

## Theta Roles and Arabic-English Translation

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### Abstract:

This study was designed to examine the different theta roles that can be assigned to arguments in English and Arabic. It aimed to discover the effect of Arabic-English translation to the roles assigned by predicates. The data were collected from different English sources. These data were analyzed using content analysis approach. Then, they were translated and analyzed again. The research shows that Arabic and English react similarly with regard to assigning theta roles. The roles of agent, theme, experiencer, goal, source and location can be assigned to English as well as Arabic. Arguments should maintain their roles undergoing a translation. Changing, adding, or deleting a role affects the intended meaning.

**Keywords:** theta roles, argument, translation, Arabic, English

### Introduction

In tracking the history, linguists have been interested in the way aspect of meaning interacts with syntactic structure for many decades. Everaert et al., (2012) attract our attention to one of the major topics that have been the focus of an ongoing investigation. It revolves around the mapping from lexico-semantic information onto syntactic structure. "Ever since Gruber (1965) and Fillmore (1968), thematic roles have been playing a central role in the transmission of lexical information crucial for syntactic structure and its interpretation" (Everaert et al., 2012, p. 1). These roles refer to the semantic relationship that a verb has with the arguments in a sentence. They were developed in the mid-60s as a way of classifying the arguments of a specific predicate. They define the role that the arguments play and determine the order in which they are merged. Moreover, we can mention what Fillmore (1977) stated about the case theory (from which he later developed the concept of frame semantics). He said that "the function of which is to provide a bridge between the description of situations and underlying syntactic representations. It accomplishes this by assigning semantic-syntactic roles to particular participants in the (real or imagined situation) represented by the sentence" (p. 61). The frame semantics stress the roles assigned by predicators to their arguments. All of this resulting in having the concept of semantic roles which we will discuss in this study.

Furthermore, as it is known that semantic roles work like a bridge between the meaning and the structure of a sentence. They have been a major area of interest among linguists (Carnie, 2006; Haegeman, 1994; Radford, 1988, 2009; Valin, 2004). Many studies have been conducted for the purpose of examining these semantic roles (Ehrich, 2003; Emonds, 1991; Fanselow, 2001; Saab, 2015). Meanwhile, some studies focused on assigning these roles across languages (Ahmed & Abdulkadir, 2013; Maisarah et al., 2016; Meetei & Singh, 2014). Regarding Arabic, Ahmed and Abdulkadir (2013) studied semantic roles (also known as theta roles) and the passive structures in Arabic and Fulfulde. They discussed the roles that can be assigned to passive

structures in the mentioned languages. For Arabic, they concluded that both transitive and intransitive verbs can take passive forms. More importantly, when the arguments move as a result of passivization, they move with their theta roles to their new positions. However, in this paper, we seek to examine the semantic roles in relation to translation. This research explores if all of the mentioned roles in English are applicable in Arabic. Moreover, it examines the effect of a predicate on its arguments across these two languages. This study seeks to explore this topic and answer the following questions:

1. What are the different semantic roles that could be assigned to the arguments in Arabic and English?
2. How are Arabic and English similar and different in terms of theta roles assigned to arguments?
3. Does translation affect the semantic roles assigned to the arguments by a predicate?

### **The Background of Semantic Roles**

The concept of theta roles is explained to us by Radford (2009). He states that "since the Greek letter  $\Theta$  (= theta) corresponds to 'th' in English and the word thematic begins with 'th', it has become standard practice to also use the synonymous expression theta-role or  $\Theta$ -role" (P. 246). Moreover, as mentioned by Everaert et al. (2012), the exact content of the theta roles has been left essentially unsettled. They "have been generally mentioned as informal labels providing a convenient classification (e.g., Grimshaw 1990)" (Everaert et al., 2012, p. 1). Later on, Everaert et al. (2012) mention that linguists, (Dowty, 1991) among others, began raising doubts about the definability of theta roles and the empirical adequacy of their classification. "By the beginning of the 1990s the achievements of theta theory were considered inadequate (Jackendoff 1987; Rappaport and Levin 1988; Dowty 1991)" (Everaert et al., 2012, p.2). However, scholars as Fillmore and Halliday acknowledge the relationship between semantics and syntax and that grammatical structures will connote no sense without meaning. Fillmore (1977) declared that about the case theory. From this theory, he later developed the concept of (frame semantics) which as stated earlier stresses the roles assigned by predicators to their arguments.

### **Significance of the Study**

This study examines assigning theta roles to arguments in Arabic and English. Particularly, it investigates whether these arguments can maintain their roles undergoing the process of translation. Moreover, it seeks to discover if changing the roles during translation would result in effecting the intended meaning. To the best of my knowledge, theta roles are not a subject of interest in Arabic; likewise, not much have been said about his topic in comparison to English. Therefore, one of the main focuses of this study is identifying the shortcoming of changing the theta roles of arguments when translating.

### **Methodology**

In this paper, a qualitative methodology was required. For the data analysis, the content analysis approach was chosen. The data will be collected from different English sources. The

collected data will be then analyzed to illustrate the theta roles assigned to the arguments. After that, the text will go through the process of translation. Then, it will be subjected to analysis again. A comparison will be made, and a conclusion will be drawn in the results and discussion section.

## Thematic Relations

In generative approach, thematic relations are particular semantic terms that describe the relation between an argument and its predicate. This is explained by Carnie (2006) as well as the difference between this concept and the concept of theta role. According to him, "theta roles are bundles of thematic relations assigned to a particular argument " (p. 220). Meanwhile, he states that "thematic relations are things like agent, theme, goal, etc." (P. 220), which are illustrated in this paper. Carnie (2006) declares that most syntacticians refer to a specific theta role by the thematic relation it contains. This is from his point of view is incorrect; however, this practice is common. Hence, it will be followed in the coming sections.

## Types of Semantic Roles in English

Many linguists (e.g., Adger, 2002; Carnie, 2006; Haegeman, 1994; Radford, 1988, 2009) have illustrated the thematic roles played by arguments in relation to their predicates. They explained the terms used in describing these roles. In this part, we will attempt to illustrate some of these roles with examples. These sentences are adopted from different sources (e.g., Carnie, 2006; Haegeman, 1994; Radford, 1988, 2009). They will be analyzed in this part for the purpose of examining the theta roles they contain.

- The initiator or performer of an action is called an **agent**.

(1) Jack hit John.

In (1), *Jack* is the one who is doing the action. He is the initiator of the hitting. For that, he is given the role of an agent by the predicate *hit*. The role of agent is usually the subject of a sentence. However, it can appear in other positions as well.

- The entity that feels or experiences an emotion expressed by the predicate is referred to as an **experiencer**.

(2) The boy likes candies.

In (2), *the boy* experiences some psychological state expressed by the predicate *like*. For that, the predicate assigns the role of an experiencer to *the boy*.

- The entity representing the destination of another entity is called a **goal**.

(3) Sara went to Paris.

In (3), *to Paris* is the destination of some other entity which is *Sara*. For that, it is given the role of a goal by the verb *went*.

- The place at which some entity is situated is called a **location**.

(4) Sara is in Paris.

In (4), *in Paris* is considered to be the location of Sara. It has a location role.

- The entity from which some other entity moves is referred to as **source**.
- (5) Sara returned from Paris.

In (5), *from Paris* is the starting point of movement for *Sara*.

- The entity undergoing the effect of some action is called a **theme**.
- (6) Sara fell over.

In (6), *Sara* undergoes the effect of the predicate which is falling. In this case, she is assigned the role of a theme.

These are the most common roles discussed by linguistics with their illustration. Moreover, in the process of dealing with theta roles, I agree with Haegeman (1994) in his following statement. "The identification of thematic roles is not always easy ... However, intuitively the idea should be clear" (p. 50).

Furthermore, for predicates, it should be cleared that they differ in the number of arguments they take. A predicate may take one argument. In this case, it is called one-place predicate. As in example (6), the predicate *fell* takes only one argument and assigns the role of a theme to it. Meanwhile, others may take two arguments which result in calling them two-place predicates. In (2) from the previous examples, the predicate *like* takes two arguments. They are an experiencer which is *the boy* and a theme which is *candies*. However, predicates could also take more than two arguments. An example is the predicate *give* and *put*. These two predicates take three arguments. For the verb *give*, it is illustrated as follows:

- (7) Sara gave the keys to Joe.

As mentioned above, the verb *give* assigns roles to three arguments. The first one is *Sara*. She has the role of an agent. The second argument is *the keys* which is given the role of a theme. The last one is *to Joe* and it has the role of a goal.

According to Chomsky, in his lecture on Government and Binding which was published in 1981, he mentioned that "each argument bears one and only one  $\Theta$ -role, and each  $\Theta$ -role is assigned to one and only one argument" (p. 36). He stated that he will refer to this as theta criterion. A principle that has been adopted in some form by many linguists (Radford, 2009; Haegeman, 1994; Carnie, 2006). To illustrate this principle, the following examples are adopted from Carnie (2006). For the verb *love*, it assigns two thematic roles which are an experiencer and a theme. It is two-place predicate that requires two arguments. Consider the following sentences:

- (8) Jack<sub>i</sub> loves John<sub>j</sub>.  
 (9) \*Jack<sub>i</sub> loves.  
 (10) \*Jack<sub>i</sub> loves John<sub>j</sub> Jason<sub>k</sub>.

For (8), it is a grammatical sentence. The sentence has two arguments which is the number of arguments required by the predicate *love*. *Jack* is assigned the role of an experiencer while *John* has the role of a theme. This sentence follows the theta criterion principle. However, (9) is ungrammatical due to the fact that it lacks a theme argument. It violates the second part of the theta criterion. In (10), it is ungrammatical as well because it has an extra argument, and the verb

*love* does not have a role for it. This sentence violates the first part of the theta criterion which is the requirement that every argument has a theta role. So, as it is mentioned by Carnie (2006), it is clear from the previous examples that the theta criterion works like a filter. In other words, it rules out the ungrammatical sentences.

### Types of Semantic Roles in Arabic

Arabic and English are two languages with different grammatical systems that distinguish them from one another. They are from two different families in which "English is an Indo-European language, while Arabic is a Semitic language" (Nofal, 2011, as cited in Al-Shujairi et al., 2015). Many studies have been conducted for the purpose of comparing and contrasting between these two languages. In this paper, we will apply the discussed theta roles to Arabic and see if they behave similarly. We will attempt to translate some of the discussed sentences from Arabic to English and vice versa. That is for the purpose of discovering the effect of translation on the roles assigned to arguments.

- The roles of **agent** and **theme**.

(11) *Daraba Ahmadun Khalidan.* ضرب أحمدٌ خالدًا.  
(Amad hit Khalid).

From the case marking of the sentence, we know that *Ahmad* is the doer and initiator of the action *Daraba* (hit). This makes him an agent. This means that an agent role can be assigned to the arguments in Arabic. For *Khalid*, he is undergoing the effect of the action (the hitting). So, he is assigned a theme role by the predicate *Darab* (hit).

- The role of **experiencer**.

(12) *Asʿda almahrjanu Ahmada.* أسعدَ المهرجانُ أحمدًا.  
(The festival pleased Ahmad).

From the case marking of the sentence, we know that *Ahmad* felt the emotion expressed by the predicate which is *alsʿadah* (pleasure). This gives him the role of an experiencer. *Almahrjan* (*the festival*) takes the role of a theme.

- The role of a **goal**.

(13) *Aʿta Ahmadu alqalama le Khalidin.* أعطى أحمدُ القلمَ لخالدٍ.  
(Ahmad gave the pen to Khalid.)

*To Khalid* (le Khaled) represents the direction to which the other entity (*alqalam*) is moving. This gives him the role of a goal. *Ahmad* is the doer of the action (*Aʿta*) which makes him an agent. *Alqalam* (the pen) is assigned a theme role by the predicate.

- The role of a **source**.

(14) *Rajʿat Hindu men almadrati.* رجعتُ هندُ من المدرسة.  
(Hind returned from school.)

*Men almadrati* (from school) represents the source of movement for another entity which is *Hind*. Therefore, it is assigned the role of a source by the predicate *Rajʿat* (returned).

- The role of a **location**.

(15) *Aqamu fe alfunduqi.* أقاموا في الفندق  
(They stayed in the hotel.)

*Fe alfunduqi* (in the hotel) represents the place at which some entity is situated. It expresses the location of some other entity (they). For that, it has the role of a location.

In the previous examples, we applied the explained roles to Arabic. These roles are agent, theme, experiencer, goal, source and location. Therefore, we can say that predicates assign semantic roles to their arguments in Arabic as well. The arguments maintain their roles when translated. Moreover, the number of arguments in a sentence differs according to the predicate. In (13), we have three arguments which are goal, agent, and theme. The verb (*a?ta*) and its translation (gave) fill the same semantic roles to the arguments. Changing the verbs used or the semantic roles filled by the arguments during translation will convey a different message. To illustrate this, we are going to use the example in (13) mentioned above:

(16) Ahmad gave the pen to Khalid.  
agent            theme            goal

If we translate it as follows:

(17) *A?ta Ahmadu alqalama le Khalidin.* أعطى أحمدُ القلمُ لخالدٍ  
agent            theme            goal

We manage to convey the message by mentioning the equivalent verb and maintaining the semantic roles assigned.

However, we may come across some translations that fail to do the same as in (18).

(18) *A?ta Ahmadu alqalama.* أعطى أحمدُ القلمَ.  
(Ahmad gave the pen.)  
agent            theme

The translation in (18) did not change the verb mentioned in (17), but it deleted one of the arguments which filled the role of a goal. In addition to that, other translations may affect the meaning by adding extra roles or changing them. An example of this can be shown by translating (19) to (20):

(19) The festival pleased Ahmad  
theme                            experiencer

If it is translated as follows:

(20) *S?eda Ahmadu fe almahrjani.* سَعِدَ أحمدُ في المهرجانِ  
experiencer            location

In (20), the translation failed to convey the intended meaning in (19). This is the result of changing the theta roles during translation. We have an *experiencer* and a *theme* role in the

original sentence. However, in the translated sentence, we have an *experiencer* and a *location* role. The change in roles affects the sentences. There is a slight difference between the meaning of the two sentences. A full consideration should be paid to the semantic roles during translation. That is for the purpose of not affecting the accuracy of the translation.

### Findings and Discussion

As stated above, Arabic and English are two distinctive languages from two different origins. Many studies have been conducted to examine the similarities and differences between them. In this paper, our focus is the theta roles assigned across these languages. From this research, we can state that, arguments get filled by theta roles in English as well as Arabic. The role of agent, theme, experiencer, goal, source and location can be assigned to arguments in Arabic in the same manner as English. Much has been said about these roles in English; however, this not the case for Arabic. Although these two languages are different, they show remarkable similarities in term of these theta roles. However, in my opinion, determining the assigned roles in Arabic is a somewhat more difficult than English. This might go back to the fact that it has not been covered as much. It might also be caused by the presence of some arguments attached to others in the same sentence or to their predicate. From my point of view, this makes determining their roles rather tricky. Furthermore, the study shows that a predicate mostly always maintains its arguments' roles undergoing an accurate translation. If translators fail to apply to this rule, it would mostly result in a slightly different meaning. They would likely fail to convey the intended meaning to the target text.

### Conclusion

Thematic role was developed as a way of classifying the arguments of a specific predicate. It defines the role they play and determines the order in which they are merged. This study focuses on examining these roles in Arabic and English. Although these two languages are from different families, to some extent, they react similarly with regard to assigning theta roles. From the research, we can state that all the explained roles in English can also be applied in Arabic. Plus, we can conclude that it is significantly important to maintain the same theta roles when translating from one language to another. This paper helps Arab learners of English to be aware of the implications of altering arguments' theta roles when translating from Arabic to English or vice versa. For Arabic, there is a lot to discover regarding this topic. An expanded study on the effect of changing the roles by Arabic-English translators could be conducted. Furthermore, a study on classifying Arabic verbs according to the theta roles they assign to their arguments is needed. As a final point, in my opinion, this is a broad field for researchers to explore. Many areas that are explained in English need to be studied in Arabic as well.

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