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ARTICLE

Word Order and the Clause Structure in Jordanian Arabic: A Minimalist-Cartographic Approach

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ABSTRACT

Besides the basic SVO word permutation in Jordanian Arabic (JA), other marked word orders exist: VSO and VOS. This paper examines the derivation of these different word permutations in terms of the nature, distributional properties, and position(s) the subject surfaces in. Two theoretical frameworks are advocated for this end: Chomsky's minimalist framework and Rizzi's rich discourse layer of the left zone of clause. Although it was established that the discourse-free and/or unmarked word permutation in the language is SVO, the subject of SVO clauses is ambiguous between two interpretations: (i) a neutral subject located in Spec-TP or (ii) a topic externally merged in Spec-TopP. These two interpretations are subject to definiteness and/or specificity condition. This indicates that even if SVO is the unmarked word permutation in a given language, it is liable to interpretative variation. As for VSO and VOS, we argue that these marked word orders are derived from the marked topical version of SVO in the sense that the postverbal subject in VSO and VOS is a left-peripheral topic. The head verb in VSO is further moved to the head Foc, and the whole VP in VOS is moved to Spec-FocP for focus considerations. Our analysis adds credence to the proposal that information structure does manifest in syntactic derivation.

Keywords: Agree-Based; Derivation; Jordanian Arabic; Word Order

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1. Introduction

Jordanian Arabic (JA, henceforth) is a Semitic language spoken in Jordan by more than 8.5 million people and is mutually intelligible throughout the Levant and even in other Arabic-speaking countries. Different grammatical and syntactic aspects of JA have been approached from different perspectives [1–4]. This study investigates the structure of declarative sentences in JA. A declarative clause with a transitive verb in JA can manifest in three fully acceptable permutations: SVO, VSO, and VOS, as shown below.

(1)

a. itˤ-tˤalibeh	naðˤaf-at	iʃ-ʃubak	SVO
the-student.3SF	cleaned.3SF	the-window	

'The (female) student cleaned the window.'

b. naðˤaf-at	itˤ-tˤalibeh	iʃ-ʃubak	VSO
cleaned.3SF	the-student.3SF	the-window	

'The (female) student cleaned the window.'

c. naðˤaf-at	iʃ-ʃubak,	itˤ-tˤalibeh	VOS
cleaned.3SF	the-window	the-student.3SF	

'As for the (female) student, SHE CLEANED the window.'
'*As for the (female) student, she cleaned the window.'
'*The (female) student cleaned the window.'

The above examples assert the existence of word order variation in JA, whereby it is fully acceptable to have the subject surfacing in different positions within the clause. It can manifest preverbally, postverbally, or clause-finally. Notwithstanding this variation in word order, there is always full subject-verb agreement regardless of the position of the subject and/or verb within the clause [1, 2]. Notice that the subject in the above examples is third person singular feminine, and the verb shows third person, feminine gender, and singular number agreement. We assume that T has complete φ-features [Pers, Gen, and Num] in all word orders, hence licensing full agreement. (However, for a different view and for more on the internal structure of probes on T in JA, the reader is referred to Sahawneh [3].).

This paper aims at analyzing the derivation of these different permutations, with special focus on the nature, distributional properties, and position(s) the subject surfaces in. The relationship between these different permutations is also discussed. A minimalist-cartographic analysis of these orders is presented to account for their syntactic and interpretative values. The derivation of these different constituent orders is analyzed based on Chomsky's Agree-based scheme together with Rizzi's Split-CP theory [5–7]. However, before we embark upon a discussion of these issues, we will highlight the process of data collection and identify the basic, discourse-neutral word order in JA.

2. Methodology

In this section, we highlight the process of data collection and elicitation. Participants' demographics are also included.

The primary data source was 20 (12 females and 8 males) native speakers of JA whose ages ranged from 21 to 58 years. As for their educational levels, 14 participants hold B.A. degree, 4 are graduate students, and 2 participants have no formal education. Audio-recorded spontaneous conversations of these participants formed the corpus of the current study. This corpus served to identify the different word orders attested in the language alongside the prosodic patterns associated with each word order. All the participants signed a consent form for participating in the study.

The researchers employed both controlled elicitation and grammaticality judgments for the purpose of this study. Specifically, building mainly on the audio-recorded conversations of the participants, the researchers constructed 32 transitive sentences in the different permutations (SVO, VSO, and VOS), and then the 20 participants were asked to judge the grammaticality/acceptability of the constructed examples in both neutral and marked contexts. This method enabled

us to capture the grammatical and interpretive status of the different word orders in the language. All the examples used in this study were verified and judged as grammatical by the 20 native speakers.

3. The Basicness of SVO in JA

Despite the aforementioned variation in word order in JA, we argue that SVO is the unmarked or basic, discourse-free order in the language. Actually, SVO is documented as the basic word order in several other Arabic varieties like Palestinian Arabic [8–10], Moroccan Arabic [11, 12], Egyptian Arabic [12, 13], Tabuki Arabic [14], and Lebanese Arabic [15]. Nonetheless, to copiously address this issue and to evade jumping to conclusions, some of the heuristics adopted in the literature to identify the basic word order in other Arabic varieties, especially Standard Arabic (SA, henceforward) and, as we argue, can present contentions for the basicness and discourse-neutrality of SVO, as well as the markedness of other permutations in JA, are discussed below.

A particular word order is normally considered basic and discourse-neutral if it has the least semantic, syntactic, and contextual restraints on its use [16]. We argue that the discourse-free, neutral word order in JA is SVO. We also argue that interpretative effects usually arise as a result of any structural change in the SVO permutation. Several distributional, syntactic, semantic, and contextual observations point toward this conjecture.

First, SVO is the only permissible order in embedded contexts after the complementizer inno 'that', whereas VSO and VOS are not licit in such embedded contexts. The validity of SVO in such contexts (2a) and the illicitness of VSO and VOS (2b and 2c, respectively) assert the basicness of SVO order. (See the work of Fassi-Fehri for SA [11].).

(2)

a. Comp SVO

il-mʕalm-eh	gal-at	inno	itˤ-tˤalibat	kasar-in	iʃ-ʃubak
the-teacher.3SF	said.3SF	that	the-student.3PF	broke.3PF	the-window

'The (female) teacher said that the (female) students broke the window.'

b. Comp VSO

*il-mʕalm-eh	galat	inno	kasar-in	itˤ-tˤalibat	iʃ-ʃubak
the-teacher.3SF	said.3SF	that	broke.3PF	the-student.3PF	the-window

'The (female) teacher said that the (female) students broke the window.'

c. Comp VOS

*il-mʕalm-eh	galat	inno	kasar-in	iʃ-ʃubak	itˤ-tˤalibat
the-teacher.3SF	said.3SF	that	broke.3PF	the-window	the-student.3PF

'The (female) teacher said that the (female) students broke the window.'

Another heuristic for the neutrality and/or basicness of a particular structure is its full acceptability as a felicitous response to general state-of-affairs questions like 'What is new?' [17], 'What's the problem?', 'What's up?' [18], or 'What happened?' [19]. Indeed, SVO in JA is the only permissible word order in out-of-the-blue and discourse-neutral contexts such as initiating a brand new discourse or answering general questions (e.g., 'What happened?') [20]. Let us apply this test against the Jordanian data.

(3)

a. ʃu	sˤaar		
what	happened.3SM		

'What happened?'

b. itˤ-tˤalibeh	naðˤaf-at	iʃ-ʃubak	SVO
the-student.3SF	cleaned.3SF	the-window	

'The (female) student cleaned the window.'

c. #naðˤaf-at	itˤ-tˤalibeh	iʃ-ʃubak	VSO
cleaned.3SF	the-student.3SF	the-window	

'The (female) student cleaned the window.'

d. #naðˤaf-at	iʃ-ʃubak,	itˤ-tˤalibeh	VOS
cleaned.3SF	the-window	the-student.3SF	

'As for the (female) student, SHE CLEANED the window.'
'*As for the (female) student, she cleaned the window.'
'*The (female) student cleaned the window.'

The sentences (3c-d) cannot felicitously answer the question 'What happened?'. Sentence (3c), as will be explained soon, involves a left-peripheral focalized verb that conveys a meaning in which the stress is placed on the event/action of the sentence. The non-neutrality of sentence (3d) is due to the fact that it involves two left-peripheral elements: both the verb and the object are focalized as will be shown in subsequent sections. Only (3b) can be appropriate answer to the question in (3a). Accordingly, it can be safely inferred that the only neutral and discourse-free order in JA is the SVO where no stress is placed on the participants[21]. (However, in the coming sections, we argue that preverbal subjects in SVO can, in certain cases, have a topic interpretation and can thus sit in a left-peripheral position compatible with its discoursal associations.)

Another supporting evidence that the basic word permutation in JA is SVO comes from the fact that yes/no questions are normally derived from SVO sentences (but not from VSO or VOS clauses) by simply placing a rising pitch on the preverbal subject and without the employment of any question particle. (See the work by Cheng and Rooryck for the formation of yes/no questions in spoken French and Alatawi for Tabuki Arabic[14, 22].) Consider the following examples:

(4)

a. itˤ-tˤalibat	kasar-in	iʃ-ʃubak	imbariħ?	SVO
the-student.3PF	broke.3PF	the-window	yesterday	

'Did the (female) students break the window yesterday?'

b. *kasar-in	itˤ-tˤalibat	iʃ-ʃubak	imbariħ?	VSO
broke.3PF	the-student.3PF	the-window	yesterday	

'Did the (female) students break the window yesterday?'

c. *kasar-in	iʃ-ʃubak,	itˤ-tˤalibat	imbariħ?	VOS
broke.3PF	the-window	the-student.3PF	yesterday	

'Did the (female) students break the window yesterday?'

Uttering the SVO clause in (4a) with a rising intonation on the preverbal DP subject turns the sentence into a yes/no question. However, pronouncing the VSO or VOS clauses in (4b) and (4c), respectively, with rising intonation on the verb or on the postverbal DP subject does not yield a yes/no question in JA.

Further corroborating evidence of the neutrality and unmarkedness of SVO in JA is related to the nature of the subjects it permits as opposed to VSO and VOS. No restriction is imposed on SVO with respect to the definiteness or specificity of its subject; definite, specific indefinite, and non-specific indefinite DPs are all permissible preverbally. By contrast, the subject of VSO and VOS clauses should be either definite DP or specific indefinite DP; pure/non-specific indefinite DP subjects are inadmissible in these structures. The following paradigm illustrates this asymmetry:

(5) SVO

a. itˤ-tˤalibeh	naðˤaf-at	iʃ-ʃubak
the-student.3SF	cleaned.3SF	the-window

'The (female) student cleaned the window.'

b. tˤalibeh tˤaweel-ih naðˤaf-at iʃ-ʃubak
student.3SF tall.3SF cleaned.3SF the-window
'A tall (female) student cleaned the window.'

c. tˤalibeh naðˤaf-at iʃ-ʃubak
student.3SF cleaned.3SF the-window
'A (female) student cleaned the window.'

(6) VSO
a. naðˤaf-at itˤ-tˤalibeh iʃ-ʃubak
cleaned.3SF the-student.3SF the-window
'The (female) student cleaned the window.'

b. naðˤaf-at tˤalibeh tˤaweel-ih iʃ-ʃubak
cleaned.3SF student.3SF tall.3SF the-window
'A tall (female) student cleaned the window.'

c. *naðˤaf-at tˤalibeh iʃ-ʃubak
cleaned.3SF student.3SF the-window
'A (female) student cleaned the window.'

(7) VOS
a. naðˤaf-at iʃ-ʃubak, itˤ-tˤalibeh
cleaned.3SF the-window the-student.3SF
'As for the (female) student, SHE CLEANED the window.'
'*As for the (female) student, she cleaned the window.'
'*The (female) student cleaned the window.'

b. naðˤaf-at iʃ-ʃubak, tˤalibeh tˤaweel-ih
cleaned.3SF the-window student.3SF tall.3SF
'A tall (female) student, SHE CLEANED the window.'
'*A tall (female) student, she cleaned the window.'
'*A tall (female) student cleaned the window.'

c. *naðˤaf-at iʃ-ʃubak, tˤalibeh
cleaned.3SF the-window student.3SF

The above paradigm clearly shows that the Jordanian definite and indefinite DPs behave asymmetrically depending on the word order. While the definiteness of the preverbal subject in SVO does not jeopardize the grammaticality of the structure, only definite and specific indefinite DPs can occur postverbally in JA's VSO and VOS structures. The occurrence of non-specific indefinite subject DPs in a postverbal position yields ungrammaticality, as shown in (6c) and (7c).

The array of possible subject DPs in preverbal positions, as shown in (5), asserts the discourse-neutrality of preverbal subjects in JA. By contrast, the examples in (6) and (7) indicate that the postverbal subject should be referential. According to Reinhart, a key feature of topicality is 'referentiality' [23]. This remark points toward the fact that the postverbal subjects of VSO and VOS in JA are different from normal subjects; it seems that they carry some informational content. All this further supports the conjecture that VSO and VOS are not discourse-neutral and that SVO, with the debate allocated above in mind, is the discourse-neutral and/or unmarked permutation.

The foregoing gives rise to the following questions:

(i) What is the precise nature and position(s) of preverbal and postverbal subject DPs in JA?
(ii) What are the interpretative values of these different permutations?

To answer these questions, we need first to review the major tenets of the two major theoretical frameworks upon

which our proposed analysis of these different word orders is based: The Agree-based framework and the Split-CP theory [5–7]. This is the task we set for ourselves in the next section.

4. Theoretical Preliminaries for the Proposed Analysis

As a preliminary, we will highlight the major points of Chomsky's Agree-based model together with Rizzi's Split-CP system as they play crucial role in our proposed analysis for the derivation of different word orders in JA [5–7].

Chomsky advances the Agree-based scheme according to which a local agreement relation is held between a given probe and goal [5, 6]. The head T and the VP-internal subject are examples of a probe and goal respectively. The valuation and deletion of the uninterpretable features of both the probe and goal are achieved as a result of this agreement operation. After the Agree operation takes place, the subject moves to Spec-TP due to EPP considerations. The Agree-based theory will be further detailed and placed on concrete grounds in the course of the proposed analysis.

In addition to the Agree-based approach, the cartographic program will play a vital role in our proposal [7, 24]. That the derivation and interpretation of the structure are influenced by pragmatic aspects is a rudimentary assumption in the cartographic scheme. This line of research is concerned with how information structure elements, such as topics and foci, feed syntactic computations.

Expanding on the cartographic scheme, Rizzi decomposed the discourse layer of structure into different zones, a proposal became to be known as the Split-CP Hypothesis [7, 25]. In Rizzi's pivotal work, the CP is argued to encode, besides grammatical information, discourse-related information [7]. It is assumed that the CP layer is composed of a set of separate projections: Force Phrase is proposed as the uppermost projection whereas Finite Phrase is taken to be the lowermost one. Rizzi further argues that the clausal left periphery contains one focus projection sandwiched between two topic projections [7]. This above-the-TP zone became to be known as the "left periphery". The following is the hierarchy proposed by Rizzi for the structure of the left periphery:

(8) ForceP > TopP* > FocP > TopP* > FinP> IP [7].

While ForceP serves to sign the clause type, FinP defines the inflectional properties of TP. Moreover, in Rizzi's hierarchy, TopP is recursive, whereas FocP is not; there can be one focalized element in the structure [7]. The features borne by these functional heads are what initiate the movement of different elements from a clause-internal position to the left domain of the clause. While topicalized elements land in Spec-TopP, focalized elements and wh-elements are hosted in Spec-FocP.

Having given a general overview of the major tenets of the approaches to be adopted in this study, we now put forward our proposal. Recall that it has just been established that SVO is the basic permutation in JA, while VSO and VOS are marked ones. We argue that the derivation of JA's unmarked SVO proceeds in an English-like manner whereby the subject is raised from its first-merge position in the VP shell to Spec-TP for EPP considerations, and the verb is moved from V to T via head movement. However, it will be shown that the preverbal definite and specific indefinite subject in SVO can also have a less-noticed marked reading, namely, a topical reading. Under this marked version of the SVO, the clause-initial DP is not construed as genuine subject; rather, it is taken to be a left-peripheral topic base-generated in Spec-TopP while binding a clause-internal pro subject.

We argue that the derivation of the unmarked word order is more economical than that of marked word orders. The marked word orders further involve left-peripheral constituents that arrive at their surface positions via focus-movement and topicalization/left-dislocation. The derivation of both VSO and VOS in JA follows the derivation of the marked topical SVO permutation and further involves the application of an extra process. The topical SVO structure is derived by base-generating the preverbal DP, whether definite or specific indefinite, in Spec-TopP because it is a left-peripheral topic binding a null pro that moves from its first merge position in Spec-vP to Spec-TP for EPP considerations. The derivation of VSO follows the derivation of this marked topical SVO and further involves raising the verb from T to a higher left-peripheral position, namely, the head Foc. Likewise, the derivation of VOS follows the derivation of the marked topical SVO and further involves movement of the whole VP to the left domain. The details of this proposal are taken up in the subsequent sections.

5. The Derivation of SVO

The discussion hitherto has established with abundant evidence the basicness and discourse-neutrality of SVO. However, recall that the preverbal subject in JA is not subject to definiteness/specificity restrictions. It is possible for the preverbal DP to be definite, specific indefinite, or pure/non-specific indefinite. All these instantiations of preverbal subjects are epitomized by (5) above, repeated below as (9) for ease of exposition.

(9) SVO

a. itˤ-tˤalibeh naðˤaf-at iʃ-ʃubak
the-student.3SF cleaned.3SF the-window
'The (female) student cleaned the window.'
'As for the (female) student, she cleaned the window.'

b. tˤalibeh tˤaweel-ih naðˤaf-at iʃ-ʃubak
student.3SF tall.3SF cleaned.3SF the-window
'A tall (female) student cleaned the window.'
'A tall (female) student, she cleaned the window.'

c. tˤalibeh naðˤaf-at iʃ-ʃubak
student.3SF cleaned.3SF the-window
'A (female) student cleaned the window.'
'*A (female) student, she cleaned the window.'

The above examples show that the preverbal subject (whether definite, specific indefinite, or pure indefinite) is susceptible to the discourse-free or neutral subject interpretation. Under this reading, the three elements, the subject, verb, and object are all uttered with the same pitch level. However, as shown in the translations above, (9a) and (9b) are ambiguous between the typical neutral subject reading of the preverbal subject and another less-noticed reading of the preverbal subject, namely, a topic reading, especially if they are pronounced with a pause. By contrast, (9c) only has the former reading. It seems that the referentiality of the preverbal subject DPs in (9a) and (9b) signifies that they can be, besides being neutral/discourse-free subjects, topics along the lines of Reinhart[23], a junction to which we return soon and put forward a proposal whereby preverbal referential (i.e., definite and specific indefinite) subjects are ambiguous in the sense that they can be decoded either as neutral subjects or topics depending on the context, whereas preverbal pure/non-specific subject DPs are always restricted to the neutral-subject interpretation.

Nevertheless, the referentiality of both definite and specific indefinite DPs in general requires empirical evidence; otherwise, it will be a mere stipulation intended for an ad-hoc reasoning. Robust evidence of the referentiality of definite and specific indefinite DPs in JA comes from the so-called clitic-left-dislocation (CLLD) phenomenon. In fact, both non-subject definite and specific indefinite DPs can be clitic-left-dislocated in JA in the sense that such constituents can surface in a left-peripheral position while being resumed by a clitic in their first-merge position inside the clause, whereas non-specific non-subject indefinite DPs are precluded from CLLD constructions. Consider the following illustrative examples:

(10)

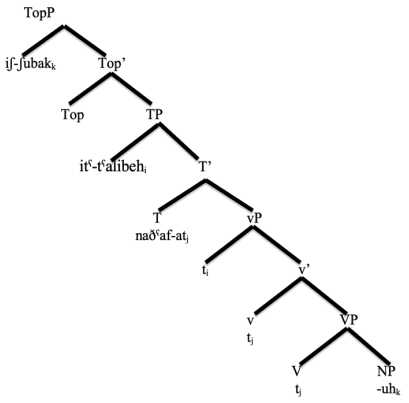
a. iʃ-ʃubak itˤ-tˤalibeh naðˤaf-at-uh
the-window the-student.3SF cleaned.3SF-it
'The window, the (female) student cleaned it.'
'As for the window, the (female) student cleaned it.'

b. ʃubak kbeer itˤ-tˤalibeh naðˤaf-at-uh
window big the-student.3SF cleaned.3SF-it
'A big window, the (female) student cleaned it.'

c. *ʃubak it^{ʕ}-t^{ʕ}alibeh naðʕaf-at-uh
window the-student.3SF cleaned.3SF-it
'A window, the (female) student cleaned it.'

The well-formedness of both (10a) and (10b), which involve a CLLD'ed non-subject definite and specific indefinite DPs, respectively, co-indexed with a clause-internal resumptive clitic, asserts that definite and specific indefinite DPs are referential, hence can be construed as left-peripheral topics[2, 26]. The non-specific non-subject DP in (10c), by contrast, cannot be topicalized and resumed by a clause-internal pronominal clitic because it is not referential. This can be taken as evidence that non-referential indefinite DPs in general cannot be clitic-left-dislocated in JA[2]. Espousing the Split-CP hypothesis of Rizzi for such left-peripheral topics[7], the following structure can be given for (10a):

(11)

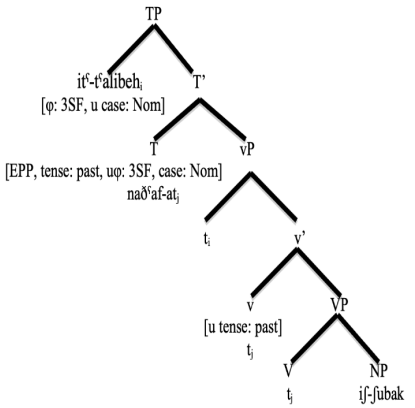


Embracing the connection between topicality and referentiality, we argue that preverbal definite and specific indefinite subject DPs are referential, hence can, in addition to their typical genuine subject reading, be construed as left-peripheral topics, while preverbal non-specific indefinite DPs, which are non-referential, are only limited to the genuine subject (but not the topic) reading. This conjecture begets the following question: What is the precise nature and position(s) of preverbal subject DPs in JA?

Even though the clause has the same order and the verb carries the same agreement inflections under the two readings, we assume that the derivation differs from one interpretation to the other. Under the neutral subject reading, the Clause-initial DP represents a neutral subject occupying Spec-TP, whereas under the topical interpretation, it is understood as a topic occupying Spec-TopP co-indexed with a clause-internal pro subject. These two scenarios are detailed below.

The first scenario (i.e., neutral, discourse-free subject reading), whether with definite, specific indefinite, or non-specific indefinite preverbal DPs, corresponds to a typical subject-verb-object clause. It is under this discourse-free reading where SVO can be productively used in out-of-the-blue sentences. We assume that the subject under this reading occupies Spec-TP, a position associated with neutral, discourse-free interpretation[21]. We contend that, advocating Koopman and Sportiche's proposal[27], the subject in SVO is first merged VP-internally (i.e., in Spec-vP) before it rolls up to Spec-TP for EPP considerations. The V also raises up to T to check the strong tense feature on T. Agree is established deriving full agreement. To further expound, under the neutral-subject reading, the preverbal DP, whether definite or indefinite, moves from its first-merge locus (Spec-vP) to Spec-TP. The light verb v attracts the lexical verb before the latter moves to the head T. The tense feature of the head T is responsible for the movement of the verb to T. Since v carries uninterpretable tense feature [u tense] and T head carries [tense: present/past], an Agree relation is established and the uninterpretable feature is valued[28]. The derivation of SVO in JA is exemplified in the following tree:

(12)



Adopting the Agree-based approach, the T serves as probe due to bearing [uφ Per, Num, and Gen] features[5, 6]. A suitable goal that bears matching [φ Per, Num, and Gen] features is the subject in Spec-vP, hence an Agree operation is

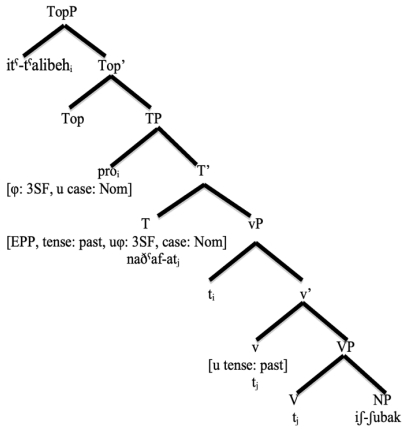
established and the probe's [uφ Per, Num, and Gen] features are valued.

Another unvalued feature that needs valuation for the sake of derivational convergence is case, which is, in light of the Agree approach, considered a side effect of agreement between T and the subject. Specifically, T has unvalued φ-features and valued case feature; the subject DP, which bears valued φ-features and unvalued case feature ([uCase]), is assigned nominative case as an upshot of Agree with T. The subject lands at Spec-TP by movement driven by EPP. The question of why subjects under the neutral reading should move to Spec-TP is trivially fleshed out as this movement is concomitant with full φ-features agreement. Notice that in all these cases the verb and the subject fully agree with each other. According to Chomsky, the subject is attracted to Spec-TP only if the head T carries full [uφ-features Pers, Num, and Gen] [6].

The second scenario, by contrast, equals a Topic-Comment construction that involves a DP externally merged in Spec-TopP while being co-referential with a clause-internal pro. Recall that this scenario applies only to definite and specific indefinite preverbal subjects of the type explicated in (9a) and (9b); pure/non-specific indefinite preverbal subjects as the one shown in (9c) do not conform to this scenario.

Under this proposal, the preverbal definite or specific indefinite DP can be a TP-external topic based in Spec-TopP and binds clause-internal null pro (in Spec-vP) that later rolls up to Spec-TP for EPP considerations. This account is embedded in a minimalist Agree-based approach and a Split-CP approach mostly in line with Rizzi [5–7]. The derivation of the topical reading of preverbal definite and specific indefinite DPs is incarnated in the following structure:

(13)



The derivation starts out with base-generating the preverbal definite DP in Spec-TopP, while instantaneously binding A clause-internal null pro that is merged in Spec-vP. The head T then attracts the verb. It can be said that the full agreement carried by the verb is traced to Rizzi's condition for pro identification [29–31]. Since T bears full [uφ Per, Num, and Gen] features, it serves as an active probe searching for a goal to value its features. The pro subject carries matching φ-features, hence forming an appropriate goal. Thus, Agree is established and feature valuation takes place. The pro subject gets its unvalued case feature valued due to this Agree mechanism and is assigned nominative case. Because the probe bears full φ-features, it also carries EPP, hence the movement of pro to Spec-TP. These mechanisms yield a Topic-Comment construction whose comment constituent contains disguised SVO order (i.e., Topic pro VO). The co-referentiality between the left-peripheral DP and the clause-internal pro can be attributed to the fact that they both have the same φ-features.

It can be argued here that preverbal subjects in SVO under the topical reading respect the definiteness and/or specificity condition due to semantic and pragmatic reasons. From the semantic perspective, definite and specific indefinite preverbal subject DPs can be construed as left-peripheral topics because they can establish co-referential relationship with a clause-internal pro, whereas preverbal non-specific indefinite subject DPs cannot, hence the impossibility of being topics. Pragmatically, left-peripheral topics have an aboutness property and are always associated with "given information" [23]. This characterization can only be substantiated by a definite or specific indefinite DP.

Moreover, it should be emphasized here that the topical and neutral readings of preverbal definite and specific indefinite DPs in this word order are associated with distinct prosodic patterns. When the preverbal DP in SVO functions as a topic, it is typically followed by a short prosodic break and pronounced with a higher pitch. The topicalized DP always receives higher pitch than other constituents in the clause, and it is always separated from the rest of the structure by a short prosodic pause. However, If the preverbal DP entertains a neutral subject reading, then the three constituents (the subject, verb and object) are all uttered with equal pitch and without pause. Since a single syntactic structure in one language can have two different interpretations, it sounds

unsurprising that the language might employ non-syntactic means such as prosody to mark the intended interpretation. These prosodic patterns further validate the projection of extra structural layers with different interpretative values above the TP. However, experimental examination of the role of prosody/phonology in interpreting such ambiguous structures is beyond the scope of this study but might be a strong candidate for future research.

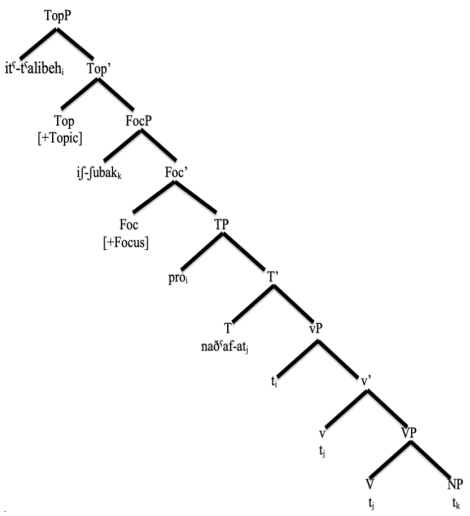
It remains to be said that our proposal for topical definite and specific indefinite preverbal DPs can be conceptualized as enhancement of an earlier analysis advanced by Soltan[31]. Soltan analyzes Spec-TP as an A'-position that hosts the base-generated preverbal DPs. Nevertheless, Al-Daher argues against Soltan's conjecture regarding the A'-status of Spec-TP and considers it a non-standard assumption[2]. Such a non-standard assumption can be simply avoided by adopting our proposal which is based upon the Split-CP scheme.

Nevertheless, a caveat is noted: The ambiguity of preverbal definite and specific indefinite subject DPs vanishes in the context where it is followed by a focused constituent. Consider the following example:

(14) it$^{\varsigma}$-t$^{\varsigma}$alibeh iʃ-ʃubak naðˁaf-at Topic Focus V
the-student.3SF the-window cleaned.3SF
'As for the (female) student, (the window)F she cleaned.'

In the above example, the preverbal DP 'the (female) student' precedes the focus-fronted object 'the window', hence the preverbal DP is definitely a topic, not a genuine subject. In different cartographic frameworks[7, 32], DPs that occur before focused elements are cross-linguistically construed as topics. Accordingly, we propose that both the focalized object DP as well as the clause-initial subject occur in the A'-zone. In other words, since the focalized constituent occurs after the clause-initial definite subject, the latter is confined to the topical interpretation; the discourse-free, neutral subject interpretation vanishes. Accordingly, the only possible position of the preverbal subject is in Spec-TopP above the focalized phrase 'the window' which sits in Spec-FocP. The following schematic representation can be given to the above structure:

(15)



In the above schematic representation, the clause-initial DP sits in Spec-TopP as a TP-external topic. Notice that there is [+Topic] feature borne by the head Top)[26]. This left-peripheral topic is coindexed with a clause-internal pro. The post-subject DP 'the window' is focus-preposed to Spec-FocP leaving a gap behind; this preposing is motivated by the [+Focus] feature[26, 33].

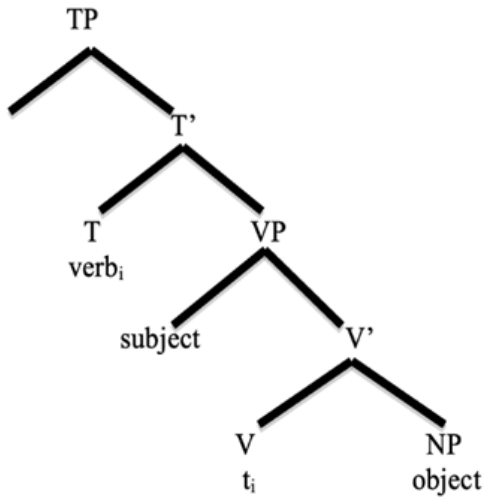
Summarizing, in this section, we have argued that preverbal definite and specific indefinite DPs in SVO are ambiguous between a neutral/real subject reading derived via movement to Spec-TP and a discourse-linked reading resulting by merging the preverbal DP in Spec-TopP. Non-specific indefinite preverbal subject DPs, by contrast, are restricted to the neutral-subject interpretation. Whereas referentiality of clause-initial subjects is a proviso for the discourse-linked topical interpretation, it is not for the neutral one. In the next section, we discuss the second possible permutation in JA, namely, VSO, and we develop a minimalist analysis of its derivation different from the previous analyses.

6. The Derivation of VSO

The VSO permutation has received much attention in the recent minimalist literature on different Arabic varieties[9, 11, 15, 20, 31, 34], where it is contended that the subject in this order remains in its first-merge locus (Spec-vP) and is not raised further, but the verb in this word order raises from V to T. According to these analyses, the head T bears a strong tense feature that triggers raising the verb to T; this

feature is satisfied by hosting syntactic heads like finite verbs. Furthermore, it is widely believed in these studies that the head T in VSO does not bear EPP, hence the lack of subject movement to Spec-TP. This proposal can be represented as follows:

(16)



However, the agreement facts in VSO in JA, the distributional properties of postverbal subjects in this word order, as well as its interpretative values indicate that the above analysis is untenable and cannot be adopted for VSO in JA. Furthermore, the claim that the lack of EPP feature in this permutation hinders the raising of the postverbal subject from its base locus in Spec-vP to Spec-TP seems to contradict Alexiadou and Anagnostopoulou's extensive contention that EPP is a universal aspect found in all languages [35]. Therefore, we diverge from the above traditional analysis and instead argue that T in VSO, similar to SVO, carries EPP feature that needs to be satisfied. An important issue is in order, however: If our argument is on the right track, how is the EPP feature in VSO sentences in JA satisfied?

It can be claimed that, on a par with neutral SVO sentences, the postverbal subject in VSO rolls up from Spec-vP (i.e., its original locus inside the clause) to Spec-TP for EPP requirement before raising the verb to a TP-external position. However, this claim leaves the ban on non-specific indefinite postverbal subject DPs in JA unexplained. In other words, under this proposal, it is not clear why non-specific indefinite postverbal subjects cannot check EPP as appears from their inadmissibility in this word order. Recall that postverbal subjects in VSO in JA are restricted to definite and specific indefinite DPs. Non-specific indefinite DPs are precluded from VSO in JA. The relevant examples are repeated here for convenience.

(17) VSO

a. naðˤaf-at itˤ-tˤalibeh iʃ-ʃubak
cleaned.3SF the-student.3SF the-window
'The (female) student cleaned the window.'

b. naðˤaf-at tˤalibeh tˤaweel-ih iʃ-ʃubak
cleaned.3SF student.3SF tall.3SF the-window
'A tall (female) student cleaned the window.'

c. *naðˤaf-at tˤalibeh iʃ-ʃubak
cleaned.3SF student.3SF the-window
'A (female) student cleaned the window.'

One might assume that the definiteness of the subject in JA is at work here. In other words, it might be argued that only definite and specific indefinite subjects can satisfy EPP in VSO via movement to Spec-TP, whereas non-specific indefinite subject DPs cannot. However, recall that we have just shown in the previous section that EPP in neutral SVO structures can be satisfied by moving non-specific indefinite subject DPs to Spec-TP, which makes this suggestion unviable. Yet, an account for this ostensive observation is not hard to find, as will be shown shortly.

The above examples show that the postverbal subject should be referential. Bearing in mind the connection between 'referentiality' and topicality [23], this observation points toward the non-neutrality of postverbal subjects of VSO in JA; it seems that postverbal subjects differ from typical neutral subjects and carry some informational content. More importantly, as explained earlier, while SVO word order in JA can be used neutrally without restrictions, VSO is

a restricted word order that is used for certain purposes: It is used to attract attention to what happened and to emphasize the event itself by preposing the verb [1]; it is not used to give new information as is the case with SVO. In other words, VSO structure emphasizes and denotes attention to the action involved in the sentence. In fact, the distributional characteristics of postverbal subjects as well as the interpretative values of VSO illuminated above beg for a principled account. The structure advanced to absorb the above observations is presented from a minimalist-cartographic viewpoint whose details are taken up in the remainder of this section.

As a departure point, we abandon the putative postulation that Jordanian postverbal subjects are genuine subjects that stay where they originate inside the VP shell and do not undergo further raising to Spec-TP [3]. Rather, we argue that postverbal subjects in this permutation are left-peripheral topics and, on par with the derivation of topical SVO sentences, we argue that VSO involves movement of a real subject pro from its original position inside the VP to Spec-TP for EPP consideration. This amounts to saying that satisfying EPP in VSO is not fulfilled by the postverbal subject itself, but by a null pro subject on par with topical SVO sentences, and that what appears to be a postverbal subject is indeed a left-peripheral topic externally merged in Spec-TopP, hence the ban on non-specific indefinite DPs in this structure. In other words, the proscription on postverbal non-specific indefinite DPs in VSO follows from the fact that postverbal DPs are not genuine subjects; rather, they are A'-constituents projected above Spec-TP.

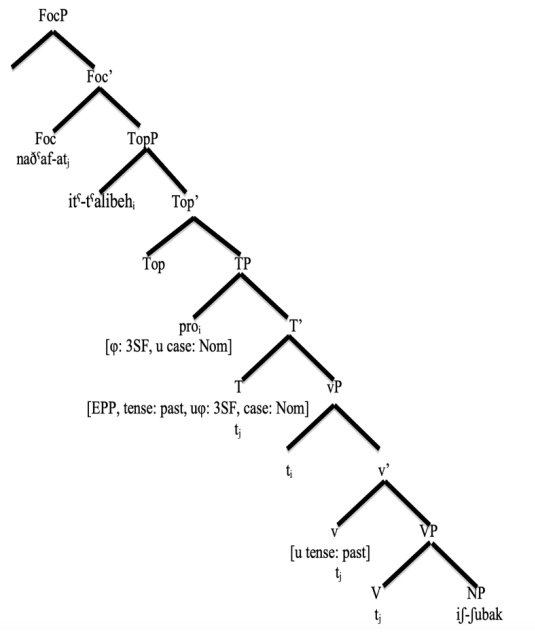
One point remains in order though: How to account for the clause-initial position of the verb in this word order? We argue that the verb appears clause-initially due to focalization of the verb in the sense of several scholars [15, 26, 33, 36–39]. As mentioned above, VSO is a restricted word order in JA that is used to attract attention to what happened and to emphasize the event itself by preposing the verb [1]. We thus suppose that focalization is at work in this permutation in the sense that the verb in T undergoes further raising to a TP-external head for focus considerations.

The question that arises at this stage pertains to the structural site focalized verbs target as a result of this movement. To label this potential site, we build on the insights embodied in the proposals advanced by some of the authors cited in the preceding paragraph, as well as other scholars. For example, Verb (and VP) topicalization is documented in some Scandinavian languages [39]. The head of a focus projection can receive a moved verb in Hungarian languages [33]. É. Kiss proposes a functional projection (FP) in Hungarian and argues that V moves to the head F which carries [+Focus] feature, and focused constituents land in Spec-FP [38].

Ouhalla follows suit and adopts a similar analysis for SA in which he suggests an FP projection [36, 37]. He proposes that the identification of the feature of the head F can be fulfilled through hosting a wh-phrase or focus-preposed element; it can also be identified by merging a head that bears [+F] feature. Following Ouhalla [36, 37], we assume the existence of strong [+Focus] feature on the head Foc in JA. This feature can be identified by hosting a head, which means that the verb in VSO order in JA rolls up to Foc (through v and T) for identifying [+Focus] of FocP [26].

In a nutshell, as for the derivation of VSO, we push the argument adopted for topical SVO sentences an extra step higher in the tree and propose that the head verb is further moved to a higher left-peripheral head, namely, the head Foc, to check a [+Focus] feature. In other words, JA's VSO permutation is a marked order derived from the marked topical SVO order for certain interpretative or focus reasons. For concreteness, the derivation of VSO in JA is given below:

(18)



As explained above, postverbal subjects should be referential, hence should be construed as topics base-generated in Spec-TopP. A null pro is merged in the VP shell (i.e., Spec-

vP). The lexical verb moves up to the head T, which carries full uninterpretable φ-features. The existence of matching interpretable φ-features on the subject pro gives rise to Agree. T then assigns nominative case to the pro subject. Since the head T carries a complete set of φ-features, we argue that VSO also involves EPP. Therefore, the subject pro moves to Spec-TP (contra the authors cited at the outset of this section who argue for the absence of EPP in VSO). Finally, head movement applies in the derivation whereby the verb in the head T is attracted to Foc, the head of FocP, hence its [+Focus] feature is satisfied.

However, before bringing this section to a closure, it remains to be asserted that assuming focus as a formal feature in VSO structures in JA is compatible with some grammatical aspects attested in the language. The existence of certain syntactic behaviors (e.g., initiating movement) as well as prosodic characteristics in JA points toward the presence of [+Focus] feature in its grammar[40]. In the next section, we move on to an ostensible puzzle that follows from the proposal detailed above for SVO and VSO, viz., the structure of VOS in which the object is sandwiched between a clause-initial verb and a clause-final subject.

7. The Derivation of VOS in JA

This section is mainly concerned with the syntax and interpretation of VOS clauses. The subject in VOS constructions surfaces sentence-finally and the whole VP precedes it. Recall also that only definite and specific indefinite DP subjects can appear clause-finally; non-specific indefinite subject DPs are impermissible in this position. Consider the following examples:

(19) VOS

a. naðˤaf-at iʃ-ʃubak, itˤ-tˤalibeh
cleaned.3SF the-window the-student.3SF
'As for the (female) student, SHE CLEANED the window.'
'*As for the (female) student, she cleaned the window.'
'*The (female) student cleaned the window.'

b. naðˤaf-at iʃ-ʃubak, tˤalibeh tˤaweel-ih
cleaned.3SF the-window student.3SF tall.3SF
'A tall (female) student, SHE CLEANED the window.'
'*A tall (female) student, she cleaned the window.'
'*A tall (female) student cleaned the window.'

c. *naðˤaf-at iʃ-ʃubak, tˤalibeh
cleaned.3SF the-window student.3SF

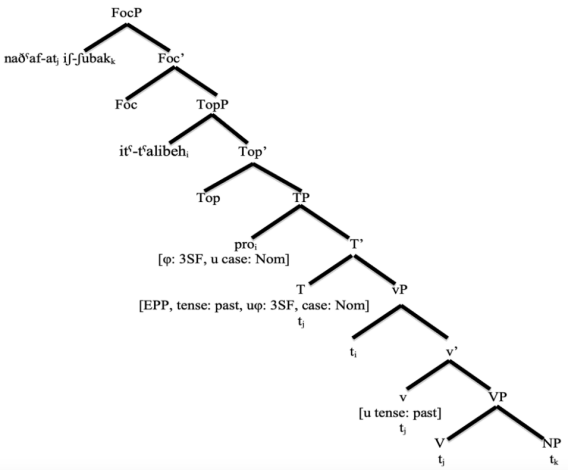
Only definite and specific indefinite subjects can surface in this word order, as appears respectively in the grammaticality of (19a) and (19b). Ungrammaticality ensues if the clause-final subject is non-specific indefinite, as shown in (19c). This asymmetrical behavior of subject DPs in VOS constructions with respect to definiteness indicates that the subject in this word order should be referential. Bearing in mind the connection between referentiality and topicality[23], it can be said that the subject of VOS in JA is not a genuine subject; rather, it is a topic that carries some informational content. Put differently, since only definite DPs can be used as topics, and since the indefiniteness of the subject in (19c) is the only source of ungrammaticality, it can be safely concluded that the subject of VOS clauses, albeit its clause-final position, is a left-peripheral topic and, consequently, VOS is not discourse neutral.

Further evidence in support of the non-neutrality of VOS has to do with certain prosodic aspects of this word order. The pre-subject VP in VOS is always uttered with a pitch higher than that of the clause-final subject. Moreover, there is always a short pause after the VP and before the subject. We have marked this pause with a comma.

Derivationally, we propose that the clause-final subject in VOS constructions in JA is a topic lower than the remnant of the structure, i.e., VP, which is construed as a focus-fronted XP. To further clarify, the subject of VOS clauses, despite its final position, is left-peripheral and is located in Spec-TopP below the VP which lands in Spec-FocP for focus considera-

tions. This amounts to saying that VOS clauses are endowed with a rich left periphery in which there is always FocP above TopP. For concreteness, the derivation of VOS constructions in JA is demonstrated in the following:

(20)



The clause-final subject represents a TP-external element (in Spec-TopP) that binds a TP-internal pro (in Spec-vP). Since the head T is endowed with [uφ Pers, Num, and Gen] features, it functions as a probe searching for a suitable goal with matching φ-features in its c-command zone. The null pro serves as an appropriate goal, thus the Agree process takes place and results in valuing T's uninterpretable features and assigning nominative case to pro. The pro subject is then raised to Spec-TP for EPP considerations. As a final step in the derivation, we argue that the whole VP is moved from below the lexical subject, which is in Spec-TopP, to Spec-FocP above the TopP, hence appearing in a pre-subject position.

To summarize, in this section, we examined the syntactic derivation of VOS in JA. We showed that this word order is derived through base-generating the subject in a topic projection, followed by raising the remnant VP to a focus projection. We argue that the whole VP, rather than only the object, undergoes focus-fronting, hence the clause-final positioning of the subject which is already proven to surface in Spec-TopP based on syntactic evidence. The fronting of the whole VP is triggered by the [+Focus] feature on Foc. Moreover, prosodic evidence corroborates our conjecture. Recall that the clause-final DP in VOS is interpreted as a topic and the rest of the sentence (i.e., VP) is interpreted as a focus, hence is always uttered with a pitch higher than that of the final DP. VOS constructions always display a pitch drop or prosodic pause between the fronted VP and the clause-final subject. There is a short prosodic pause before the final DP. Thus, the derivation of VOS further supports the validity of dividing the left-periphery into hierarchical zones like FocP over TopP and further asserts the role of prosody in capturing the interpretative characteristics of different word orders. This analysis has broader typological implications as the derivation of VOS word order via fronting the predicate to a higher position is advocate in other non-Semitic languages such as Niuean, which is a Polynesian language, in which the predicate (VO) is raised to a Predicate Phrase in order to derive VOS [41] (see the work by Coon for similar analysis of VOS in Chol (Mayan) [42]).

8. Conclusion

The derivation of different word permutations in JA, viz., SVO, VSO, and VOS, is the major concern of this paper. The nature, distributional properties, and position(s) of the subject in these different permutations were highlighted. The relationship between these different permutations was also discussed. A minimalist Agree-based analysis backed with a cartographic left-peripheral approach is presented to capture these different word orders' syntactic and interpretive values. Specifically, the derivation of these different constituent orders is discussed in terms of the Chomskyan Agree-based framework and the Split-CP hypothesis of Rizzi [5–7].

As a departure point of our analysis, SVO was shown to be the discourse-free, unmarked permutation in JA. SVO was then contrasted with VSO and VOS in terms of the nature of the subject DPs allowed in each permutation as well as in terms of the interpretative values of each word order. We argue that, in the SVO word order, the verb is raised to T to satisfy a strong tense feature, and definite as well as specific indefinite preverbal subjects can either be moved to Spec-TP under a neutral subject reading or can be externally merged in Spec-TopP while being co-indexed with a clause-internal pro under a topical interpretation. This pro subject is raised to Spec-TP to meet the EPP requirement. However, pure non-definite DPs in SVO have only one reading: real subjects in Spec-TP; they cannot be construed as topics. Our proposal indicates that even if SVO is the unmarked permutation in a particular language, it is still liable to interpretative variation. The VSO and VOS orders, by contrast, are derived

by applying extra movement of the verb from T to Foc or extra movement of the whole VP to Spec-FocP, respectively, for focus considerations. Postverbal subjects in both VSO and VOS can only have topical interpretation; they cannot be analyzed as real subjects as shown by the definiteness facts. A thorough assumption can be made here: both VSO and VOS word orders in JA are marked orders derived from another marked, less-noticed though, order: The topical version of SVO. The verb undergoes further movement outside the TP giving rise to VSO, or the whole verb phrase undergoes movement outside the TP producing VOS. We have also shown evidence that the assumption that the verb moves to the head Foc that carries a formal feature [+Focus] in VSO is not a mere theoretical stipulation but is rather grounded in the observation that JA has some grammatical, syntactic, and prosodic reflexes that can correspond to clausal and constituent focus, hence VSO and VOS can have a rich discourse layer.

Our analysis of different word orders in JA enriches our understanding of clause structure in general and gives further credence to Rizzi's rich discourse layer of structure [7]. The analysis presented in this paper provides empirical evidence in support of the hypothesis that information structure affects the derivation of different word orders. For example, without Rizzi's proposal that TopPs can follow or precede FocP, the fact that definite and specific indefinite subjects in SVO can surface to the left of focalized phrases, that verbs in VSO can surface clause-initially before definite topical subjects, and that the verb and object altogether in VOS can surface before a clause-final subject will remain unexplained.

The analysis presented in this study tackles key concerns in Arabic syntax. For example, we argue in favor of the universality of the EPP feature in all JA word orders. We provide evidence for the existence of this feature even in the marked word orders, contra earlier analyses that posit its absence. Moreover, we propose that verb movement beyond T to Foc is syntactically induced (i.e., to check a discourse-related feature).

As for the broader theoretical implications, our analysis adds credence to the proposal that information structure does manifest in syntactic derivation. It also confirms that there is "a one-to-one relation between position and interpretation" [43].

The flexibility of word order in JA and the discourse-related interpretations associated with each word order place the language within the broader typology of non-Semitic languages such as Hungarian. Recall that the discourse-triggered movement of different syntactic elements to the left periphery is attested in Hungarian [38], which extends the theoretical and typological implications of our analysis beyond the Arabic-language, or even Semitic, family. Finally, this study opens the avenue for further empirical examination of the potential role prosodic contours may play as non-syntactic evidence for left-peripheral derivations.

Author Contributions

Conceptualization, M.B.S. and Z.A.-D.; methodology, M.B.S. and Z.A.-D.; software, M.B.S. and Z.A.-D.; validation, M.B.S. and Z.A.-D.; formal analysis, M.B.S. and Z.A.-D.; investigation, M.B.S. and Z.A.-D.; resources, M.B.S. and Z.A.-D.; data curation, M.B.S. and Z.A.-D.; writing—original draft preparation, M.B.S. and Z.A.-D.; writing—review and editing, M.B.S. and Z.A.-D.; visualization, M.B.S. and Z.A.-D.; supervision, M.B.S. and Z.A.-D.; project administration, M.B.S. and Z.A.-D. All authors have read and agreed to the published version of the manuscript.

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Informed consent was obtained from all subjects involved in the study.

Data Availability Statement

The data used in the study is incorporated in the manuscript.

Conflicts of Interest

The authors declare no conflict of interest.

References

[1] Musabhien, M., 2009. Case, Agreement, and Movement in Arabic: A Minimalist Approach [Doctoral Dissertation]. University of Newcastle: Newcastle upon Tyne, UK. pp. 1–293.

[2] Al-Daher, Z., 2016. Pseudo Wh-Fronting: A Diagnosis of Wh-Constructions in Jordanian Arabic [Doctoral Dissertation]. University of Manitoba: Winnipeg, MB, Canada. pp. 1–308.

[3] Sahawneh, M., 2017. Probes and Pronouns: Variation in Agreement and Clitic Doubling in Arabic [Doctoral Dissertation]. University of Manitoba: Winnipeg, MB, Canada. pp. 1–206.

[4] Al-Daher, Z., Al-Dala'ien, O.A., Al-Rousan, M., et al., 2024. A Syntactic and Discoursal Analysis of Halaʔ 'Now' in Jordanian Arabic. Journal of Language Teaching and Research. 15(4), 1339–1350.

[5] Chomsky, N., 2000. Minimalist Inquiries: The Framework. In: Martin, R., Michaels, D., Uriagereka, J. (eds.). Step by Step: Essays on Minimalist Syntax in Honor of Howard Lasnik. MIT Press: Cambridge, MA, USA. pp. 89–155.

[6] Chomsky, N., 2001. Derivation by Phase. In: Kenstowicz, M. (ed.). Ken Hale: A Life in Language. MIT Press: Cambridge, MA, USA. pp. 1–52.

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

[8] Mohammad, M.A., 1990. The Problem of Subject-Verb Agreement in Arabic: Towards a Solution. In: Eid, M. (ed.). Perspectives on Arabic Linguistics I: Papers from the First Annual Symposium on Arabic Linguistics. John Benjamins: Amsterdam, The Netherlands. pp. 95–126.

[9] Mohammad, M.A., 2000. Word Order, Agreement, and Pronominalization in Standard and Palestinian Arabic. John Benjamins: Amsterdam, The Netherlands. pp. 1–213.

[10] Shlonsky, U., 1997. Clause Structure and Word Order in Hebrew and Arabic: An Essay in Comparative Semitic Syntax. Oxford University Press: New York, NY, USA. pp. 1–289.

[11] Fassi-Fehri, A., 1993. Issues in the Structure of Arabic Clauses and Word Order. Kluwer Academic: Dordrecht, The Netherlands; Boston, USA. pp. 1–330.

[12] Benmamoun, E., 2000. The Feature Structure of Functional Categories: A Comparative Study of Arabic Dialects. Oxford University Press: New York, NY, USA. pp. 1–192.

[13] Jelinek, E., 2002. Agreement, Clitics and Focus in Egyptian Arabic. In: Ouhalla, J., Shlonsky, U. (eds.). Themes in Arabic and Hebrew Syntax. Kluwer: Dordrecht, The Netherlands. pp. 71–105.

[14] Alatawi, S., 2016. The Syntax of Left Periphery in Arabic: A Minimalist Analysis [Doctoral Dissertation]. University of York: York, UK. pp. 1–294.

[15] Aoun, J., Benmamoun, E., Sportiche, D., 1994. Agreement, Word Order, and Conjunction in Some Varieties of Arabic. Linguistic Inquiry. 25(2), 195–220.

[16] Albuhayri, S., 2019. Information Structure in Standard Arabic Verbal Sentences [Doctoral Dissertation]. University of Wisconsin-Milwaukee: Milwaukee, WI, USA. pp. 1–236.

[17] van Urk, C., 2015. A Uniform Syntax for Phrasal Movement: A Case Study of Dinka Bor [Doctoral Dissertation]. Massachusetts Institute of Technology: Cambridge, MA, USA. pp. 1–284.

[18] Gécseg, Z., 2006. Topic, Logical Subject and Sentence Structure in Hungarian. Acta Linguistica Hungarica. 53(2–3), 139–174.

[19] Büring, D., 1997. On the Meaning of Topic and Focus. Routledge: London, UK. pp. 1–216.

[20] Bakir, M.J., 1979. Aspects of Clause Structure in Arabic: A Study in Word Order Variation in Literary Arabic [Doctoral Dissertation]. Indiana University: Bloomington, IN, USA. pp. 1–190.

[21] Basilico, D., 1998. Object Position and Predication Forms. Natural Language & Linguistic Theory. 16(3), 541–595.

[22] Cheng, L.L., Rooryck, J., 2000. Licensing Wh-in-Situ. Syntax. 3, 1–19.

[23] Reinhart, T., 1981. Pragmatics and Linguistics: An Analysis of Sentence Topics in Pragmatics and Philosophy. Philosophica anc Studia Philosophica Gandensia Gent. 27(1), 53–94.

[24] Cinque, G., Rizzi, L., 2009. The Cartography of Syntactic Structures. Studies in Linguistics. 2, 42–58.

[25] Larson, R.K., 1988. On the Double Object Construction. Linguistic Inquiry. 19(3), 335–391.

[26] Shlonsky, U., 2000. Remarks on the Complementizer Layer of Standard Arabic. In: Lecarme, J., Lowenstamm, J., Shlonsky, U. (eds.). Research in Afroasiatic Grammar: Papers from the Third Conference on Afroasiatic Languages. John Benjamins: Amsterdam, The Netherlands. pp. 325–343.

[27] Koopman, H., Sportiche, D., 1991. The Position of Subjects. Lingua. 85(2–3), 211–258.

[28] Adger, D., 2003. Core Syntax: A Minimalist Approach. Oxford University Press: Oxford, UK. pp. 1–424.

[29] Rizzi, L., 1982. Issues in Italian Syntax. Foris: Dordrecht, The Netherlands. pp. 1–188.

[30] McCloskey, J., 1986. Inflection and Conjunction in Modern Irish. Natural Language & Linguistic Theory. 4(2), 245–281.

[31] Soltan, U., 2007. On Formal Feature Licensing in Minimalism: Aspects of Standard Arabic Morphosyntax [Doctoral Dissertation]. University of Maryland: College Park, MD, USA. pp. 1–241.

[32] Haegeman, L., 2006. Argument Fronting in English, Romance CLLD, and the Left Periphery. In: Zanuttini, R., Campos, H., Herburger, E., Portner, P.H. (eds.). Crosslinguistic Research in Syntax and Semantics: Negation, Tense and Clausal Architecture. Georgetown University Press: Washington, DC, USA. pp. 27–52.

[33] Brody, M., 1990. Some Remarks on the Focus Field in Hungarian. UCL Working Papers in Linguistics. 2(20), 1–25.

[34] Harbert, W., Bahloul, M., 2002. Post Verbal Subjects in Arabic and the Theory of Agreement. In: Ouhalla, J., Shlonsky, U. (eds.). Themes in Arabic and Hebrew Syntax. Kluwer: Dordrecht, The Netherlands. pp. 45–70.

[35] Alexiadou, A., Anagnostopoulou, E., 1998. Parametrizing AGR: Word Order, V-Movement and EPP-Checking. Natural Language & Linguistic Theory. 16(3), 491–539.

[36] Ouhalla, J., 1994. Verb Movement and Word Order in Arabic. In: Lightfoot, D., Hornstein, N. (eds.). Verb Movement. Cambridge University Press: Cambridge, UK. pp. 41–72.

[37] Ouhalla, J., 1997. Remarks on Focus in Standard Arabic. In: Eid, M., Ratcliffe, R.R. (eds.). Perspectives on Arabic Linguistics X: Papers from the Tenth Annual Symposium on Arabic Linguistics. John Benjamins: Amsterdam, The Netherlands. pp. 9–46.

[38] É. Kiss, K., 1995. Introduction. In: É. Kiss, K. (ed.). Discourse Configurational Languages. Oxford University Press: Oxford, UK.

[39] Holmberg, A., 1999. Remarks on Holmberg's Generalization. Studia Linguistica. 53, 1–39.

[40] Kratzer, A., Selkirk, E., 2020. Deconstructing Information Structure. Glossa: A Journal of General Linguistics. 5(1), 1–53. DOI: https://doi.org/10.5334/gjgl.1002

[41] Massam, D., 2000. VSO and VOS: Aspects of Niuean Word Order. In: Carnie, A., Guilfoyle, E. (eds.). The Syntax of Verb Initial Languages. Oxford University Press: Oxford, UK. pp. 97–116.

[42] Coon, J., 2010. VOS as Predicate Fronting in Chol. Lingua. 120, 354–378. DOI: https://doi.org/10.1016/j.lingua.2008.07.008

[43] Cinque, G., 1999. Adverbs and Functional Heads. Oxford University Press: Oxford, UK. pp. 1–288.