# الجمل الصغيرة في اللغة الإنكليزية

طالب الدراسات العليا: شروق المصطفى

قسم اللغة الانكليزية - كلية الآداب والعلوم الانسانية - جامعة البعث

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### الملخص

يقوم هذا البحث بدراسة مفهوم الجمل الصغيرة في اللغة الإنكليزية من خلال دراسة أصول هذه التراكيب واشتقاقها ويقدم تحليلاً متكاملا عن البنية النحوية لهذه التراكيب. ويطلق مصطلح الجمل الصغيرة بشكل عام على مجموعة من التراكيب التي تعبر عن كينونة خالية من العنصر الزمني وتشكّل هذ الكينونة علاقة توافقية وتطابقية بين فاعل الجملة الصغيرة وتابعه أو ما يعرف بنتمة الجملة. وتقدم هذه الدراسة تفسيراً نحوياً لاستخدام هذا النوع من الجمل وكيفية تصنيفه وفهمه ضمن نظرية الربط العاملي في النحو، وتبرز هذه الدراسة النظريات الشائعة التي تعلل تصنيف الجمل الصغيرة، وتدرس البنية السطحية أو الظاهرة والبنية العميقة أو المقدرة لهذه

# الجمل الصغيرة في اللغة الإنكليزية

الجمل. أخيرا يناقش البحث كينونة الجمل الصغيرة في اللغة الإنكليزية ويخلص إلى اعتبارها جملاً كاملة من حيث البنية والدلالة.

# **SMALL CLAUSES in English**

### **ABSTRACT**

This paper explores the concept of Small Clauses (henceforth, SC), investigating its origin and presenting a consistent analysis of the syntactic structure of these constructions. In general, the term of SCs is used to refer to a subset of constructions that express a tenseless constituent, establishing a subject-predicate agreement relation. The study is a syntactic account of the category of SCs and their occurrence within the Government and Binding framework as outlined by Chomsky (1981). It highlights the common theories that account for the category of SCs and examines the surface and deep structures clauses. Moreover, of these the paper discusses the constituency and the clausal interpretation of SCs in English. Finally, it presents evidence that English SCs are of the Agreement (henceforth, AGR) type of category and they constitute AGR Phrases as maximal projections.

Key-words: Affix Hopping, AGRP, INFL, Government Binding, Nominal Clauses, Small Clauses.

### **Small Clauses in English**

### 1. Introduction

The interest in the issue of small clause in English has intensified only in the last few decades with the rise of Transformational Grammar as a theory that cannot only describe but also explain some complex syntactic issues such as movement, deletion, insertions, SCs, etc. English clauses lacking a verb are usually referred to as SCs. Carreira et la. (2017: 289) considers a verbless clause as a "group of words which, despite the absence of an unsubordinated finite verb, is felt to constitute a complete utterance". Leech and Svartvik (1994: 214) observe that a small clause should be "treated as a clause because it performs the same function of a finite clause. It is clear that verbless clauses are originally finite ones and can be understood as having a missing verb "be" and a subject. Moreover, verbless clauses can be understood to have the same functional elements found in finite clauses as subject complement, object and adverb as illustrated in example (1) and its analysis in (2) which are adopted from Wekker and Haegeman (1985: 1):

(1) If available [subject + complement], the books will be sent to you within two weeks.

The analysis would be like the same as in (2):

(2) If they [subject] are [verb] available [subject + complement] the books will be sent to you within two weeks.

It is clear from the example in (1) that the first part of the sentence is an instance of a verbless clause as can be seen from the explanation in (2). That is, the original form of that part is *If they are available*, and it is the case that anyone who knows English understands it this way.

## 2. Objectives of the study

Verbless clauses of the form [NP XP] are a complex set of clauses and need further investigation. Therefore, one main objective of this research is to shed light on the important linguistic phenomenon of 'SCs' which constitute a major class of verbless clauses in English by exploring the term and identifying its various forms.

Another goal of the study is to present a full syntactic account of English SCs within the theoretical framework of

Government and Binding (henceforth, GB). This will be achieved through presenting a detailed analysis of the syntactic status of the constituents of SCs and investigation of their internal structure. In particular, this paper presents evidence for the need to treat SCs as full constituents both in form and interpretation.

Finally, this work aims at providing a better understanding of this kind of constructions and this may help teachers be more qualified in correctly using these clauses and teaching them to students at various levels of education (i.e., school and college).

## 3. Significance of the study

SCs in English, and verbless clauses in general, pose a problem for foreign learners of this language and for syntacticians working in this field, as well. Learners of English as a Foreign Language (henceforth, EFL) may be confused about whether they need to use a verb in these clauses or they need to keep them verbless. As for specialists, they have conflicting views regarding the syntactic status and analysis of SCs. Some linguists look at them as maximal projections of lexical heads such as nouns and adjectives, while others consider them

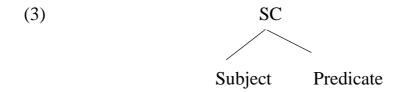
projections of functional heads such as agreement and tense. Therefore, it is significant to further investigate this concept and explore its structure in order to reach one unified account of SCs and verbless clauses.

This study is also significant as it contributes to the investigation of a controversial topic via studying examples of SCs and analyzing them in a principled manner. The research is also significant if the analysis used in this paper can be extended to account for similar verbless clauses such as nominal clauses in Arabic, given that the syntactic theory is of a universal nature. Finally, this study is useful because it may help students and teachers of English in understanding small clause constructions.

# 4. The concept of small clauses

The term 'small clause' refers to a subset of constructions that expresses a tenseless subject-predicate relation. Syntacticians did not tackle the notion of SCs until the 1980s. Small Clause theorists claim that the [NP XP] string in [V NP XP] constructions should be considered a single constituent; however, there was no final consensus on the categorical status of SCs.

The term 'small clause' was first introduced by Williams (1975), who used it to refer to the constituent schematized in (3), consisting of a subject and a predicate (but lacking tense inflection).



SCs are quite common in English. They occur as complements of verbs,

complements of prepositions as in (4a), subjects of sentences as in (4b), or even subjects of SCs as in (4c):

- (4) a. With [Heathcliff's intent on ruining him], Linton wasn't safe.
- b. [Heathcliff and Catherine in a relationship] wasn't good

for Catherine's social status.

c. Lily considered [[Heathcliff and Isabella in a relationship] bad for her]. 1

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<sup>&</sup>lt;sup>1</sup> The scope of this study does not include the analysis of these constructions, but I provided a brief view of these examples.

As explained earlier, assigning a categorial category to SCs remains a complicated issue. SCs are treated as constituents by Chomsky (1981) and Stowell (1981), among others. Nevertheless, the bracketed string as an example of small clause in cases like (5) is treated as a nonconstituent by some linguists like Schein (1982) and Williams (1983), among others:

(5) Lily considers [Catherine sensitive].

It is suggested that verbs like *consider* select a complex complement which usually has two constituents. In (5) '*sensitive*' is a property that is applied to '*Catherine*'. There is a predication relation between the two elements or constituents.

### 5. The theoretical domain of SCs

Let us consider the following set of sentences in (6a-k), which provides representative examples of constructions that have been assumed to include SCs in English:

(6) **a.** Catherine *is insane*. Copular Constructions

**b.** Catherine *seems insane*.

**c.** It seems *Catherine is insane*. ECM<sup>3</sup> Verbs

Raising Verbs<sup>2</sup>

- **d.** Heathcliff pushed **Linton** Resultatives *dead*.
- **e.** Heathcliff drank *tea cold*. Depictives
- **f.** Heathcliff made *Catherine* Causatives *die.*
- **g.** Lily heard *Heathcliff leave*. Perception Verbs
- h. There was a dog in the Existential Sentences Linton's garden.
- i. Earnshaw gave *Heathcliff a* Double Object Verbs *horse*.
- **j.** Heathcliff turned *the* Verb Particle Construction *machine of death on.*

<sup>2</sup> Raising verb constructions refer to the movement of an argument from a subordinate or embedded clause to a matrix or main clause. That is, a raising predicate / verb appears with a syntactic argument that is not its semantic argument, but is rather the semantic argument of an embedded predicate. For example, Laila seems pregnant.

<sup>&</sup>lt;sup>3</sup> Exceptional Case-Marking (ECM) is a phenomenon in which the subject of an embedded infintival verb seems to appear in a superordinate clause. In this case, the subject of the embedded clause gets Accusative Case from the matrix verb and not from the agreement elements in the embedded clause. For example, *it seems Laila is pregnant*.

**k.** With *Catherine married*, Absolute Constructions Heathcliff becomes a monster.

The italicized groups of words in this list are examples of English SCs. Each group consists of a subject and a predicate that could be nominal, adjectival, prepositional or verbal. The italicized string in (6-i) consists of two objects (rather than a subject and a predicate) as illustrated in the analysis in (7):

- (7) Earnshaw gave [Heathcliff HAS a horse]
  In other words, (7) is derived from (6-i) and it is considered a VP shell<sup>4</sup> according to Stowell (1981). Beck and Johnson (2004) explain that the main evidence results from the ambiguity of SCs containing *again*. Example (8) involves two readings: one is repetitive as in (9) and the other is restitutive as in (10):
  - (8) Mary gave Ali the book again.
  - (9) Mary gave Ali the book, and that had happened before.
  - (10) Mary gave Ali the book, and Ali had had the book before.

<sup>&</sup>lt;sup>4</sup> A VP shell is a term used to refer to a VP that is split into two projections: VP and VP where one VP is immediately dominated by another (Larsson, 1988).

Again may modify either the event of Mary giving Ali the book (giving rise to the repetitive reading) or the event of Ali having the book (giving rise to the restitutive reading). In the latter case, the adverb again modifies the small clause constituent (Ali the book).

### 6. Small clauses as constituents

In this section, the main reasons for the existence of SCs will be summarized, according to Stowell (1982), Safir (1983), Radford (2009) and Aarts (1992). They argue that in the [V NP XP] constructions the predicative [NP XP] sequence forms a unit in a sentence like *Lily considers Heathcliff vagabond*, and inside the string the NP and the XP are in a subject-predicate relation; therefore, *Heathcliff a vagabond* is interpreted as a clausal complement that looks like: *Heathcliff is a vagabond*.

The first piece of evidence for the existence of SCs as constituents comes from coordination facts. Consider (11-13):

- (11) I consider [this novel a miracle].
- (12) I consider [that novel a miracle].
- (13) I consider [this novel a miracle] and [that novel a miracle].

Coordination is a test for structure, with the help of which constituents can be identified, as generally assumed (Newson et al., 2006). Hence, the bracketed strings in (13) have to be constituents with an equal status.

Another piece of evidence comes from the possibility to have a nonreferential *it*-pronoun in the structure. (14) is an example taken from Aarts (1992: 38):

(14) I consider it a beautiful day.

In (14), *it* neither has semantic content, nor receives a thetarole from the matrix verb; therefore, it cannot be the direct object of *consider*. What is considered is not *it* but the proposition that '*it is a beautiful day*'. Thus, the main verb gives the propositional theta role to the whole sequence; hence, it has to be considered a clausal element in the structure.

A third reason for considering predicative [NP XP] strings SCs is the possibility to have sentential adverbials like 'perhaps' or 'probably' within the structure as in (15), according to Aarts (1992):

(15) I thought [that book perhaps a revolution of thought] when I read it, but its author's racism made me shocked.

The bracketed sequence [it perhaps a revolution of thought] can be paraphrased in the same environment as in (16a-c), according Aarts (1992):

(16) a. [it was perhaps a revolution of thought]

- b. [perhaps it was a revolution of thought]
- c. [it was a revolution of thought perhaps]

Thus, the presence of the sentence adverbial 'perhaps' in (16) provides further evidence for the propositional status of the examined sequence as pointed out by Aarts (1992).

Fourth, it is argued by some linguists, like Safir (1982) among others that a SC can occur in different positions. A SC can stand independently as in (17b); it can also happen to be just an adjunct as in (19); it may occur as a complement to a prepositional phrase as in (18); finally, it can be in a subject position as in (20):

- (17) a. I think John is such a smart student.
  - b. What! [SC John smart]?! Nonsense!
- (18) With [ $_{SC}$  Mary on board], the bus can now close its doors.
- (19)  $[_{SC}$  PRO<sub>i</sub> An editor by old profession], Williams<sub>i</sub> has published many articles on the life of monkeys in the jungles.
- (20) a. [ <sub>SC</sub> Catherine angry at John's behaviour] is just the everyday situation they are always living.
  - b. [SC Him here] is all I desire.

It is illustrated in example (17b), which is understood from example (17a) that the SC *John smart* in (17b) is a SC and it does stand alone as a constituent. (18) shows that a SC is the complement of the prepositional phrase headed by the preposition *with*. While in (19), the SC "an editor by old profession" functions as an adjunct, the SC in (20) is in a sentence-initial position and thus has the function of a subject. Moreover, Radford (2009) states two other tests for subjecthood of SCs. "Not-initial" and "alone-final" NPs can be found only in subject positions. Assuming this, we realize that the postverbal NPs in (21) and (22) do function as subjects of SCs.

- (21) I consider [not many men suitable for marriage].
- (22) I consider [Emily alone responsible for the crime of murdering John Smith].

The bracketed set of words are subjects; consequently, the bracketed phrases in examples, (21) and (22), above are assumed to be clauses. In (23) and (24) *not*-initial and *alone*-final phrases are not in subject position, hence they are ungrammatical:

- (23) \*I bought books from not many libraries.
- (24) \*I stole that alone.

Furthermore, movement considerations also provide evidence for the existence of the SC theory. For example, Kayne (1984) claims that the subject of a SC does not behave like an object, in opposition to complex-predicate approaches, as it does not allow movement out of the SC. Let us consider contrasts of the type given in (25a- b):

- $b. \ Which \ article_i \ do \ you \ think \ the \ second \ line \\ of \ t_i?$

Kayne (cited in Aarts 1992) also attributes the ungrammaticality of nominalizations derived from SCs, illustrated in (26a–e), to the existence of a SC boundary in the structure. This is supported by Stowell's (1983) argument related to semantic issues of the subcategorisation of verbs. Kayne assumes that verbs may govern and assign Case across SC arguments as in (26), while nouns cannot as shown by the ungrammaticality of the examples in (27)

- (26) a. John believes Ali is a master.
  - b. The girl assumed *him guilty*.
  - c. The examiner judges him well-adjusted.
  - d. Edward and his mother thought *her pretty*.

- e. Her supervisors consider her a genius.
- (27) a.\*Ali's belief a genius by John.
  - b.\*His assumption guilty by the girl.
  - c.\*His judgment well-adjusted by the psychiatrist.
    - d.\*Her thought pretty by Edward and his mother.
    - e.\*Her consideration a genius by her supervisors.

We can see from these ungrammatical examples in (27) that SCs like those in (26) do assign Case across SC boundaries while the noun phrases in (27) cannot. This means that the italicized items in (27) should not be treated as phrases but as clauses.

# 7. The structure and category of SCs

The earliest proposals regarding the analysis of SCs date back to the early eighties of the last century. Let us go through the various ways of accounting for the internal structure of SCs in (28) and (29). In (28), I provide the approaches followed by Stowell (1981, 1983); Chomsky (1981, 1986); Kitagawa (1985); Hornstein & Lightfoot (1987), Radford (2009) to account for the structure of SCs as adopted from Aarts (1992).

(28) SCs as projections of the predicate (Stowell 1981 among others)

(29) SCs as projections of a functional category
 (Adger and Ramchand 2003; Bailyn 2004;
 Citko 2011; Hornstein and Lightfoot 1987; among others)

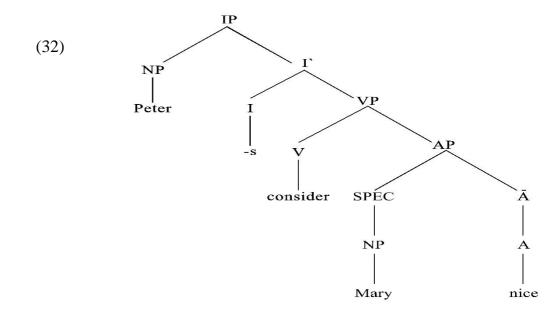
The predicate or the functional element of a SC determines both its category and its internal structure.

It was Stowell (1981) who made the first major account of the categorial status and the internal structure of SCs within the SC theory. He argues that SCs are maximal projections. The head of the SC is the predicate X; hence, SCs are *endocentric*<sup>5</sup> constituents and are the X" projections of their predicates. It is possible that a maximal projection may have a subject; therefore, SCs are argued to have subjects. The subject NP of a SC occurs in the Specifier position of XP. Thus, Stowell's representation of a SC would be as in (30) and (31), taken from Aarts (1992: 171):

- $(30) [_{XP} [_{Spec} NP] [X']]$
- (31) Peter considers [AP [Spec=NP Mary] [A' nice]]

In (31) *Mary* is the subject NP of the SC, *nice* is the AP predicate, and *Mary nice* together is the SC, i.e. the phrasal expansion of the predicate as illustrated in (32):

<sup>&</sup>lt;sup>5</sup> The meaning is within the small clause itself



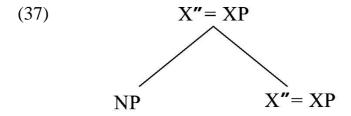
According to Stowell (1981), a matrix verb of a sentence imposes subcategorisation limits on its SC complement; that is, various verbs choose different sorts of SCs as complements. Selecting the category of the SC is affected by the category of its predicate. Consequently, the SC complement can occur as an Adjectival Phrase, a Noun Phrase, a Prepositional Phrase or a Verb Phrase. Stowell (1981) lists the following examples to illustrate his claim with adjectival, verbal and prepositional SCs as in (33-35), respectively. Nevertheless, (36) is an example of a nominal SC taken from Aarts (1992):

- (33) (a) I consider [AP John very stupid].
  - (b) \*I consider [PP John off the ship].
- (34) (a) We feared [VP John killed by the enemy].
  - (b) \*We feared [AP John very stupid].
- (35) (a) I expect [PP that sailor off the ship (by midnight)].
  - (b) \*I expect [AP that sailor very stupid].
- (36) (a) I declare [NP Mary the winner].
  - (b) \*I declare [PP Mary off the ship].

It is argued that since *consider* is grammatical with an *AP* but ungrammatical with a *PP* complement, *expect* is grammatical with a PP but not with an AP, etc. Thus, it is obvious that the main verb is sensitive to what occurs inside its SC complement.

According to Stowell (1983), the categorial status of SCs as AP, VP, PP and NP should be accepted, because if the categorial status was supposed to be S, the verb would be 'indifferent' to the categorial status of the SC predicate. However, the case is different as shown in (33-35), above. Therefore, Stowell (1983) assumes that "SCs are X-bar

projections of the lexical predicates that they contain" and "the verb is simply subcategorising for the category of SC as a whole" with the syntactic status of an AP, VP, PP or NP (Stowell, 1983: 301). Note incidentally that this is on a par with Chomsky's (1981: 169) claim that the SC node cannot be a maximal projection is due to the fact that Case must be assigned to the SC-subject. Nevertheless, Stowell (1983) suggests that the subject position has to be generalised across syntactic categories. Hence, the AP, VP, PP and NP complement phrases in (33), (34), (35) and (36), respectively, are semantic arguments of the main verb, and their subjects are Specifier position (Stowell, 1983). Stowell's (1983) assumption sounds somewhat contradictory, exactly because on the one hand, he proposes that the syntactic status of SCs is AP, VP, PP or NP, while on the other hand, he assumes that the verb subcategorises for SCs as a whole.



(38) *I want* [PP her all the way off my ship]

The illustration in (37) shows Stowell's analysis of SCs. Since he considers them to be XPs, maximal projections should be transparent to government for the subject of the SC, which is directly dominated by the XP, needs to receive Case from the left and be governed as argued by Aarts (1992). Moreover, a sentence like the one in (38) would contain two elements in the Specifier position of the PP. This makes Stowell's analysis unacceptable. Furthermore, Hornstein and Lightfoot (1987) Stowell's against argue (1981)statement about subcategorisation properties of main verbs. They claim that the ungrammaticality of (33-b) does not come from the subcategorisation restriction of *consider*, but is due to *semantic* features. If we change the context, (33-b) can become grammatical, as Hornstein and Lightfoot (1987) show in (39).

(39) The moment she sets her foot on the beach,I'll consider Mary off my ship.

Additionally, in Stowell (1983), it is also noted that the (b) sentences in (33-36) become grammatical if we insert *to be* before the predicates in the bracketed sequences. By this suggestion, the support given to subcategorisation restrictions is weakened. The second unacceptable consequence for

Hornstein and Lightfoot (1987) is that in (40) the verb *consider* subcategorises for an NP whose head is a maximal projection:

(40) I consider [NP [NP Stella] [NP a friend]].

In (40), the verb consider selects an NP whose head is an XP (maximal projection). On the other hand, Radford (1988) argues against Stowell's analysis because the later does not consider the predicate phrases of SCs maximal projections but X-bar constituents. To support this argument, the examples in (41) are provided:

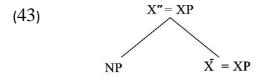
- (41) (a) I've always considered [SC Stella [NP the best player in the team]]
- (b) I've never considered [SC Stella [NP my best friend]]

In (41), the predicate phrases are considered maximal projections in opposition to Stowell's analysis. Radford (2009) points out that in (41), the bracketed predicate phrases contain determiners in each one. The function of determiners is to expand an X-bar projection into a maximal projection; consequently, it seems clear that the predicate phrase must be an XP.

In opposition to Radford, Chomsky (1981) assumes that SCs are not maximal projections. He proposes that S'-deletion is obligatory for SCs. If they were maximal projections, they would not be able to receive Case and be governed, since the maximal projection of any category is a barrier to such mechanisms. However, Chomsky (1981) does not specify the projection. Chomsky (1986) suggests that XP is transparent to government if it is L-marked (lexically -marked), or theta-governed. The rule of theta-government is illustrated in (42):

(42) X theta-governs Y if and only if X governs Y and X theta-marks Y

As required by (42), syntactic government necessitates lexical marking. As a consequence, it is not obligatory for SCs to be maximal projections. Later, Chomsky (1986) proposes that SCs are of the form XP but are analysed as adjunction structures, as the configuration in (43) illustrates:



More recent studies as explained below assign SCs a functional projection (henceforth, FP). However, the precise configuration of FP has been a matter of debate in the literature of syntax, for

it has been argued to stand for any functional categorization or a subset of which are listed in (44a–d) adopted from Citko (2011, 751):

- (44) a. IP: Aarts (1992); Hornstein and Lightfoot (1987), among others.
  - b. AgrP: Chomsky (1981), among others.
  - c. PredP: Bailyn (2004), among others.
  - d. PP: Adger and Ramchand 2003; Citko (2011), among others.

Hornstein and Lightfoot (1987) argue that SCs are not of the type XP. Their SC analysis is represented as in (45):

(45) [SC(=S) NP INFL
$$^0$$
 XP] where X = N, A or P

They state that "INFL<sup>0</sup> – which has no morphological realization can be followed by any maximal category except VP; and INFL<sup>0</sup> occurs only where S' (i.e. INFL'') is absent. SCs with INFL<sup>0</sup> heads occur only in governed positions, hence inside S."

The main problem of this analysis as claimed by Aarts (1992) is in connection with the agreement relation between the

subject and the predicate of the SC. The evidence for the necessity for such a relation can be captured in (46a-b):

(46) a. They considered [the men fools].

b. \*They considered [SC the man fools].

In example (46a), the subject agrees with the predicate in number and the sentence is grammatical, while in example (46b), the subject is singular and the predicate is plural yielding an ungrammatical sentence because the subject and predicate of the SC do not agree. The zero INFL node is an empty element; it cannot provide any agreement for the SC subject and predicate (Aarts, 1992). Another problem with the present analysis is that it specifies SCs to be neither finite, nor non-finite (Aarts, 1992). However, clauses must be marked for the feature [±finite] in English otherwise they cannot be clauses.

Radford (2009), on the other hand, claims that a SC is just a simple string of [NP XP]. He argues that SCs lack not only a COMP node, but also an INFL node. The absence of the INFL node explains the lack of agreement between the SC subject and predicate. Consider the following examples:

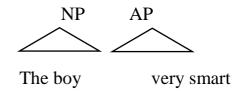
(47) a. I consider it cheap.

b. \*I didn't consider [that/if/whether/for it cheap].

- (48) a. I consider your attitude deeply respectful.
  - b. \*I consider [your attitude to deeply respectful].
  - c. \*I consider [your attitude can deeply respectful].

The example in (47-b) is obviously ungrammatical due to the presence of an overt complementizer. Consequently, SCs are S-bar constituents. The examples in (47a-b) are syntactically wrong structures — the former because of the infinitive particle to, and the latter due to containing a modal auxiliary. Both mentioned elements would be I heads; therefore, the implication of the data is the obligatory absence of inflections in SCs (Radford, 2009). If this is so, in Radford's view, SCs do not have the S status either. The lack of the presence of inflections in SCs, which carry the tense and agreement properties in ordinary clauses, SCs are assumed to contain tenseless and agreementless verbs, i.e. verbs which are marked neither for the feature [±tense], nor for the feature [±agreement] according to Radford (2009). Thus, the analysis of the bracketed sequence in (49) has the representation in (50) taken from Radford (2009:516):

(49) I consider [SC the boy very smart]

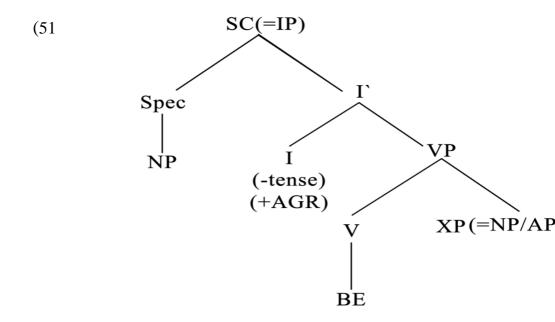


The categorial status of the overall SC is totally different from that of its subject or its predicate phrase; therefore, SCs are exocentric constructions, according to Radford (2009). That is, the main problem of his analysis is that it does not suit the X-bar framework, which is endocentric. As Radford (2009: 516) himself points out,

[The] small clause cannot be a primitive zero level category, since it is not a word-level category. Moreover, since SCs function as the Complements of certain Verbs and Prepositions, and since the Modifier Maximality Constraint tells us that only Maximal Projections can function as Complements, then it follows that Small clauses must be Maximal Projections.

On the other hand, Aarts's (1992) tries to make his proposal a synthesis of the suggestions listed in the table. In his analysis, SCs are taken to be unmarked, rather than marked, structures. He argues that SCs are not maximal expansions of phrases but

are sentential constituents. Thus, SCs have to be IPs as in Aarts (1992). The structure of SCs should look like the one in (51):



The configuration in (51) shows that the SC contains an I node as well as a VP node, which is assumed to contain a null *be*, so it must be marked for the feature [±tense]. In other words, they have to be IPs. However, marking the *I* head as [+tense] is not allowed because this would lead to assigning Nominative Case instead of Accusative Case to the SC subject. It is worthless to assume a clause without a lexically realized verb to be tensed; therefore, the I-node is necessarily marked [-tense]. In other words, the postverbal [NP XP] strings, where the NP and the

XP are in a subject-predicate relationship, are non-finite clauses (Aarts 1992). They have AGR but not TNS as their equivalent in Arabic according to Hasan (1990) and Aarts (1992). The SC subject is base-generated in the Spec of an IP; however, Aarts (1992) does not deny that it might originate in Spec, VP and then move up to Spec of IP via NP- raising. The structure also includes the non-overt copular verb be, which is positioned under the V node, taking an NP, AP or PP complement. Following Hasan (1990), I claim that the copular verb to be is not phonetically realized because its tense is [past]. The I head is located between the subject NP and the empty be, which is also marked for the [+AGR] feature and has an essential role in bringing about the agreement relation between the subject and the predicate. Let us consider the following examples as evidence for such a relation of agreement:

- (52) a. I consider [this apple a meal]
  - b. I consider [these sandwiches meals]
  - c. I consider [them mice]
  - d. I consider [them my children]
  - e. I consider [her beautiful]

- f. I consider [him handsome]
- g. \*I consider [him my wife]
- h. \*I consider [them mouse]
- i. \*I consider [it my husband]

According to Spec-Head Agreement of Chomsky (1986, 24), there is 'a form of feature sharing" similar to theta-government or sharing of the syntactic features, i.e. person, number, gender, Case, etc. Chomsky claims that the SC subject and the I head agree in certain features which are lowered onto the unpronounced verb to be in the V head position, and then transmitted to the predicate phrase. Similarly, Aarts (1992) claims that it is not the verb that moves up, but the other way round — the features lower from I to V positions. Besides Aarts' claim, I adopt Hasan's (1990) argument regarding Arabic SCs and I propose that in English SCs too, the AGR moves down to the predicate by Affix Hopping as it does in Arabic nominal clauses. This process takes place at PF as stated by Abd El-Moneim (1989). Affix Hopping is required at PF, so that the predicate is provided with its essential inflection when it is articulated.

After the process of Affix Hopping, the predicate may take one of two surface forms. The first one is an overtly inflected predicate if the latter is either an N" or an A" as expressed in the following examples:

- (53) I consider these women adults.
- (54) I consider my wife beautiful.

In example (53), the predicate 'adults' agrees with the subject *these women* in number, while in example (54) the predicate *beautiful* agrees with the subject *my wife* in gender. The second surface structure is a phonologically non-inflected X" if the predicate is a P" or a C" as illustrated in the following examples:

- (55) I consider him in the right position.
- (56) I consider that the match over.

In example (55), the prepositional phrase 'in the right position' does show up with any phonological inflection as it is the case in (56) where the C" (that the match over) is not realized with any inflection. These differences in the surface structure are due to morphological factors. However, since English is not a rich language in inflection like Arabic, the scope of examples is limited to number though there are some considerations due

to gender specifications as in (54). Reuland (1983) argues that the agreement element in INFL is basically nominal in character since it shares features, such as number, gender, person and so on, with the subject of a clause. Sometimes, the AGR lacks a host, so it becomes suppressed and thus implicit as in P", C" or ADV" predicates.

Suzuki (1988) proposes that INFL consists of at least two independent elements, Tense and AGR, the former specified for the feature [±Tense] and the latter specified for the feature [±N]. The following four types of INFL are available as basic forms of INFL in the English clausal system.

d. INFL0=[-Tense, 
$$\varphi$$
]

[+Tense] feature in (57-a) indicates the potential existence of a tense operator, which requires a certain COMP position for its interpretation to satisfy Stowell's (1982) condition restated in (58).

(58) COMP position is required for the tense interpretation of inherent tense operator in INFL.

The [-Tense] feature indicates the absence of tense operator and the relevant tense interpretation consequently depends on the semantics of a matrix verb which governs the projection of the INFL. As for the specification  $[\pm N]$  with respect to AGR, [+N] indicates the existence of AGR, while [-N] indicates the absence of AGR. A maximal projection of INFL<sub>0</sub> is the category which is referred to as 'SC'. Its projection will not be selected by COMP due to the selectional property of COMP. In other words, COMP is allowed to select only the element with the feature [+Tense]. Some explanation for the specification  $[\varphi]$  of INFL0 is in order here.  $[\varphi]$  is to be understood as indicating underspecification for the value [±N]. Suzuki (1988) assumes that the feature [±N] has relevance to the presence or absence of AGR element, and he interprets the unspecified value [φ] to be incompatible with the presence of AGR. In other words, INFL<sub>0</sub> has no realization in verbal inflection, unlike INFL<sub>1</sub> and INFL<sub>3</sub>. It also differs from INFL<sub>2</sub> in that the realization of INFL<sub>2</sub>, namely, to, requires the presence of a verbal element since to in to-infinitive might be thought a kind of bound morpheme which requires a verb, but INFL<sub>0</sub> has no

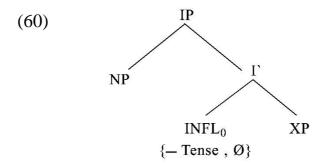
such requirement. The property of INFL<sub>0</sub> as described above does not require any particular type of categories as its complement, so that any phrasal category may, in principle, appear in the complement position of INFL<sub>0</sub>. Hence, SCs have as their predicates AP, PP, NP, or VP. A VP in its bare form can appear as a predicate of a SC in perception verb and causative verb constructions as shown below:

(59) a. I saw Bill fix the car.

b. I made Bill fix the car.

Contrary to INFL<sub>0</sub>, since the other three types of INFL require the existence of a verb and therefore its phrasal VP projection, they automatically exclude AP, PP, and NP as their complements.

To summarize, SCs are actually IP clauses headed by INFL<sub>0</sub> with the feature [-Tense,  $\varphi$ ] and that because of its phonetically null status, INFL<sub>0</sub> is allowed to take any phrasal categories like AP, PP, NP, and VP as its complements, as opposed to the other types of INFL head of clauses which require the presence of VP complements exclusively. The internal structure of SC is illustrated in (78):



In (60), we can see that an INFL specifies for an agreement relationship between the subject and the predicate. It shows the lack of [Tense] feature but still stresses the syntactic harmony of constituency in SCs. Hence, a SC does lack a verb on the S-structure. However, through the agreement feature that do appear on the S-structure, we can trace a deep relationship shared between the subject and predicate which in turn leads to the realization of verbal elements seen at the D-structure.

#### 8. Recommendations for further research

It is clear that this study is highly theoretical, rather than empirical, as it focuses on the structure and derivation of SCs in English from a transformational perspective. It presents a syntactic analysis of these constructions in a consistent way. Therefore, it will be a good idea to conduct a practical research that investigates the performance of Arab learners of English in using SCs and explore the difficulties they encounter in this

process. Another recommendation for further research is to see if there are other types of verbless clauses in English and explore the possibility of accounting for them in the same way we did in this paper.

#### 9. Conclusion

This paper provides an analysis of SCs as constituents fully recognized with a clausal interpretation. Nevertheless, with the absence of an overt verb, further examination is placed on the verbal features as an agreement relation between the subject and predicate of the SC. The analysis proceeds to consider SC constructions as instances of AGR phrases, due to the agreement facts between the subject and the predicate in these clauses. This counts as evidence for a deep connection between the subject of a SC and its predicate, something closer to a clausal connection rather than that of a phrase. The category of this constituent is to be labelled AGRP. As for its syntactic legitimacy, it was shown that the agreement features move from INFL down to the predicate via the process of Affix Hopping. This process is used to account for moving inflection

features to attach to the predicate and this explains the agreement relationship between the subject and the predicate in English SCs and this is consistent with similar conclusions about Arabic nominal clauses, and in a way it contributes to the universality of the SC theory.

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