BRILL

BRILL'S JOURNAL OF AFROASIATIC LANGUAGES AND LINGUISTICS 7 (2015) 307–330

BAALL

brill.com/aall

Tarifit Berber

From VSO to Topic-Initial

*Abdelhak El Hankari**

The University of Newcastle, Australia

Abdel.elhankari@newcastle.edu.au

Abstract

This paper is concerned with the word order of Tarifit Berber. It is argued that this variety has now shifted from VSO to a topic-prominent system. The topic is realised by the subject when all arguments are lexical or by VP-Topicalisation (V + object clitic) when the object is a pronominal clitic. The syntax of wh-/operator and some embedded clauses, which typically require a Verb-first structure, is also investigated. A careful consideration of these clauses reveals that the surface position of the verb is the result of V-to-C movement, which is motivated by focus. Topic and focus are investigated within the current debate as to whether discourse features are syntactic or phonological. Several pieces of evidence are presented, which suggest that these features are likely to be phonological in Tarifit. The object clitic, which is specified for topic, cannot move alone to the initial position of the clause, presumably due to its prosodic deficiency. So, it must pied-pipe the verb with it yielding VP-Topicalisation. Similarly, focus in C can only be valued by an independent phonological item. If the complementiser does not meet this condition, the main verb must move to C, giving rise to a strict VS ordering.

Keywords

Tarifit Berber – topic – VP-Topicalisation – focus – verb second

* I am grateful to Jamal Ouhalla for helpful comments on an early version of this paper. I would also like to thank an anonymous BAALL reviewer for constructive criticism and feedback. Any errors remain my own responsibility.

 | DOI: 10.1163/18776930-00702006

1 Introduction

There appears to be a unanimous view in the literature that Berber[1] has an unquestionable basic VSO word order. Other possible orders are argued to be derived and therefore marked in one way or another. To the extent that this claim has become the norm in the Berber linguistic literature, it is often taken as a given when any aspect of the syntax of the language is investigated. The fact that SVO is often claimed to be the most common order after VSO is also important: *"... SVO is the next least marked order ... The great majority of sentences in* [Tamazight] *can be both VSO and SVO ...* [Conversely] *... OVS sentences are much less usual and much more marked than SVO"* (Sadiqi 1986: 9). This statement sums up the literature on the word order of Berber in the broad sense. From this discussion, one can induce that the position of the object in OVS is different from the position of the subject in SVO and, especially, that Sadiqi explicitly claims that the object in a clause-initial position is focused. As for the claim that SVO is the next most common order, this typology is not exclusive to Berber but appears to be the general tendency in the VSO system according to Greenberg's Universal six.[2]

Similarly, based on a statistical corpus conducted on Ayt-Sidar Tarifit spoken in the eastern part of the Rif area, Cadi (1987) reports that the majority of his subjects chose VSO as the preferred order. His statistics showed that 75% favoured VSO, while 25% of his informants preferred SVO. It is important to note that a quarter of Cadi's informants chose SVO. His corpus was not without motivation; it appears to be a response to some claims regarding the grammatical shift of some other Berber varieties. For instance, Cadi (1997), referring to Galand (1979), holds that Tuareg has adopted SVO as the basic order. So, his field work is more like a confirmation that VSO is still maintained in Tarifit of Ait-Sidar.

From this brief typological survey regarding the word order of Berber, it can be noticed that SVO, to some degree, is competing with VSO in many Berber varieties. However, these works still argue that VSO remains the dominant order. It is this specific issue which I wish to explore relative to Tarifit. On the basis of empirical evidence, I show that this particular variety favours SVO over VSO. Crucial to this grammatical shift is the fact that the subject in SVO is the

1 The exact variety of Berber examined in the paper is Tarifit, known among its speakers as ðarifiθ, spoken around the province of Al Hoceima in Northern Morocco.

2 Greenberg's universal six states that "all languages with dominant VSO order have SVO as an alternative or as the only alternative basic order." (Greenberg 1966).

topic and not the grammatical subject. An examination of the relevant facts suggests that topicalisation is realised in two ways. In a basic transitive clause where all arguments are lexical, it is the subject which is topicalised, yielding SVO. When the object is a clitic, it is this pronoun which fills the topic position by pied-piping the verb with it yielding the $V_{[OBJ.CL]}$ S order.

This paper explores an additional phenomenon whereby wh- and some embedded clauses require a verb-first structure, unlike root clauses. A close examination of the syntax of these clauses reveals that this particular configuration is the result of a V-to-C movement and therefore different from the configuration generating VSO in root clauses. This paper is organised as follows. Section two provides an overview of the word order of Tarifit. Section three addresses the ordering of elements in the root clause. Section four deals with wh- and embedded clauses particularly, the issue of the verb-first structure and its motivation. Section five looks at the discourse features (topic and focus) and makes the claim that these are likely to be phonologically motivated in Tarifit. Section six concludes the article.

2 Word Order: An Overview

When native speakers of Tarifit are presented with a choice with gradable acceptability between VSO and SVO, SVO is chosen as the preferred order. The data in (1) shows the possible alternations that are found with the basic declarative clause in Tarifit. The fact that Berber is a pro-drop language makes the VO order possible without the lexical subject (1a). It must be noted that Tarifit is such a robust pro-drop language that a sentence like (1a) is preferred when the subject is not known. This is due to the obligatory presence of subject-agreement on the verb, which allows the subject to be dropped freely. Other possible combinations are SVO (1b), which is the preferred order when the two arguments are lexical and VSO (1c), which is less frequent. The latter order, however, is not completely ruled out, but is perceived as somewhat odd by Tarifit speakers.[3]

3 Interestingly, this does not apply to verbal constructions with idiomatic meaning. Consider the data below in (i). Tarifit does not have a verbal root equivalent to the English 'to rain'. This concept is expressed using the verb √*ʃaϑ* 'hit'. So, the verb in this particular context does not have a literal meaning but refers to 'the falling of the rain/it is wet'. Constructions like these favour VSO over SVO, due to the idiomatic interpretation of the verb. That is, idioms become

(1) a. *ð-zra* *a-qzin.* V$_{[pro]}$ O
3F.SG-see.PERF SG-dog
'She saw the dog.'

b. *Nunja ð-zra* *a-qzin.* SVO
Nunja 3F.SG-see.PERF SG-dog
'Nunja saw the dog.'

c. *?ð-zra* *Nunja a-qzin.* VSO
3F.SG-see.PERF Nunja SG-dog
'Nunja saw the dog.'

In addition to lexical arguments, Tarifit, like other Berber varieties, has the option of using object clitics as substitutes for lexical DPs.[4] In a basic transitive sentence, the realization of the internal argument as a clitic is important to the current discussion in that it affects the word order. In (2a), both the verb and the object clitic are required to be in the initial position of the clause when the internal argument is a clitic. In this case, the SVO option seen in (1b) is not available anymore. The subject is still allowed in the initial position but this possibility is a clear case of left-dislocation, which I represent here using a comma (2b). The same alternation is ruled out when no intonation break (without a comma) is used (2c).[5] This suggests that the position of the subject in

frozen in time and therefore resist any diachronic change. So, the VSO order displayed by (i) is arguably a remnant of an older system which shows that Tarifit was indeed a VSO language.

(i) *i-ʃʃaϑ* *u-nza*
3.M.SG-hit.IMPERF CS-rain
'It is raining' (lit. 'the rain is hitting').

4 As seen from the previous data in (1), Berber has what looks like subject-clitics, which license the lexical subject. However, these elements display a number of peculiarities which set them apart from object clitics. First, the position they occupy within the clause is fixed. They may be prefixes to the verb, suffixes, or both, depending on person. Secondly, their presence is required and no verbal clause is possible without them, unlike object clitics. These two main properties clearly suggest that they are agreement markers rather than pronominal clitics, which function as arguments.

5 A possible reason could be due to the size of the predicate involving the verb and the object clitic, which would suggest that the subject may not be left-dislocated. However, making the predicate larger does not improve the awkward nature of this sentence as can be seen from (i) (see next page).

(2b) is different from the position of the subject in SVO, as seen in (1b). Similarly, the object in the initial position of the clause is left-dislocated (2d). The same alternation is also possible when the subject is *pro*, as in (2e).

(2) a. *ð-zri-ɣ* *Nunja.* $V_{[+OBJ\text{-}CL]}S$
3F.SG-see.PERF-3M.SG.OBJ Nunja
'Nunja saw him.'

b. *Nunja, ð-zri-ɣ.* S, $V_{[+OBJ\text{-}CL]}$
Nunja 3F.SG-see.PERF-3M.SG.OBJ
'Nunja, she saw him.'

c. **Nunja ð-zri-ɣ.* $^{*}SV_{[+OBJ\text{-}CL]}$
Nunja 3F.SG-see.PERF-3M.SG.OBJ

d. *a-qzin, ð-zri-ɣ* *Nunja.* O, $V_{[+OBJ\text{-}CL]}S$
sg-dog 3F.SG-see.PERF-3M.SG.ACC Nunja
'The dog, Nunja saw him.'

e. *a-qzin, ð-zri-ɣ.* O, $V_{pro\ [+OBJ\text{-}CL]}$
SG-dog 3F.SG-see.PERF-3.M.SG.OBJ
'The dog, she saw him.'

Unlike root clauses seen in (1), wh- and embedded clauses display a rigid order consisting of a very constrained V-first as in (3)–(6). The SV sequence is ruled out as can be seen from the (b) sentences. It is worth noting that the SV order with a language like English—an SVO language—is required, as can be observed from the corresponding English sentences in the data.

(3) a. *mərmi* [*ʁa* *i-uɣu* *u-nβʒi?*] VS
when FUT 3M.sg-go.PERF-.PL CS-guest
'When will the guests leave?'

b. *mərmi* *[*anβʒi* *ʁa* *uɣur-n?*] *SV
when guest FUT go.PERF-3M.PL

(i) **Nunja ð-zri-ɣ* *g-* *iɣar.*
Nunja 3F.SG-see.PERF-3M.SG.OBJ in field
'Nunja she saw him in the field.'

(4) a. *min* [*ð-ʃʃa* *Nunja?*] VS
what 3F.SG-eat.PERF Nunja$_{CS}$
'What did Nunja eat?'

b. *min* *[*Nunja* *ð-ʃʃa?*] *SV
what Nunja 3F.SG-ate.PERF

(5) a. *mimi* [*i-awr* *u-frux-nni?*] VS
why 3M.SG-escape.PERF CS-boy-3M.SG.DEM
'Why did that boy run away?'

b. *mimi* *[*a-frux-nni* *i-awr?*] *SV
when SG-boy-3M.SG.DEM 3M.SG-ran away

(6) a. *uʤi* *n-* *i-zra* *u-mçsa.* VS
sheep COMP 3M.SG-see.PERF CS-shepherd
'The sheep that the shepherd saw.'

b. **uʤi* *n-* *a-mçsa* *i-zra.* *VS
sheep COMP SG-shepherd 3M.SG-saw.PERF

In view of this survey, a number of points can be made relative to the Tarifit data. With respect to root clauses, as discussed in (1), SVO is the preferred order when the arguments are lexical. When the object is a clitic (2), the pronoun and the verb are required to be in the initial position of the clause. As for the wh- and embedded clauses, discussed above in (3)–(6), two possible questions arise from this data. First, could the V-first phenomenon be evidence that Tarifit is still a verb-initial language? Secondly, why is it that subject-initial is allowed with declarative root clauses, but this option is not available to wh- and embedded clauses? The syntactic implications of root clauses and wh- clauses are examined in sections three and four, respectively.

3 Root Clauses

Similar data discussed earlier regarding root clauses are provided in (7)–(12). It has been established that SVO is the dominant and widely preferred order (7) while VSO is avoided but possible (8). The picture is further complicated by constructions that make use of the object as a clitic. Cases like these require the verb and the clitic to be in the initial position of the clause (9), and therefore

counter-intuitive to the alternation that places the subject 'first' in the clause. The subject is not permitted in the initial position of the clause when the object is a clitic (10). This alternation is possible only when the subject is interpreted as a left-dislocated DP, expressed here by a comma (12). In view of these facts, this typology calls for a fundamental reconsideration of the usual claim which considers Tarifit to be a strictly VSO language.

(7) *Nunja ð-arza a-qnuf.*
Nunja 3F.SG-break.PERF SG-pot
'Nunja broke the pot.'

(8) *?ð-arza Nunja a-qnuf.*
3F.SG-break.PERF Nunja SG-pot
'Nunja broke the pot.'

(9) *ð-arzi-ɣ Nunja.*
3F.SG-break.PERF-3M.SG.OBJ Nunja
'Nunja broke it.'

(10) **Nunja ð-arzi-ɣ.*
Nunja 3F.SG-see.PERF-3M.SG.OBJ

(11) *Nunja, ð-arzi-ɣ.*
Nunja 3F.SG-broke.PERF-3M.SG.OBJ
'Nunja, she broke it.'

(12) *a-qnuf, ð-arzi-ɣ Nunja.*
SG-dog 3F.SG-see.PERF-3M.SG.ACC Nunja
'The pot, Nunja broke it.'

A first hand examination of the data in (7)–(12) suggests that there are two elements, which alternate on the initial position of the clause. There is the subject, on the one hand, and the verb and the object clitic, on the other. When all arguments are lexical, the subject occupies the initial position of the clause whereas the verb and its object remain in situ (7). When the object is a clitic, the verb and the clitic take over this position while the subject remains lower in the clause (8). This typology points to a possible complementary distribution between the subject and the VP. If this is true, it will amount to the claim that the subject and the VP $_{[\text{V.OBJ-CL}]}$ share the same position in the syntax, which may explain this complementary relationship. This argument indeed lies at the heart of my analysis and is defended in the remainder of the paper.

To put this into a much clearer perspective, I argue that the position to which the subject or the VP moves is where the topic feature is valued. This is due to the fact that Tarifit has developed a discourse configuration system, which requires the initial position of the clause to be filled with the topic and that this feature can be borne either by the subject or by the VP. When all arguments are lexical, it is the subject which is the topic and therefore moves to the initial position of the clause. When the object is a clitic, the topic property is assigned to that clitic. Due to its prosodic deficiency, the clitic cannot move alone to the initial position of the clause and pied-pipes the verb with it, yielding VP-Topicalisation, while the subject remains in situ. Note that the association of the object clitic with the topic is not a peculiarity of Berber, but these pronominal elements are cross-linguistically known to be associated with this feature (Kiss 1995). The proposed claim also makes the prediction that topic can be expressed only once. That is, syntax provides only one position for the topic feature, which can either be filled with the subject, or by the object clitic and the verb. This hypothesis therefore predicts the alternation between SVO and VP-Topicalisation. However, the proposal appears to be inconsistent with the broad view whereby 'topic/old information' may be expressed more than once in the same clause, unlike 'focus/new information' which may be expressed only once. It must be noted though that this view appears to be more like a general tendency than an absolute universal property of language. There are works in the literature which argue that this is subject to parametric variation, in the sense that some languages allow only one topic while others may allow more (Kiss 1995). Gill and Tsoulas (2004) provide empirical evidence that in Korean "… There may only be one topic per sentence" (Gill & Tsoulas 2004: 129). If the claim that the number of topics allowed per clause is subject to parametric variation is right, one could then argue that Tarifit falls within the category of languages that allow only one topic, like Korean. In view of this fact, the alternation between the subject and the object clitic is then predicted. So, when the arguments are lexical, it is the subject which is associated with the topic yielding SVO. When the object is a clitic, it is the latter pronoun which is associated with the topic and pied-pipes the verb with it, yielding $VP_{[v\text{-}Obj.Cl]}S$ structure.

Before examining the derivation of the two alternations, a note regarding the exact position of the topic is in order. Generally speaking discourse-driven information, including topic-fronting, is captured under some discourse functional projections above TP following Rizzi's (1997) left-periphery. Rizzi proposes a split CP domain which contains Topic Phrase, Focal Phrase, and other additional function projections making reference to very specific discourse information. While the view that discourse information takes place in the CP

domain is probably the most common, there is also an alternative view in the Germanic tradition which argues that topicalisation is positioned in Spec-TP (Den Besten & Webelhuth 1987, Den Besten 1990, Zwart 2006 among others). Topicalisation in Arabic is also argued by Fassi Fehri (1993) to occur in Spec-TP. It is this hypothesis that I wish to adapt for Tarifit. This ultimately leads me to argue that the subject and the VP compete for the topic position in Spec-TP, which justifies their complementarity.

There is evidence in support of the view that topic in Tarifit is in Spec-TP. Consider the embedded clause below in (13). This clause, which is selected by the complementiser *qa*, displays an SVO order. Assuming that *qa* occupies the C position, as I will demonstrate later in the paper, the subject can then be argued to be in Spec-TP, and therefore identical to the SVO in root clauses. So, allowing SVO to occur in these kinds of clauses suggests that the subject does not move to Spec-CP, presumably because it does not precede the complementiser. Fassi Fehri (1993) uses the same evidence to argue that the topicalised subject (SVO) in Modern Standard Arabic is in Spec-TP.

(13) *ð-nna-(a)y* *qa* *a-mʃiʃ* *i-ʃʃa* *a-çsum.*
3F.SG-tell.PERF-1SG.DAT Comp SG-cat 3M.SG-eat.PERF SG-meat
'She told me that the cat ate meat.'

Following this line of reasoning, the derivation of a basic transitive clause in SVO is schematised, as in (14b). The subject is base-generated in Spec-vP, the verb in V and the lexical object in DP. Since all arguments are lexical, together with the fact that only one topic per a clause is allowed in Tarifit, the subject undergoes topicalisation to Spec-TP yielding an SVO order.

(14) a. *Nunja ð-arza* *a-qnuʃ.*
Nunja 3F.SG-break.PERF SG-dog
'Nunja broke the pot.'

b. [$_{TP}$ Nunja$_i$ T] [$_{vP}$ ~~Nunja~~$_{ti}$ v] [$_{VP}$ V ðarza] [$_{DP}$ aqnuʃ]]]].

As for the alternation, which makes use of VP-Topicalisation, its derivation is schematised as in (15b). The underlying representation of this configuration is identical to (14); the subject is in Spec-vP, the verb in V and the object in DP. Since the internal argument in (15) is now a clitic and therefore associated with topic, it is the pronominal clitic which is topicalised in Spec-TP. Due to its prosodic deficiency, the clitic cannot move alone to the initial position of the clause so it pied-pipes the verb with it yielding VP-Topicalisation (15b). Within

the proposed analysis, T can probe the Goal V without the need for the latter to move higher to its C-commanding head (Chomsky 2001; 2004).

(15) a. *ð-zri-ϑ* *Nunja.*
3F.SG-see.PERF-3M.SG.OBJ Nunja
'Nunja saw him.'

b. [$_{TP}$ VP*ti* ðzri T] [$_{vP}$ Nunja v] [~~$_{VP}$*ti* V ðzri~~] [~~$_{DP}$ ϑ~~]]]].

Note that this kind of VP-fronting is not exclusive to Berber, but is cross-linguistically common. The derivation of the English sentence in (16) is widely known to be the result of VP-Topicalisation. Like Tarifit, the topicalised VP in this sentence includes the main verb and the object but excludes the subject, which is arguably in Spec-vP.

(16) They said they would win the competition, and [$_{VP}$*i* win the competition [$_{VP}$ they did ~~win the competition~~$_{ti}$]].

The proposed movement accounts for the order of elements in a basic clause. However, another important issue relevant to the word order has to do with 'second position' clitics. The standard behaviour of clitics in Berber, and object clitics in particular, is that they encliticise to the main verb, as seen earlier. A similar sentence is repeated, as in (17). When a functional category such as negation is used, as in (18), the clitic moves higher and adjoins to that category and does not remain with the verb (Ouhalla 1988; 2005a, Ennaji and Sadiqi 2002, El Hankari 2010, Ouali 2011 among others). The question then is how the proposed analysis deals with the placement of clitics in a configuration involving a functional host like (18).

(17) *ð-sʁi-**ϑn*** *Nunja.*
3F.SG-buy.PERF-**3M.PL.OBJ** Nunja
'Nunja bought them.'

(18) *u-**ϑn*** *ð-sʁi* *ʃi* *Nunja.*
NEG$_1$-**3.M.PL.OBJ** 3F.SG-drink NEG$_2$ Nunja
'Nunja didn't buy them.'

Following some previous works, which argue that functional hosts project above TP (Ouhalla 2005a, El Hankari 2010), the configuration in which the object clitic is hosted by negation in (18) is represented as in (19). After VP-

Topicalisation in Spec-TP, the clitic can right-adjoin to the functional category at PF under adjacency. This straightforward account of 'second position' clitics is afforded by the VP-Topicalisation argued for in this paper. Evidence in support of the clitic movement to a functional category as a PF operation comes from cases where two functional hosts are present in the clause, as in (20). In that case, the clitic moves to the functional host that is adjacent to it but cannot move to the highest category (i.e. negation) due to an adjacency constraint. So, one can now appreciate the advantage of the proposed analysis, which argues for VP-Topicalisation in Spec-TP. This movement operation makes the clitic adjacent to the higher functional category, to which it can adjoin at PF.

(19) $[_{\text{NEG}}$ u-**ɵn** $[_{\text{TP}}$ VP_i ð-sʁi**ɵn**$]$ ʃi$[_{\text{VP}}$ Nunja $[_{\text{VP}}$ ~~ð-siʁ ɵn~~ $_{ti}]]]$.

adjacency

(20) *u- að-**ɔn*** *ð-zri* *ʃi*
NEG$_1$-FUT-3.M.PL.OBJ 3F.SG-see NEG$_2$
'She didn't see them.'

Aside from the topicalisation of the subject and the VP, it is shown that an additional combination which makes use of SV + object clitic is also possible. Given that the presence of the object as a clitic always implies VP-topicalisation, the subject in such a case should not be expected to occupy the Spec-TP. The position of the subject in cases like (21), as pointed out earlier, has no effect on VP-fronting in that it is simply an instance of left-dislocation. This is reflected in phonology by a clear intonation break, which separates the subject from the rest of the VP. This derivation involves the topicalisation of the VP and the left-dislocated subject above TP, which I label here as XP (21b). The latter projection may be interpreted as broadly corresponding to Rizzi's (1997) left-periphery. I am not necessarily committing to a specific position for the left-dislocated DP, in that this has no implication on the VP-Topicalisation proposed, which is the main concern of the paper. So, whether the object is lexical or a clitic is extremely important. When all arguments are lexical, SVO is the result of the topicalisation of the subject in Spec-TP while the verb and its lexical object are in their base-generated position in V and DP, respectively. When the object is a clitic, the order is the result of a left-dislocated subject while the verb and the object clitic are topicalised in Spec-TP (21).

(21) a. *Nunja, ð-zri-ɔ.*
Nunja 3F.SG-see.PERF-3M.SG.OBJ
'Nunja, she saw him.'

b. $[_{XP}$ Nunja$_j$ X$]$ $[_{TP}$ VPt_i ðzri-θ T$]$ $[_{vP}$ ~~Nunja~~$_{tj}$ v$]$ $[_{~~VP~~t_i}$ ~~v ðzri$]$ $[_{~~DP~~}$ ~~θ~~$]]]]]$.

As for the OVS order, which is also possible, though marginal (22),[6] the object in this case is left-dislocated similar to the subject in (21). Note that the left-dislocated DP in (22) may be argued to be merged there if the object position is assumed to be occupied by the clitic. In view of all the possible configurations examined, cases of VP-Topicalisation are found in the following: $V_{[OBJ.CL]}$ S, $SV_{[OBJ\text{-}CL]}$, and O, $SV_{[+OBJ\text{-}CL]}$. The only case where VP-Topicalisation does not apply is when all arguments are lexical, since the topic position in such a case is occupied by the subject.

(22) a. *uʃʃn, ð-zri-θ* *Nunja.*
wolf 3F.SG-see.PERF-3M.SG.ACC Nunja
'The wolf, Nunja saw him.'

b. $[_{XP}$ uʃʃn X$]$ $[_{TP}$ VPt_i ðzri-θ T$]$ $[_{vP}$ Nunja v$]$ $[_{~~VP~~t_i}$ ~~v ðzri$]$ $[_{~~DP~~}$ ~~θ~~$]]]]]$.

Note that the literature in the Berber linguistic tradition, which argues for a basic VSO order, generally assumes the V-raising approach in its various forms (Guerssel 1995, Sadiqi 1986, Ouhalla 1988, and Ouali 2011, among others). The proposed analysis departs radically from these works, in that it argues that Tarifit has now shifted to a Topic-prominent language. In view of this newly emerged typology, I argued for a VP-Topicalisation to Spec-TP as an alternative to V-to-T movement due to this grammatical shift. However, and because this order is still possible, I maintain the V-to-T approach as the operation generating the less frequent VSO sentences. These systems do not coexist, but rather compete with one another, with the Topic-prominent system as the dominant configuration. The awkward nature of VSO is due to the discourse constraint that Tarifit has now developed, which requires the topic feature to be valued in Spec-TP.

Aside from VP-Topicalisation, and following the claim that the subject in SVO is the topic, one might argue that the present analysis offers nothing new in this respect, since the subject with this alternation has always been argued to be the topic in all Berber varieties. However, a distinction must be made between an optional promotion of the subject to Spec-TP as the topic only when needed

6 The marginal use of OVS, which is generally true for other Berber varieties, always requires the presence of the object clitic (Cadi 1990, Guerssel 1995, Sadiqi 1986, Ouhalla 1988, Ouali 2011).

and an obligatory movement of this element to the same position, as I argue here. This is the difference between subject-prominent and topic-prominent languages, or more broadly discourse configurational languages in general (Li & Thompson 1974, Li 1976, Kiss 1995). That is, the topic feature must be valued since these languages require a topic-initial structure for their basic clause. On the other hand, it can be argued that the Spec-TP in an SVO language like English is now grammaticalised and the movement of the subject to Spec-TP is the only way for it to receive Case and also value the EPP feature. Conversely, the subject in a topic prominent language like Tarifit could be argued to receive Case in situ and that object-clitics can also bear the relevant EPP feature, as well as the subject. So, the ability of the subject to receive Case in situ and not in Spec-TP makes the prediction that the Spec-TP is reserved for the topic and not for the grammatical subject.

An additional argument, which supports the claim that Tarifit has indeed developed a topic configurational system, comes from passivization. One of the main properties often associated with topic-prominent languages is that they generally lack the passive (Li & Thompson 1974, Li 1976). If the subject in the passive is the topic, the fact that verbs in a topic-prominent language cannot be passivized would be expected. The topic does not need to be expressed through the passive since this property has now become the default basic word order. In his investigation of valency in Tarifit, El Hankari (2010) demonstrates that the majority of verbs cannot be passivized. This includes verbs that are typically transitive-agentive such as 'break,' 'buy,' 'eat,' 'kill,' and 'sell.' When passivized, these verbs instead combine with some intransitive morphemes (inchoative or reflexive/middle passive), which typically denote a kind of causative that is internal to the verb and therefore bears no relevance to an actual transitive sentence in the active voice. If the subject in the passive is the topic, as I argue here, the fact that the verbs cannot be passivized is predicted since topicalisation has now become an inherent property of the basic clause in Tarifit.[7]

7 El Hankari (2010) shows that Tarifit still has the passive *twa-*, also found in other varieties, but this morpheme is only used with a small number of verbs (example: *aça* 'steal', *çsi* 'take'). The marginal use of the passive appears to lend further support to the claim made here, that Tarifit has developed a topic configurational system with marginal residual VSO.

4 Wh-/Operator Clauses and Embedded Clauses

In section one, it was shown that embedded and wh- clauses behave differently. Unlike root clauses, the former require a 'verb-first' structure. For instance, (23) represents a wh-/operator movement of the object which requires the verb to immediately follow the wh-. The possibility of the verb following the subject is not permitted (23b). In view of this fact, the two questions asked in section one can now be revisited. Could the verb-first phenomenon be evidence that Tarifit is still a verb-initial language? This question raises another problem: if verb-first in (23) is evidence of a V-initial configuration like the one found in the VS(O) of root clauses, why is it that subject-initial is allowed (and preferred) in declarative root clauses but this option is not available to wh- and embedded clauses? In what follows, I demonstrate that the position of the verb in (23a) is different from the one occupied by the marginal VSO in basic root clauses. More specifically, V-initial in (23a) is an instance of V-to-C movement.

(23) a. *min* [*ð-ʃʃa* *Nunja?*] VS
what 3F.SG-eat.PERF Nunja
'What did Nunja eat?'

b. *min* *[*Nunja* *ð-ʃʃa?*] *SV
what Nunja 3F.SG-ate.PERF

Evidence in support of the claim that clauses which display a verb-first structure are the result of V-to-C movement comes from the distribution of adverbs. While the distribution of adverbs in root clauses is fairly flexible,[8] this flexibility does not necessarily extend to the clauses which require verb-first. The

8 The flexible distribution of adverbs in the clause can be seen from the following data in (i). The adverb can be used in clause-final (ia), immediately following the verb (ib), between the subject and the verb (ic), or preceding the subject in SVO (id).

(i) a. *iwðan* *ʁzi-n* *a-ɣndu* ***ðʁja.***
people dig.PERF.3M.PL SG-hole quickly
'The people dug a hole quickly.'

b. *iwðan* *ʁzi-n* ***ðʁja*** *a-ɣndu.*
people dug.PERF.3M.PL quickly SG-hole

c. *iwðan* ***ðʁja*** *ʁzi-n* *a-ɣndu.*
people quickly dug.PERF.3M.PL SG-hole

sentence below in (24a) is ruled out due to the presence of the adverb, which is in a position of interference between the verb and the complementiser. For the sentence to be grammatical, the adverb must be used in a position following the verb, as in (24b). The ban of the adverb from occurring in that position in (24a) suggests the following. First, it shows that no element can intervene between the complementiser *n-* and the verb, which is evidence that the verb undergoes movement to C (i.e. right-adjoins to the complementiser). Secondly, the ban also suggests that the verb is not in T. If this was the case, one would expect the alternation in (24a) to be allowed and the adverb would then be somewhere in TP. Note that the alternation where the adverb precedes the verb in root clauses is allowed (25). In view of these facts, it can then be argued that the position of the verb in clauses like (23) is an instance of V-to-C movement and its derivation is schematised as in (26). Following the clefting of the subject to Spec-CP, which correlates with the introduction of the complementiser *n-* in C, the verb right-adjoins to the complementiser yielding the surface order: S>Comp-V>O. The same operation also applies to other cases that do not have an overt complementiser.

(24) a. **iwðan n- **ðʁja** ʁzi-n a-ɣndu.*
people COMP quickly dig.PERF.3M.PL SG-hole
'The people who dug the hole quickly.'

b. *iwðan n-ʁzi-n **ðʁja** a-ɣndu.*
people COMP-dig.PRT.3M.PL quickly SG-hole
'The people who dug the hole quickly.'

(25) ***ðʁja** ʁzi-n a-ɣndu.*
quickly dig.PERF.3M.PL SG-hole
'They dug the hole quickly.'

(26) $[_{CP}$ *iwðan*$_i$ $[_C$ *n- i- ʁzi-n*$_j$ $[_{TP}$ *T* $[_{VP}$ ~~*iwðan*~~$_{ti}$ $[_V$ ~~*ʁzi-n*~~$_{tj}$ $[_{DP}$ *a-ɣndu*]]]]]].
people COMP-3M.SG-dig.PRT SG-hole
'The people who dug the hole.'

In the previous section, it was argued that the initial position in the root clause is required to be filled with the topic and is therefore expected to have a

d. ***ðʁja** iwðan ʁzi-n a-ɣndu.*
quickly people dug.PERF.3M.PL SG-hole

discourse-configurational system of 'Topic-Comment' (i.e. old information followed by new information). This appears to be the default system available to the root clause. However, this pattern is not maintained in clauses which display a verb-first structure. Following the movement of an operator to Spec-CP (part of comment information), this operation forces a new discourse ordering and ultimately activates a new position for the focus feature in C. This focus checking operation can then be licensed under Spec-Head. It appears that the only candidate that can value the focus feature is the verb, which explains the verb-first sequence. In the next section, I show that there is more into the V-to-C movement than what we have discussed so far. There is at least one complementiser that can value the focus feature in C without the need for the movement of the verb. It is important that when structural focus is realised higher in CP, the subject cannot be the topic anymore, and therefore remains in Spec-vP. This is due to the fact that the discourse configurational system, which is Comment-first, requires the subject and not the topic, as is generally found with comment-prominent languages. Evidence in support of the DP immediately following the verb as the grammatical subject and not the topic in verb-first clauses may be noticed from the subject, which is always marked for the Construct State (CS).[9] Note that the subject receives this particular marking only when it is post-verbal (in Spec-vP/VP depending on the transitivity of the clause). This is evidence that when focus is realised higher in CP, the following DP is the grammatical subject and not the topic. So, it can now be granted that the language has the following alternating configurational systems: Topic-Comment is required by the main clause and Comment-Subject is required by the wh- operator or embedded clauses. It is these two discourse systems which are responsible for generating the ordering of elements in the Tarifit clause, yielding two different orders.

One last point has to do with topicalisation versus V-to-C movement. It appears that we are dealing with two different operations. Topicalisation has the properties of an A-movement in that it is restricted to Spec-TP. This could be due to the fact that Tarifit has developed this strategy as a way of checking the EPP feature. Conversely, V-to-C arguably involves A'-movement. Indeed, Ouhalla (1993) uses this distinction to capture what is referred to as Anti-Agreement Effect (AAE) (Ouhalla 1993, 2005b). He argues that wh- clauses and the clefting of the subject trigger AAE, in that they move to the left periphery but topicalisation does not in that the movement is to Spec-TP.

9 The subject in the relevant data in (3)–(6) is marked for the Construct State throughout, which is evidence that it is in Spec-vP and not topicalised in Spec-TP.

5 Discourse Features and the PF Interface

This section is concerned with some Tarifit facts relevant to the recent debate regarding the question as to whether discourse features are syntactic or phonological. For instance, Holmberg (1999) observes that the movement of the object higher in the clause in Swedish is dependent on the position of the verb. When the verb undergoes movement to C, the object can also move. When the verb remains in situ, its phonological presence blocks the object from moving higher.[10] Given that the object shift involved in this movement marks focus, and given that the movement appears to be sensitive to the presence of overt elements, and not their traces, Holmberg suggests that discourse features such as focus may be subject to cross-linguistic variation. So, a language like Swedish may have these features as phonological while others like Hungarian may have them as formal/syntactic (Kiss 1995).

Let us now see how this hypothesis fares when Tarifit facts are examined, starting with the topicalisation in root clauses. In a basic transitive clause, it is shown that topicalisation may be valued by the subject or by the VP. In the latter case, however, the topic feature is inherently associated with the object clitic since VP-Topicalisation is triggered only when the object is a clitic. This may raise the question as to why the object clitic cannot simply move alone without the verb, since it is the one that encodes the relevant feature. As far as syntax is concerned, nothing should prevent the pronominal clitic from checking the topic feature without necessarily including the main verb. The only possible reason which may prevent the clitic from moving alone to the beginning of the sentence would be phonological. This observation is indeed consistent with Ouhalla's (2005a) phonological constraints, according to which clitics in Berber cannot move to the initial position of their own clause.[11] This explains the ungrammaticality of (27) when the clitic is topicalised without the verb. If the object clitic, which is associated with topic, cannot move alone for phonological reasons, as the facts appear to suggest, it can then be argued that

10 The following generalisation is proposed to deal with the issue of object shift in Swedish: "Object Shift cannot apply across a phonologically visible category asymmetrically c-commanding the object position except adjuncts" Holmberg (1999:15).

11 Following the syntactic movement of the clitic to a functional category, as Ouhalla (2005a) argues, the clitic finds itself in the beginning of the clause. Due to a PF constraint, which prevents the clitic from occurring in that position, he proposes a Prosodic Inversion (Halpern 1995) which moves the verb to the left of the clitic yielding the predicted order: V-CL-Subject.

what we referred to as VP-Topicalisation is in fact VP-pied-piping. Since weak pronouns are inherently incompatible with topic, the clitic must pied-pipe the verb with it so that the topic and the EPP feature can be properly valued in Spec-TP. The failure of the clitic to move alone amounts to the fact that weak/light phonological items are unable to value the topic feature. In this sense, topic can be argued to be phonologically motivated. Note that a similar phonological effect was also reported from Korean, another topic-prominent language. Gill & Tsoulas (2004) show that phonologically light adverbs cannot be topicalised in the initial position of the clause, similar to Tarifit.

(27) *-ϑ *Nunja ð-zra.*
3M.SG.OBJ Nunja 3F.SG-see.PERF

The argument that discourse features may be sensitive to phonological information in Tarifit appears to find further support from clauses, which require a verb-first structure, as discussed in the previous section. There, it was argued that this constrained order is the result of V-to-C movement motivated by focus. However, V-to-C movement regarding wh- and embedded clauses does not apply across the board. Consider the data below in (28), with particular focus on the embedded clause. Unlike other clauses examined, this clause behaves identical to the root clause. SVO is the preferred order (28a) and VSO is possible but less frequent (28b). This clearly indicates that clauses, which are selected by the subordinator *qa* 'that,' do not involve V-to-C movement. If they did, the flexibility between the two orders (SVO versus VSO) would not be expected. On the basis of this fact, it can be concluded that SVO in (28a) represents the topicalisation of the subject whereas the marginal residual VSO is the result of the standard V-to-T movement.

(28) a. *i-nna-sn* *qa* [*mina* *ð-arza*
3M.SG-say.PERF-3M.PL.OBJ COMP mina 3F.SG-break.PERF
a-qnuʃ]. SVO
SG-pot
'He told them that Mina broke the pot.'

b. *i-nna-sn* *qa* [*ð-arza* *mina*
3M.SG-say.PERF-3M.PL.OBJ COMP 3F.SG-break.PERF mina
a-qnuʃ]. VSO
SG-pot
'He told them that Mina broke the pot.'

To have a better understanding of cases where the movement of V-to-C applies and where it does not, the picture is clarified by the following data in (29)–(31). This movement is found in a wh- operator with no overt complementiser (29), in a cleft sentence with the complementiser *n-* (30) and in a relative clause with the complementiser *ig-* (31). By contrast, V-to-C movement does not apply to clauses that are selected by the complementiser *qa* (28). The next step is to identify the mechanism, which drives this movement. That is, why is it that V-to-C movement is not required by *qa*-sentences (28) but the same operation is required in sentences (29)–(31)? Since this behaviour is systematic, it appears that this has to do with the complementiser in C. That is, V-to-C movement applies when this position is not filled or filled with *n-* or *ig-*. On the other hand, the same movement operation applies when C is filled with *qa*. In what follows, I argue that this has to do with the phonological property of the complementiser. Since C is where focused expressions are placed, this will lead me to conclude that this feature is more likely to be phonological, similar to topic. The final outcome of the analysis is that it provides a unified account for this systematic behaviour.

	V	**S**
(29)	*min ð-çsi*	*nunja?*
	wh- 3F.SG-take.PERF	nunja
	'What did Nunja take?'	

		V	**S**
(30)	*a-ʁjur n-*	*i-sʁa*	*mohand.*
	SG-donkey COMP	3M.SG-buy.PERF	mohand
	'The donkey that Mohand bought.'		

		V	**S**	
(31)	*ð-a-mʁar-ϑ ig-*	*i-kwϑi-n*	*a-rgaz*	*ins.*
	F-SG-woman-F COMP	3M.SG-hit-PRT.	SG-man	her
	'The woman who hit her husband.'			

Broadly speaking, V-to-C movement—known as 'Verb Second' (V2)—is often argued to be dependent on whether C is filled or not filled with an overt complementiser. Schafer (1995) shows that Breton (Celtic)—a VSO language known to have adopted the V2 system—displays a clear alternation between tensed verbs and overt complementisers. When C is filled with an overt complementiser (***m'*** 'if'), as can be seen from the second clause in (32), the verb remains in situ. On the other hand, when C is not filled, as in (33), the particle ***am*** together with the

auxiliary ***bije*** 'have' undergoes movement to C. McCloskey (1991) makes a similar argument by showing that the main verb in Irish raises to C only when that position is not filled by an overt complementiser. Note also the movement of the tensed/auxiliary verb in English in interrogative clauses. But this operation is not available to embedded clauses when C is filled with the complementiser 'that.' If C encodes discourse features, and if this position is sensitive to the overt presence of elements, this behaviour then appears to lend support to Holmberg's argument with respect to Swedish whereby focus is phonological rather than syntactic.

(32) *Yann a chomje er ger, **m'** am bije goulet gantan*
Yann prt stay cond. at home if prt.have.cond.1sg asked with him
Yann would stay home if I had asked him

(33) *Hennez a-vije da labourat du-man **am bije***
that one PRT-BE.COND to work house-this PRT.have-COND.1SG
goulet gantan
asked with him
that one would work with our family, had I asked him
SCHAFER 1995:145

The observation that V-to-C movement applies only when C is not filled is not consistent with all the facts in Tarifit. This tendency is only found with the wh-operator in (29), since this is the only case where C is not filled.[12] For instance, we have seen that cleft sentences (30) and relative clauses (31) have their C position filled, yet the verb still moves to C. A close examination of the issue reveals that this has to do with the phonological form of the complementiser. The two complementisers (*n-* and *ig-*), which trigger V2, are light phonological items in the sense that they cannot receive stress independently. Note that *n-*, which correlates with cleft sentences, is not even syllabic. However, the presence of an independent phonological word like *qa* triggers no V-to-C movement. The complementiser *qa* being phonologically independent can be seen from (34), in that it can occur at the beginning of the sentence, but *n-* and *ig-* cannot.

12 The cases I am referring to here are the kind of clauses discussed in section four. This excludes root clauses, which do not involve structural focus in CP.

(34) ***qa*** *i-nna-sn* *mri-ðin* *ð-qim-m*
COMP 3M.SG-tell.PERF-3M.PL.DAT if-there 2M.PL-stay.PERF-2M.PL
ataf *i-tfi-ʃçum.*
FUT.IMPERF 3M.SG-catch.PERF-2M.PL.OBJ
'He told them: "if you stayed there he would catch you".'

Significantly, El Hankari (2010) demonstrate that complementisers which correlate with V-to-C movement such as *n-* and *ig-* are also clitic hosts (35)–(36) but *qa* is not (37). Since both operations display the same phonological effects, El Hankari concludes that cliticisation and V2 are more likely to be phonological than syntactic.[13]

(35) *iwðan* *n-ʕ* *i-sʁi-n.*
F-SG-woman-F COMP-**3M.SG.OBJ** 3M.SG-buy-PRT
'The people that saw him.'

(36) *ð-a-mʁar-ʕ* *ig-ʕ* *i-kwʕi-n.*
F-SG-woman-F COMP-**3M.SG.OBJ** 3M.SG-hit-PRT
'The woman who hit him.'

(37) *ð-nna-(a)y* *qa* *ð-zri-ʕ.*
3F.SG-tell.PERF-1SG.DAT COMP 3F.SG-see.PERF-**3M.SG.OBJ**
'She told me that she saw him.'

In view of the data presented, the main constraints which drive V-to-C movement in Tarifit can now be made explicit. This operation is not only dependent on whether C is filled with a complementiser, but is also dependent on the phonological property of the complementiser occupying C. When C is filled with a complementiser that is phonologically independent, such as *qa* 'that,' no movement of V-to-C takes place. On the other hand, when C is not filled or filled with a complementiser that is phonologically dependent such as *n-* or *ig-*, the verb must move to C, which explains the VS requirement. If C is inhibited by the feature focus, and if this position is phonologically sensitive, as the data appear to suggest, it can then be argued that focus in Tarifit is phonological. Under the proposed analysis focus, like topic, needs to be valued by

13 The correlation between cliticisation and the V2 effect is not exclusive to Tarifit but is well-documented in the literature (Travis 1984, 1991, Anderson 1993, Zwart 2006, Boeckx 1998, Franks 1998, Progovac 1998, and Bošković 2002).

a proper/independent phonological item. If this feature was formal/syntactic, the inconsistency between complementisers triggering V2 and the ones that do not should not be expected. So, it turns out that Tarifit displays similar but not identical phonological effects to the languages discussed, like Breton, with respect to the V2 phenomenon. Tarifit has an additional rule, which makes reference to the phonological property of the complementiser.

6 Conclusion

In this paper, I argue that Tarifit has shifted from VSO to a Topic-prominent language. This operation is realised by moving the subject to Spec-TP when all arguments are lexical or by VP-Topicalisation when the object is a clitic. The complementary distribution between these two movement operations was attributed to the fact that Tarifit allows only one topic per a clause.

Another order, which necessarily requires verb-first was found to be a peculiarity of the wh- operator and some embedded clauses. This was argued to be the result of V-to-C movement. As for its motivation, it was suggested that this operation is associated with focus. Following the movement of wh-/DP operator to Spec-CP, this operation activates a new position for the focus feature in C to which the verb moves, allowing it to be licensed under Spec-Head.

The last section looked at the two discourse features, which appear to drive the clause structure of Tarifit. In view of some empirical evidence, it was concluded that these two features are more likely to be phonological than syntactic. With respect to the topic, it was shown that the object clitic is the element associated with this feature, but the clitic still pied-pipes the verb, due to its phonological deficiency. Similarly, focus can only be valued by an independent phonological word. When a complementiser is phonologically dependent, the main verb must move to C as a last resort for the feature to be valued. This operation is not needed when the complementiser is a phonologically independent vocabulary item.

References

Anderson, S. (1993). Wackernagel's Revenge: Clitics, Morphology and the Syntax of Second Position. *Language* (69), 68–98.

Boeckx, C. (1998). A Minimalist View of the Passive. MITWPL, MIT, Cambridge.

Bošković, Z. (2001). *On the Nature of the Syntax-Phonology Interface: Cliticization and Related Phenomena*. Elsevier Science, Amsterdam.

Cadi, K. (1987). *Système Verbal Rifain: Forme et Sens Linguistique*. Paris: SELAF.

Cadi, K. (1997). Constance et Variabilité Syntaxiques Interdialectales en Berbère. *International Journal of the Sociology of Language*, 123 (1997) 147–162. Walter de Gruyter.

Chomsky, N. (2001). Derivation by Phase. In Michael Kenstowitcz (ed), *Ken Hale: A Life in Language*, 1–52. Cambridge. MIT Press.

Chomsky, N. (2004). Beyond Explanatory Adequacy. In Adriana Belletti (ed), *The Cartography of Syntactic Structures. Volume 3, Structure and Beyond*. Oxford: Oxford University of Press.

Greenberg, J. (1966). Some Universals of Grammar with Particular Reference to the order of Meaningful Elements. In Joseph Greenberg (ed.) *Universals of Language*. 2nd edition, MIT Press. 73–113.

Den Besten, H. and Webelhuth, G. (1987). Adjunction and Remnant Topicalization in the Germanic SOV-Languages. Paper presented at GLOW, Venice.

Den Besten, H. (1990). Studies in West Germanic Syntax, Katholieke University, Brabant.

Ennaji, M. and Sadiqi, F. (2002). Subject, Accusative and Dative Clitics in Berber. *Languages and Linguistics*, 10, 97–116.

El Hankari, A. (2010). *The Morphosyntax of Tharifith Berber*. A PhD Dissertation. The University of Queensland. Brisbane, Australia.

Fassi Fehri, A. (1993). *Issues in the Structure of Arabic Clauses and Words*. Kluwer Academic Publishers, The Netherlands.

Franks, S. (1998). Optimizing Linear Order and South Slavic Clitics. Paper presented at the University of Groningen.

Galand, L. (1979). Relations du verbe et du nom dans l'énoncé Berbère. In *Relations Predicat-Actant(s) dans les langues de type divers. I*, C. Paris (ed), 131–146, Paris: SELAF.

Guerssel, M. (1995). Berber Clitic Doubling and Syntactic Extraction. Revue Quebecoise de Linguistique, 24 (1).

Halpern, A. (1995). On the Placement and Morphology of Clitics. CSLI Publications, Stanford.

Holmberg, A. (1999). Remarks on Holmberg's Generalization [Apr]. *Studia Linguistica* 53:1–39.

Greenberg, J. (ed.). (1963). *Universals of Language*. London: MIT Press, pp. 73–113.

Gill, K. and Tsoulas, G. (2004). Peripheral Effects without Peripheral Syntax: The Left Periphery in Korean. In David Adger, Cecile De Cat and George Tsoulas (eds). Kluwer Academic Publishers.

É. Kiss, K. (Ed.). 1995. Discourse-Configurationality in the Languages of Europe. In *Constituent Order in the Languages of Europe*, Anna Siewierska, [Ed], Berlin, Mouton de Gruyter (1997), 681–727.

Li, Ch., and Thompson, S. (1974). An Explanation of Word Order Change SVO to SOV. *Foundations of Language* 12:201–214.

Li, Ch. (1976). Subject and Topic. In *Symposium on Subject and Topic* (*1975: University of California, Santa Barbara*), ed. [Papers edited by Li Charles]: New York Academic Press.

McCloskey, J. (1991). Clause Structure, Ellipsis and Proper Government in Irish [Nov]. *Lingua* 85:259–302.

Ouali, H. (2011). Agreement, Pronominal Clitics and Negation in Tamazight Berber. Continuum Studies in Theoretical Linguistics.

Ouhalla, J. (1988). The Syntax of Head Movement: A Study of Berber. PhD Dissertation. University College of London.

Ouhalla, J. (1993). Subject-Extraction, Negation and the Anti-Agreement Effect. *Natural Language and Linguistic Theory*, 11, 477–518. Dordrecht, Netherlands: Springer Netherlands.

Ouhalla, J. (2005a). Clitic-Placement, Grammaticalisation, and Reanalysis in Berber. In *The Handbook of Comparative Syntax*, ed. G. and Kayne Cinque, R. [eds]. 607–638. Oxford and New York.: Oxford University Press.

Ouhalla, J. (2005b). Agreement features, Agreement and Antiagreement. *Natural Language and Linguistic Theory*.

Progovac, L. (1998). Clitic-second and Verb-second. Paper presented at the Comparative Slavic Morphosyntax Workshop, Indiana University, Bloomington.

Rizzi, L. (1997). The Fine Structure of the Left Periphery. In *Elements of Grammar: Handbook in Generative Syntax*, Haegeman, Liliane [Ed], Dordrecht, Netherlands: Kluwer, 1997, 281–337.

Sadiqi, F. (1986). *Studies in Berber Syntax: the complex sentence*: Wurzburg: Konigshausen und Neumann.

Schafer, R. (1995). Negation and Verb Second in Breton [Feb]. *Natural Language & Linguistic Theory* 13:135–172.

Travis, L. (1984). *Parameters and Effects of Word Order Variation*. Doctoral dissertation, MIT, Cambridge.

Travis, L. (1991). Parameters of Phrase Structure and Verb Second Phenomena: in *Principles and Parameters in Comparative Grammar*. Robert Freiden (ed.). MIT Press.

Zwart, J., W. (2006). Local Agreement. In *Agreement Systems*, Cedric Boeckx [ed.], John Benjamins 317–339. Amsterdam.