

Contrastive visibility and the loss of *ü,ö* in Vidin' Turkish

The Vidin' dialect of Turkish has lost the vowels *ü,ö* (Neméth 1996:6) due to contact and/or the markedness of the combination [-back,+round], which has contradictory effects on F₂.

(0)	Vidin' Turkish	Istanbul Turkish
a.	soz	söz
b.	ustune	üstüne
c.	boyle	böyle
d.	mercumek	mercümeek

In this paper we explore the consequences of the loss of these vowels for the statement of palatal harmony, and conclude that once a contrastive visibility theory of harmony is adopted for Vidin' and in fact all of Turkic (Nevins & Vaux 2004, 2005), Vidin' harmony works exactly as expected, providing striking confirmation for the theory already proposed, in which non-contrastive values of [back] are fully specified but are invisible to harmony.

On one view, the loss of these vowels complicates the statement of vowel harmony in Vidin', as examples such as (0d) seemingly allow spreading of [-back] across an intervening [+back] vowel. Moreover, such examples constitute counterexamples to the theory of Strict Locality (Ni Chiosáin and Padgett 2001) which states that "segments are either blockers or participants in spreading; there is no transparency". Such vowels have been accommodated under a theory of abstract and absolutely-neutralized vowels (Vago 1973), which proposes that all transparent instances of Vidin' surface [u] are in fact underlying /ü/ until a very late stage of absolute neutralization. However, in the present theory, the Vidin' child need not posit any abstract /ü/: the statement of vowel harmony in (1-3) holds for Istanbul and Vidin' Turkish:

- (1) Contrastive visibility: only contrastive values of [back] are visible for harmony
- (2) Harmony: Adjacent visible values of F must agree in value
- (3) Contrastive: An instance of the feature F is contrastive within a set of other features B if both features of F may occur in B
- (4) Vidin Turkish markedness filter: *[-back, +round] as underlying vowels

Given (3) and (4), *u,o* are not contrastive for [back] in Vidin Turkish. Given (1), this means that *u,o* will not be visible for harmony, and thus will not count in the computation of adjacent-visible-feature identity enforced by (2). Importantly, the behavior of *u,o* in Turkish is not compatible with radical underspecification, as these vowels participate in (5):

- (5) Local dorsal assimilation: All values of [back] spread left-to-right between adjacent segments with a Dorsal articulator

Adopting the proposal that vowels, velar consonants, and uvular consonants, all have Dorsal as their primary articulator (Sagey 1986; Halle, Vaux & Wolfe 2000), (5) will induce local spreading of [back] from onset-C to nucleus (6) or from nucleus to coda (7). Importantly, *u,o* participate in this process, and in fact the only place in Vidin' Turkish in which *ü,ö* surface is as the result of (5), as shown in (6). Moreover, *u,o* are fully [+back] and not phonologically central as shown by the fact that they induce uvularization (7), spread of [+back]

- (6) küjane (Istanbul *kusane*); kümes, tuküruq (Istanbul *tükürük*)
- (7) yuqsek (Istanbul *yüksek*); buyuq (Istanbul *büyük*); bİraq (Ist. *birak*)

On the theory developed in Calabrese (1995), the same feature may be relativized to only contrastive values for one process, as in (2), operative throughout Turkic, but to all values of that feature for another process, as in the local (5). Such a theory allows for consistent and concrete representations of Vidin' Turkish *u,o* and a straightforward understanding of how the change in inventory interacts with the persistence of contrastive harmony.