Wh-Movement in Taizi Arabic: An Optimality Theory Account

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Abstract

This paper investigates the syntax of wh-movement in Taizi Arabic (TA) within the Optimality theory framework. The scope of this study is limited to examine only simple and multiple questions. Results Show that TA strictly adheres to the Q-marking constraint in the formation of its simple and multiple questions. Findings also show that, like Standard Arabic (SA) Q-scope is dominated by both Q-marking and Stay constraints forcing wh-elements to move to the initial position of simple and multiple questions. Optionality in wh-movement is not observed in TA as it is the case in other dialects of Arabic like Cairene Arabic (CA). Furthermore, the study supports Oshari (2010) and El-touny (2011) proposals that optionality in CA and in some other dialects of Arabic is due to the interaction between the syntax and prosodic constraints, that is, the focalization and topicalization constraints.

Key Words: wh-movement, constraints, simple questions, multiple questions, Optimality theory

1. Introduction

This study explores the restrictions on syntactic extraction of wh-elements in Taizi Arabic within the frame work of Optimality theory Prince and Smolensky (1994/2002/2004). Languages vary among each other in the way they form their wh-questions. In English, for instance, multiple questions are formed by movement of one of the wh-elements to spec-CP and accompanying verb movement to C, while other wh-elements remain in situ. A couple of OT accounts of wh-movement have been proposed in the past already, among others, Grimshaw 1997b, Ackema and Neeleman 1998, Legendre et al. 1998. A feature that they share, and which differentiates them from the strictly representational account which I defend here, is that the fronting vs. in situ split is accounted for by the interaction of a constraint requiring wh-element fronting and a constraint that bans syntactic movement, STAY, originally introduced by Grimshaw (1997b), importing the idea of derivational economy from minimalist syntax.

We argue here that in Standard Arabic, hence forth SA, Q- Marking must be relatively high in the hierarchy while Q-Scope is lowest in the hierarchy. In Taizi Arabic, hence forth TA, the case is the same as in SA. However, in Cairene Arabic, hence forth CA, the constraint Stay is ranked higher than Q-Marking and Q-Scope.

2. Constraints

The study adopts the constraints proposed by Ackema and Neeleman (1998) on

question formation. These constraints are as follows;

2.1 Q-Marking

A question must be overtly Q-marked

2.2 Q-Scope

[+Q] elements must c-command at surface structure

2.3 STAY

Do not Move

These constraints are held on surface structures.

(Tableau. 1) SA Simple questions formation

	Q-Marking	Stay	Q-Scope
a. maada ra'ayt ?ant?		***	
b. ra'ayt maada ?ant?	*	***	*
c. ?ant ra'ayt maada?	*		*

The sentence maada ra'ayt ?ant? violates Stay while Q-marking is satisfied. Thus, the candidate in (a) wins the competition and becomes the optimal. Crucially, the other candidate violates fatally the Q-marking constraints.

3.2 SA Multiple Questions Formation

Let us now turn to multiple question formation in SA. The high ranking Q-

3. Question Formation in Arabic

3.1 Standard Arabic Simple Questions Formation

Consider how the constraints interact in SA simple questions:

> (1)   maada   ra'ayt   ?ant
>
>   What see (2nd ,Sg, PAST)   you
>
>   What did you see?

marking again ensures that the head and at least one wh-phrase must move in order to create the proper Q-marking environment. The question here is what will happen to other wh-phrases.

Consider the following example from SA:

> (2) man   ra'a   maada
>
>   Who   see (2nd ,Sg, PAST)   what
>
>   Who saw what?

(Tableau. 2) SA Multiple Question Formation

	Q-Marking	Stay	Q-Scope
a. man ra'a maada		*	*
b. mada man ra'a		***	
c. man maada r'aa		***	
d. Ra'a man maada	*		
e. maada ra'a man		**	*

Stay is a violable constraint in SA , it has its effects . It does not only account for wh-elements remaining in situ, but also for wh-elements that are moved and ensures that the

moved wh-element makes the shortest possible movement. In (b) Stay plays a crucial role in ruling out candidates like (b),

(c), and (e) while Q-marking will rule out candidates like (d).

Now, let us try the same constraint hierarchy with the following example from SA.

(3) man   ya'arif   mata   raHal?

Who know (Sg, PRE) when travel (Sg, PRE)

Who knows when he traveled?

(Tableau. 3) SA multiple questions

	Q-Marking	Stay	Q-Scope
a. man ya'arif mata raHal		*	
b. mata ya'arif man raHal		**	
c. man mata ya'arif raHal		**	
d. ya'arif man raHal mata	*		*

We note from the tableau above that Q-marking rules out candidate (d) because it is not Q-marked. Stay rules out both candidates (b) and (c) because they encounter more violations than candidate (a) which is the optimal.

Thus, the constraint ranking is crucial for SA. In the next section we try to apply the same constraint hierarchy to TA and find out whether it is applicable or not.

4. Question Formation in Taizi Arabic

TA is a variety of Arabic spoken in Yemen in the province of Taiz. It has a population of approximately two million. At the first sight it looks like a very simple version of SA but in fact it is not. TA has certain grammatical features that differentiate it from other dialectical varieties spoken in the country as well as the SA.

In this section we are investigating wh-movement phenomenon in TA and our proposed constraint hierarchy.

4.1 Simple Questions in TA

Consider the following example from TA:

(4) fayn   rayH   ?ant?

   Where   go (Sg, 2nd , PRES PRG)   you

   Where are you going?

(Tableau. 4) TA Simple Question Formation

	Q-Marking	Stay	Q-Scope
a. fayn rayH ?ant		***	
b. rayH fayn ?ant	*	***	*
c. ?ant rayH fayn	*		*

The hierarchy given in Tableau. 4 bans the second candidate because it violates the Q-Marking constraint which is at the top of the constraint hierarchy.

4.2 Taizi Arabic multiple questions

Let's take the following multiple questions from Taizi Arabic:

(5) men   shaaf   mada
    Who see (Sg, 3rd, PAST)   what
    Who saw what?

(Tableau. 5) Taizi Arabic multiple questions

	Q-Marking	Stay	Q-Scope
a. min shaaf maada			*
b. shaaf min maada	*		**
c. min maada shaaf		*	

As can be noted from Tableau. 5, candidate (a) is the optimal one because it is the least violated candidate. Candidate (b) violates Q-marking so it is banned as it violates the topmost constraint in the constraint hierarchy.

Thus, Taiz Arabic wh-movement is best accounted for by the constraint hierarchy.

Q-Marking > Stay > Q-Scope

5. Cairene Arabic Question Formation

Cairene Arabic is a variety of Arabic spoken in Egypt. In this variety of Arabic the wh-elements remain in Situ in most of the cases. Consider the following examples:

1. ?a'mil   ?ayh

 do (Sg, 2nd, PRE)   what

 What are doing these days?

2. rayH   fayn

 go (Sg, 2nd, PRE)   where

 where are you going?

3. gayi   minyn

 come(Sg, 2nd, PRE)   from where

 where are you coming from?

5.1 CA simple questions

Now, let us draw a tableau for the sentence in (1) applying the constraint hierarchy used for the data from SA and from Taizi Arabic.

(Tableau. 6) CA simple questions

	Q-Marking	Stay	Q-Scope
a) ?a'mel ? ayh	*		*
b) ?ayh ?a'mel		*	

As shown above the constraint hierarchy results in blocking the optimal structure *a'mel   ayh* . Although, the structure *ayh a'mel* is a possible form or a sub-optimal candidate , it is the least used and preferred structure by Cairene people. Now let us turn try to re-rank the constraints in a way that allow the optimal candidate to emerge.

(Tableau. 7) CA simple questions

	Stay	Q-Marking	Q-Scope
a. ?a'mel ? ayh		*	*
b. ?ayh ?a'mel	*		

The re-ranking in (Tableau. 7) (7) allows the optimal candidate to emerge. For the sake of simplification I will not go further in discussing why the sub-optimal candidate (b) is blocked in (Tableau.7).

5.2 CA multiple questions

Now try the given hierarchy with a Cairene Arabic multiple question:

(8) miin   shaaf   ?ayh
    Who   see (Sg, 3rd, PAST)   what
    Who saw what?

(Tableau. 8) Cairene Arabic multiple questions

	Stay	Q-Marking	Q-Scope
a. shaaf min maada	*	*	*
b. miin shaaf ?ayh			*
c. min ?ayh shaaf	*		

The candidate in (b) is the optimal one because it is the least violated while candidate (a) and (b) violates Stay which is ranked at the top of the hierarchy. Cairene Arabic wh-elements prefer to remain in situ. This support our argument that the hierarchy for Cairene Arabic is as follows:

 Stay > Q-Marking > Q-Scope

5.3 Optionality

Contrary to the argument that wh-movement in Cairene Arabic is optional, we adopt here Oshari (2010) and El-Touny (2011) view that the fronting of wh-elements in Cairene Arabic is an instance of focalization and topicalization process. It is to be adequately explained by the interaction of the abovementioned syntactic constraints with other phonological constraints such as the FOC and TOP constraints. Due to the delimits of the study these issues are not to be tacked here.

6. Findings

The study provides empirical evidence that Taizi Arabic, like Standard Arabic, ranks Q-marking high in the hierarchy, i.e., higher than STAY and Q-Scope.

Q-marking>>STAY>>Q-SCOPE

 However, Cairene Arabic exhibits a different structure pattern of questions by re-raking the above constraints. That is, the constraint STAY is ranked high in the hierarchy allowing the wh-elements to remain in situ.

STAY >> Q-marking >>Q-SCOPE

7. Conclusion

This study provides empirical evidence that SA and TA rank Q-marking high in their respected constraint hierarchies, i.e., the Q-marking constraint is ranked topmost in the hierarchy higher than STAY and Q-Scope constraints. However, CA exhibits a different structure pattern of question formation by re-ranking the constraints of the proposed hierarchy for SA and TA allowing Stay to overcome Q-making . That is, the constraint STAY is ranked high in the hierarchy allowing the wh-elements to remain in situ. This in turn provides more support for the view that variation between languages is best explained by the interaction between the abovementioned constraints as argued by Ackema and Neeleman (1998).

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