The interaction between the stress system and the consonantalization of vowels in hiatus in Late Latin

Hiatus resolution by the consonantalization of non-low (i, e, u, o) before another vowel in Late Latin (dated in the first and/or second century AD, Pope 1934 : 102, Lindsay 1984 : 142, Bourciez 1974 : 28, Fouché 1958 : 28, among others) is illustrated in (1).

(1) *consonantalization of i, e, u, o in hiatus*

classical latin		*late latin*	*old french*	*modern french*	
fílium	[fiːlium]	[filju]	fil	fils	'son'
víneam	[wiːneam]	[winja]	vigne	vigne	'wine'
vídua	[widuam]	[wedwa]	veve, vedve	veuve	'widow'
coacticáre	[koaktikare]	[kwaktikare]	cachier	cacher	'to hide'

The relation between hiatus resolution and stress displays a paradox that has never been properly analyzed. All traditional analyses agree on the fact that in order for consonantalization to take place the non-low vowel in hiatus had to be unstressed. Bourciez (1974 : 148) states: "tout i ou e atone en hiatus avait pris la valeur de y… [every unstressed i or e in hiatus has taken the value of j], and Pope (1934 : 102), for instance, mentions " that unstressed ĕ, ĭ, ŏ, ŭ standing in hiatus with a following vowel gradually lost syllabic value and consonantalised. If hiatus resolution is indeed restricted to unstressed vowels, it becomes clear why it did not take place in disyllabic words, as illustrated in (2).

(2) *absence of consonantaliztion in disyllabic words*

classical latin		*late latin*	*old french*	*modern french*	
déum	[deum]	[deu]	deo, de, dieu,	dieu	'god'
grúem	[gruem]	[grue]	grue	grue	'crane'
égo	[ego]	[eo]	eo, io, jeu, jou, jo	je	'I'
víam	[wiam]	[wea]	veie	voie	'way'
méa	[mea]	[mea]	meie, moie	mienne	'mine'

The forms in (3) show that the absence of consonantalization in (2) is unrelated to the vowel in hiatus being in initial position.

(3) *consonantalization in initial position*

classical latin	*late latin*	*old french*	*modern french*
diúrnum	[dj/dʒɔrnu]	jorn, jor	jour
geórgium	[gj/dʒɔrgj/dʒu]	Georges	Georges
quiétum	[kwjeta]	coi	à l'abri de, tranquille
duódecim	[dwodetsi]	dose	douze

Finally, the forms in (4) show that paradoxically, stressed vowels could be subject to consonantalization for which, as we will show, no satisfactory account has been provided in traditional analyses.

(4) *consonantalization of stressed vowels*

classical latin	*late latin*	*old french*	*modern french*
filíolum	[filjolu]	filuel	filleul
tiliam *tilíolu	[tiljolu]	tilleul	tilleul
gladíolum	[gladjolu]	glaïeul	glaïeul
mulíerem	[muljere]	moillier	--- 'femme, épouse'

To sum up, the pre-theoretical generalization seems to be that consonantalization took place independent from stress and is only blocked in disyllabic words.

This paper explains the seemingly paradoxical relationship between stress and consonantalization by showing that in a constraint-based OT analysis, using Harmonic Serialism (McCarthy 2008), it is the prosody of the language that is determining when and when not consonantalization, in itself formulated independently from stress, was applied. More specifically, we will show that in words like *deum* and *viam* in (2), consonantalization did not take place given that when serially passing from *(ví.)a* to *(vjá)* in a second evaluation round through the constraint grammar, and, given that the constraint NON-FIN, (feet may not be final) dominates the constraint NO HIATUS, no harmonic improvement is possible contrary to the other cases.

References

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