xala] 'aunt'
/sabad/ → [sevad] 'basket'
All such changes are called Phonological Processes which are shown as phonological rules here. If the exact condition, under which a phonological process takes place, can be stated, in effect a rule has been given by converting these statements into a formal notation. For example, /deraxt/+plural morpheme /-â/→[derextâ] is shown by the following rule:

\[ \begin{bmatrix} +v \\ -c \\ -\text{back} \\ +\text{low} \end{bmatrix} \rightarrow \begin{bmatrix} -\text{low} \\ -\text{high} \end{bmatrix} \begin{bmatrix} +v \\ -c \\ +\text{back} \\ +\text{low} \end{bmatrix} \]

In this expression, the arrow → is to be read "is assigned", the slash / as "in the context of", and the environment dash — indicates the segment undergoing the rule relative to its environment (in this case before cc + plural morpheme /-â/.)

Because many rules will involve reference to the major divisions of consonants and vowels, as a notational convention, c is used for consonants and v for vowels.

But before giving phonological rules of Torbatian Dialect, two points should be mentioned. First, in this dialect the word final /a/, which has remained from old Persian /ak/, has not changed to /e/ yet. Thus in writing phonological processes /a/ is used for the words terminating in /e/ in the standard dialect. Second, a word in this dialect might have undergone more than one phonological process, and for making clear this, here, it will be marked by the number of mentioned phonological rule or rules, or by * if that process has not been mentioned in this brief work.

1. \[ \begin{bmatrix} +v \\ -c \\ +\text{back} \\ +\text{low} \end{bmatrix} \rightarrow \begin{bmatrix} -\text{back} \end{bmatrix} / \begin{bmatrix} +v \\ -c \\ -\text{back} \\ +\text{low} \end{bmatrix} \]

\( \hat{a} \rightarrow a / C \rightarrow C a \) (C)

In the bi-syllabic words [cvcv(c)], the low back vowel /â/ in the first syllable is fronted and assimilates in front feature /a/ in the second syllable.

- /xâna/ → [xana] 'room'
- /xâla/ → [xala] 'aunt'
- /jâla/ → [jala] 'hail-stone'
- /čâla/ → [čala] 'hail-stone'
- /čâra/ → [čara] 'torn'
- /mâla/ → [mala] 'trowel'
- /šâna/ → [šana] 'comb'
- /čâna/ → [čana] 'chin'
- /dâra/ → [dara] 's/he has'
- /sâqa/ → [saqa] 'stem'
- /mâya/ → [maya] 'starter (for making yoghurt)'
- /?âmad/ → [?ama]* 's/he came'
- /?andâza/ → [?andaza] 'size'
2. $\begin{align*}
+ \text{v} & \rightarrow \text{low} \\
- \text{c} & \rightarrow \text{high} \\
- \text{back} & \rightarrow \text{low} \\
+ \text{low} & \rightarrow \text{v}
\end{align*} / C \rightarrow (C) [+ \text{v}]$

$a \rightarrow e / C \rightarrow (C) V$

In the phonetic context of words with more than one syllable, the vowel /a/ of the syllable or syllables which precede the final syllable loses the + low feature and becomes –low and –high (that is /e/).

/xabar / → [xebar] ‘news’
/sabad/ → [sevad]* ‘basket’
/safar / → [sefar] ‘trip’
/parda/ → [perda] ‘curtain’
/rafta/ → [refta] ‘s/he has gone’
/narda/ → [nerda] ‘fence’
/naqša/ → [nexša]20 ‘map’
/namak / → [nemak] ‘salt’
/lappa/ → [leppa] ‘split peas’
/manbar/ → [membar]21 ‘pulpit’
/xazanda/ → [xezenda] ‘creeping creature’
/xaridan/ → [xeriyâ]22 ‘to buy’
/raqsidan/ → [rexsiyan]20,22 ‘to dance’
/šarmanda/ → [šermenda] ‘ashamed’
/parvanda/ → [pervenda] ‘file case’
/razmanda/ → [rezmenda] ‘combatant’
/qandân/ → [qendu]5,6 ‘sugar bowl’
/dandân/ → [dendu]5,6 ‘tooth’
/javân/ → [jevu]5,6 ‘young’
/damâq / → [demâq] ‘nose’
/javâb / → [jevâb] ‘answer’
/sangin/ → [sengi]7 ‘heavy’
/rangin/ → [rengi]7 ‘colorful’
/qamgin/ → [qemgi]7 ‘sorrowful’
/banafš/ → [benows]19 ‘purple’
/darafš/ → [derows]19 ‘banner’
/taqsir/ → [texsir]20 ‘fault’
/čarid/ → [čeri]8 ‘(the cow) grazed’
/parid/ → [perri]8,* ‘s/he jumped’
/xarid/ → [xerî]8 ‘s/he bought’
/došmani/ → [došmeni] ‘enemosity’
/refâqati/ → [refâqeti] ‘friendship’
/qaqf/ + /ā/ → [sexfâ]20 ‘ceiling’
/barg/ + /ā/ → [belkâ]* ‘leaves’
/maqz/ + /ā/ → [mezqâ]23 ‘brains’
/sabad/ + /ā/ → [sevedâ]* ‘baskets’
/deraxt/ + /ā/ → [derextâ] ‘trees’
/gusfand/ + /ā/ → [gosfendâ]* ‘sheep’
3. If: 
\[
\begin{array}{c}
+\text{v} \\
-c \\
+\text{low}
\end{array}
\rightarrow 
\begin{array}{c}
+\text{back} \\
-\text{low} \\
-\text{high}
\end{array} \bigg/ -
\begin{array}{c}
+\text{abrupt release} \\
-\text{nasal} \\
+\text{anterior} \\
-\text{coronal} \\
+\text{voice}
\end{array}
\]
4. Then: 
\[
\begin{array}{c}
+\text{anterior} \\
-\text{coronal} \\
+\text{voice}
\end{array} \bigg/ -
\begin{array}{c}
[w]
\end{array}
\]

In the phonetic context which +low vowel occurs before +abrupt release, -nasal, +anterior, -coronal and voice consonant, the +low vowel changes to +back and -high vowel (that is /o/). And in this case, then, its following consonant becomes [w] and with preceding vowel /o/ make a diphthong (that is /ow/). In brief, if:ab/âb then:ow. Exceptions are the loan words that this rule does not apply on them. Such as: /talab/, /?adab/, /sabr/, /qâb/.

/?âb/ → [?ow] 'water'
/šab/ → [šow] 'night'
/xâb/ → [xow] 'sleep'
/tâb/ → [tow] 'swing'
/tab/ → [tow] 'fever'
/lab/ → [low] 'lip'
/nâb/ → [now] 'new'
/sabz/ → [sowz] 'green'
/mahtâb/ → [mâtow] 'moonlight'
/?âftâb/ → [?afow]* 'sunshine'
/?âbla/ → [?owlə] 'small-box'
/sâbida/ → [sowiya] 'pulverized'
/besâb/ → [besow] 'pulverize'

5. If: 
\[
\begin{array}{c}
+\text{v} \\
-c \\
+\text{back}
\end{array} \bigg/ -
\begin{array}{c}
+\text{high}
\end{array} \bigg/ -
\begin{array}{c}
+\text{nasal} \\
+\text{coronal}
\end{array}
\]
6. Then: 
\[
\begin{array}{c}
+\text{nasal} \\
+\text{coronal}
\end{array} \bigg/ -
\begin{array}{c}
\varnothing
\end{array}
\]

In the phonetic context which +back and +low vowel precedes the +nasal and +coronal consonant, the +low feature changes to +high and the following consonant is eliminated.

/nân/ → [nu] 'bread'
/?âsân/ → [?asu]* 'easy'
/qandân/ → [qendu] 'sugar bowl'
/dandân/ → [dendu] 'tooth'
/?ârzân/ → [?arzu] 'cheap'
In the phonetic context which –back and +low precedes the +nasal and +coronal consonant, the consonant is deleted, whenever it occurs before another consonant or in word final position.

7. $\left[ +\text{nasal} \atop +\text{coronal} \right] \rightarrow \emptyset / \left[ +v \atop -c \atop -\text{back} \atop +\text{low} \right] \#_C$

\[ n \rightarrow \emptyset / i \] $\#_C$

In the phonetic context which –back and +low precedes the +nasal and +coronal consonant, the consonant is deleted, whenever it occurs before another consonant or in word final position.

8. $\left[ +\text{abrupt release} \atop -\text{nasal} \atop +\text{anterior} \atop +\text{coronal} \atop +\text{voice} \right] \rightarrow \emptyset / \left[ +v \atop -c \atop -\text{back} \atop +\text{low} \right] \#_C$

\[ d \rightarrow \emptyset / i \] $\#_C$

In the phonetic context which the +abrupt release, -nasal, +anterior, +coronal and + voice consonant occurs after a –back and +low vowel, if it is in the word final position or followed by another consonant, based rule 8, it is deleted.

/čarid/ → [čeri]2 '(the cow) grazed'
/pušid/ → [puši] 's/he put on (clothes)'
/xarid/ → [xeri]2 's/he bought'
/busid/ → [busi] 's/he kissed'
/časbid/ → [čosbi]* '(it) stuck'
/tarsid/ → [tersi]2 's/he was frightened'
/tarkid/ → [terki]2 '(it) broke out'
9. \[ +\text{abrupt release} \]
\[ -\text{nasal} \]
\[ +\text{anterior} \]
\[ +\text{coronal} \]
\[ +\text{voice} \]
\[ \rightarrow \emptyset \]
\[ +\text{nasal} \]
\[ -\text{coronal} \]
\[ \{^C\} \]
\[ d \rightarrow \emptyset / n \]

In the phonetic context which the +abrupt release, -nasal, +anterior, +coronal and + voice consonant occurs after +nasal and +coronal consonant, if it is in the word final position or followed by another consonant, based rule 9, it is deleted.

- \(/\text{čand}/ \rightarrow [\text{čan}] \) 'how many'
- \(/\text{qand}/ \rightarrow [\text{qan}] \) 'hard sugar'
- \(/\text{gand}/ \rightarrow [\text{gan}] \) 'stink'
- \(/\text{band}/ \rightarrow [\text{ban}] \) 'rope, band'
- \(/\text{tand}/ \rightarrow [\text{ton}] \) 'speed'
- \(/\text{kand}/ \rightarrow [\text{kon}] \) 'slow'
- \(/\text{pasand}/ \rightarrow [\text{pesan}]_2 \) 'selection, admiration'
- \(/\text{labxand}/ \rightarrow [\text{lebxan}]_2 \) 'smile'
- \(/\text{gusfand}/ \rightarrow [\text{gosfan}]_2 \) 'sheep'

10. \[ +\text{abrupt release} \]
\[ -\text{nasal} \]
\[ +\text{anterior} \]
\[ +\text{coronal} \]
\[ -\text{voice} \]
\[ \rightarrow \emptyset \]
\[ +\text{strident} \]
\[ +\text{anterior} \]
\[ +\text{coronal} \]
\[ -\text{voice} \]
\[ \{^C\} \]
\[ t \rightarrow \emptyset / s, f, š, x \]

In the phonetic context which the +abrupt release, -nasal, +anterior, +coronal and +voice consonant occurs after +strident, +anterior, +coronal and - voice consonant, if it is in the word final position or followed by another consonant, based rule 10, it is deleted.

- \(/\text{mâst}/ \rightarrow [\text{mâs}] \) 'yoghurt'
- \(/\text{râst}/ \rightarrow [\text{râs}] \) 'straight'
- \(/\text{kâšt}/ \rightarrow [\text{kâš}] \) 's/he planted'
- \(/\text{tašt}/ \rightarrow [\text{taš}] \) 'flat wash-tub'
- \(/\text{mošt}/ \rightarrow [\text{muš}]_2 \) 'fist'
- \(/\text{pušt}/ \rightarrow [\text{puš}]_2 \) 'back'
- \(/\text{moft}/ \rightarrow [\text{muf}]_2 \) 'free (cost)'
- \(/\text{košt}/ \rightarrow [\text{kuš}]_2 \) 's/he killed'
- \(/\text{pust}/ \rightarrow [\text{pus}] \) 'skin'
- \(/\text{rixt}/ \rightarrow [\text{rex}]_2 \) 's/he poured'
- \(/\text{bâlešt}/ \rightarrow [\text{bališ}]_2 \) 'cushion'
- \(/\text{taxt}/ \rightarrow [\text{tax}] \) 'bed'
- \(/\text{deraxt}/ \rightarrow [\text{derax}]_2 \) 'tree'
- \(/\text{saxtgir}/ \rightarrow [\text{sexgir}]_2 \) 'severe'
- \(/\text{mofxor}/ \rightarrow [\text{mufxor}] \) 'sponger'
- \(/\text{guštkub}/ \rightarrow [\text{guškow}]_2 \) 'masher'
11. \[
\left[ +\text{strident} \atop -\text{anterior} \atop -\text{continuant} \right] \rightarrow [+\text{continuant}]/[+\nu]/[-\nu] - [-\nu] \\
č \rightarrow šz \quad /V-\rightarrow C
\]

In the phonetic context which the +strident, -anterior and -continuant consonant is preceded by a vowel and followed by a consonant, the +continuant feature changes to +continuant. In other words, Č/č becomes Š/š and /j/ becomes /ž/.

\[
/hičkas/ \rightarrow [hiškas] \quad \text{‘nobody’}
\]
\[
/pičgušti/ \rightarrow [pišgušti] \quad \text{‘screwdriver’}
\]
\[
/sâčma/ \rightarrow [sâšma] \quad \text{‘pellet’}
\]
\[
/močtabâ/ \rightarrow [moštabâ] \quad \text{‘proper name’}
\]
\[
/hijda/ \rightarrow [hižda] \quad \text{‘eighteen’}
\]

12. \[
\left[ +\text{abrupt release} \atop -\text{nasal} \atop -\text{anterior} \atop -\text{voice} \right] \rightarrow [+\text{voice}]/[+\text{strident}]/[+\text{continuant}]/[-\nu]
\]

In the phonetic context which the +abrupt release, -nasal, -anterior, +coronal and -voice consonant occurs after +strident, -anterior, +continuant, -voice consonant, if it is in the word final position or followed by a vowel, its -voice feature changes to +voice.

\[
/xošk/ \rightarrow [xuš̄g]\quad \text{‘dry’}
\]
\[
/mašk/ \rightarrow [mašg]\quad \text{‘water skin’}
\]
\[
/meški/ \rightarrow [mešgi]\quad \text{‘black’}
\]
\[
/?ašk/ \rightarrow [ʔašg]\quad \text{‘tear’}
\]
\[
/boška/ \rightarrow [bošga]\quad \text{‘barrel’}
\]

13. \[If: \left[ -\nu \atop -\text{voice} \right]/ [+\nu] \rightarrow \varnothing / [+\nu] - [-\nu] \]

14. \[Then: [+\nu] \rightarrow [\text{long}] \]

If \(h\ (V) \rightarrow \varnothing / V\)
Then \(V \rightarrow \text{long } V\)

Rule 13 eliminates [h] or [h] with the vowel following it when a vowel precedes it or them, and if this process occurs then rule 14 gives the feature +long to the vowel.

\[
/mâh/ \rightarrow [mâ]\quad \text{‘moon’}
\]
\[
/šâh/ \rightarrow [šâ]\quad \text{‘king’}
\]
\[
/?ahl/ \rightarrow [ʔal]\quad \text{‘native’}
\]
\[
/zahr/ \rightarrow [zâr]\quad \text{‘poison’}
\]
\[
/sahl/ \rightarrow [sâ]\quad \text{‘easy’}
\]
\[
/mohr/ \rightarrow [môr]\quad \text{‘seal’}
\]
\[
/zohr/ \rightarrow [zôr]\quad \text{‘noon’}
\]
\[
/tohfa/ \rightarrow [ tôfa]\quad \text{‘gift’}
\]
\[
/pahn/ \rightarrow [pân]\quad \text{‘wide’}
\]
The +love vowel, preceding a +voice glide, changes to +high if a –back and +low vowel comes after that glide. One exception is /dād/ ‘gave’ + /a/ → [dâya] ‘given’, which /â/ does not change to /i/ and this is due to not confusing with /diya/ ‘seen’.

/zad/ + /a/ → [ziya] ‘s/he has beaten’
/?āmad/ + /a/ → [?amiya] ‘s/he has come’
/?oftād/ + /a/ → [?oftiya] ‘it has fallen’
/?istād/ + /a/ → [?astiya],* ‘it/s/he has stood’

Rule 16 eliminates [?] when a vowel preceding it, and if this process occurs, then rule 17 gives the feature +long to the vowel.

If ? → ø / V —
Then V → long V
19. \[ \begin{align*}
+strident & \\
+anterior & \\
-\text{coronal} & \\
-\text{voice} & \\
\end{align*} \rightarrow [w] \]

If \( a \rightarrow o / f \)
Then \( f \rightarrow w \)

In the phonetic context which \( -\text{back}, +\text{low} \) vowel occurs before \( +\text{strident}, +\text{anterior}, -\text{coronal} \) and \( -\text{voice} \) consonant, its features change to \( +\text{back}, -\text{low} \) and high \( (/a/ \text{ becomes } /o/) \). And in this case, then its following consonant becomes \([w]\) and with preceding vowel \( /o/ \) make a diphthong (that is \( /ow/\)). In brief If: af Then: ow.

- \( /\text{?afqâni}/ \rightarrow [\text{?owqâni}]^* \) 'Afganian'
- \( /\text{?afsâna}/ \rightarrow [\text{?owsâna}]^* \) 'myth, fable'
- \( /\text{?afsâr}/ \rightarrow [\text{?owsâr}] \) 'bridle'
- \( /\text{banaʃ}/ \rightarrow [\text{benowʃ}]^2 \) 'purple'
- \( /\text{daʃf}/ \rightarrow [\text{derowʃ}]^2 \) 'awl'
- \( /\text{kafʃ}/ \rightarrow [\text{kowʃ}] \) 'shoe'

20. \[ \begin{align*}
+\text{ab. release} & \\
-\text{continuant} & \\
-\text{anterior} & \\
+\text{high} & \\
+\text{voice} & \\
\end{align*} \rightarrow \begin{align*}
+\text{continuant} & \\
/[-v] & \\
\end{align*} \]

\( q \rightarrow x / \text{V} - \)

In the phonetic context which \( +\text{abrupt release}, -\text{continuant}, -\text{anterior}, +\text{high} \) and \( +\text{voice} \) occurs after a vowel, it loses \( +\text{voice} \) and \( -\text{continuant} \) features.

- \( /\text{saʃ}/ \rightarrow [\text{sxʃ}] \) 'ceiling'
- \( /\text{naʃ}/ \rightarrow [\text{naxʃ}] \) 'design'
- \( /\text{vaʃ}/ \rightarrow [\text{vax}]^10 \) 'time'
- \( /\text{vaʃ}/ \rightarrow [\text{vaxʃ}] \) 'legacy, pious foundation'
- \( /\text{naʃe}/ \rightarrow [\text{nexʃa}]^2 \) 'map'
- \( /\text{taʃim}/ \rightarrow [\text{texʃim}]^2 \) 'division'
- \( /\text{taʃir}/ \rightarrow [\text{texʃir}]^2 \) 'guilt, fault'
- \( /\text{raʃsidan}/ \rightarrow [\text{rexʃiyan}]^2,^22 \) 'to dance'

21. \[ \begin{align*}
+\text{nasal} & \\
+\text{coronal} & \\
\end{align*} \rightarrow [-\text{coronal}] / - \]

\( n \rightarrow m / - b \)

In the phonetic context which the \( +\text{nasal} \) and \( +\text{coronal} \) consonant occurs before the \( +\text{abrupt release}, -\text{nasal}, +\text{anterior}, -\text{coronal} \) and \( +\text{voice} \) consonant, the \( +\text{coronal} \) feature changes to assimilate in \( -\text{coronal} \) feature of following consonant.

- \( /\text{sanba}/ \rightarrow [\text{samba}] \) 'Saturday'
- \( /\text{panba}/ \rightarrow [\text{pomba}]^* \) 'cotton'
- \( /\text{anbor}/ \rightarrow [\text{ambor}] \) 'tongs'
- \( /\text{anbâr}/ \rightarrow [\text{ambâr}] \) 'warehouse'
22. \[\begin{array}{c}
+\text{abrupt release} \\
-\text{nasal} \\
+\text{anterior} \\
+\text{coronal} \\
+\text{voice}
\end{array}\] \[\begin{array}{c}
[\backslash v] \\
[\backslash c] \\
[\backslash c] \\
[\text{back}] \\
[\text{low}]
\end{array}\] \\
\(d \rightarrow y / V \rightarrow + a\)

In the phonetic context which the +abrupt release, +anterior, +coronal, -nasal and +voice consonant occurs after a vowel at the end of the morpheme, it will changes to a glide if a +low, -back vowel is added to it.

\[\begin{align*}
\text{/did/} &+ /a/ \rightarrow [\text{diya}] \quad \text{'seen'} \\
\text{/čid/} &+ /a/ \rightarrow [\text{čiya}] \quad \text{'picked'} \\
\text{/dâd/} &+ /a/ \rightarrow [\text{dâya}] \quad \text{'given'} \\
\text{/zad/} &+ /a/ \rightarrow [\text{zialya}] \quad \text{'beaten'} \\
\text{/xarid/} &+ /a/ \rightarrow [\text{zialya}] \quad \text{'bought'} \\
\text{/?âmad/} &+ /a/ \rightarrow [\text{?amiya}] \quad \text{'come'} \\
\text{/borid/} &+ /a/ \rightarrow [\text{borriya}] \quad \text{'cut'} \\
\text{/busid/} &+ /a/ \rightarrow [\text{busiya}] \quad \text{'kissed'} \\
\text{/parid/} &+ /a/ \rightarrow [\text{perriya}] \quad \text{'jumped'} \\
\text{/kešid/} &+ /a/ \rightarrow [\text{kešiya}] \quad \text{'pulled'} \\
\text{/čarid/} &+ /a/ \rightarrow [\text{čeriya}] \quad \text{'grazed'} \\
\text{/xosbid/} &+ /a/ \rightarrow [\text{xosbya}] \quad \text{'slept'} \\
\text{/?oftâd/} &+ /a/ \rightarrow [\text{?oftiya}] \quad \text{'fallen'}
\end{align*}\]

23. \(C1C2 \rightarrow C2C1\)

This change known as metathesis involves a reversal in the position of two adjoining sounds.

\[\begin{align*}
\text{/maqz/} & \rightarrow [\text{maqz}] \quad \text{'brain'} \\
\text{/satl/} & \rightarrow [\text{salt}] \quad \text{'bucket'} \\
\text{/qofl/} & \rightarrow [\text{qolf}] \quad \text{'pad lock'} \\
\text{/tâksi/} & \rightarrow [\text{tâski}] \quad \text{'taxi'} \\
\text{/felâks/} & \rightarrow [\text{felâsk}] \quad \text{'flask'} \\
\text{/?estaxr/} & \rightarrow [\text{?estalx}] \quad \text{'pond, pool'} \\
\text{/madresa/} & \rightarrow [\text{merdesa}] \quad \text{'school'} \\
\text{/ketf/} & \rightarrow [\text{keft}] \quad \text{'shoulder'} \\
\text{/sobh/} & \rightarrow [\text{sôb}] \quad \text{'morning'} \\
\text{/nosxa/} & \rightarrow [\text{noxsza}] \quad \text{'prescription'} \\
\text{/?aks/} & \rightarrow [\text{?aks}] \quad \text{'picture'} \\
\text{/man/?} & \rightarrow [\text{mân}] \quad \text{'prohibition'}
\end{align*}\]

**Conclusion**

The main purpose of this study was to describe the Torbatian dialect as spoken in Torbat, the center of Torbat-e Heydariye. Having made a general study on this dialect and compared it with standard Persian, we see that the main difference from phonetic and phonological point of view is phonological in nature though minor phonetic differences also exist. The historical change of the final /a/ has not taken place in Torbatian dialect yet. The phonological differences between the two
Dialects are captured by at least some of the phonological rules which 23 of them presented in this paper.
It is true that the ultimate aim of dialectology is to broaden and deepen our knowledge about language by taking into account all the facts about linguistic variation that can be assembled. As mentioned earlier, there are so many varieties of this dialect in Torbate Heydariye which must be studied as soon as possible because under the effect of immigration, education, broadcasting (newspapers, magazines, radio and TV), travelling and ... this dialect and will be eradicated and there will be no speaker of the dialect. Hence, it is very essential and also of prime importance to have some written evidence about this dialect. On the other hand, it is useful to know the relation between the Torbatian dialect and the standard language.

**Abbreviations and Symbols:**

- **c** consonant
- **v** vowel
- **+c** +consonantal
- **+v** +vocalic
- **-c** -consonantal
- **-v** -vocalic
- **ø** delition
- **-** length
- **#** word boundary
- **()** optional
- **+** plus
- **=** is equal to
- **/** or
- **→** changes to, gives

**Phonetic Alphabets:**

- Š= oral alveo-palatal voiceless fricative
- Ž= oral alveo-palatal voiced fricative
- Č= oral alveo-palatal voiceless affricate
- Č= oral alveo-palatal voiceless affricate
x=oral uvular voiceless fricative
q=oral uvular voiced abrupt release
?=oral glottal voiceless abrupt release
â= back low vowel
a=front low vowel
References


