

Towards a Cross-linguistic Typology of Copula Constructions

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1. Introduction¹

It is well known that different languages have different possible syntactic structures to encode essentially the same or similar meanings. In many cases, different constructions across languages to encode the same meaning have many similarities—for example, the most basic intransitive clause in two different languages will almost always contain a single noun phrase and a verb. Perhaps the most divergent constructions between languages are those which encode notions such as identity and classification, the copula constructions.

Copula constructions have, of course, been the focus of many studies previously—for example, the early work of Meillet (1906) and Benveniste (1950), the many language-specific papers in the series of volumes edited by Verhaar (1967-72), and the more recent semantically-based studies such as Declerck (1988) and Hengeveld (1992), as well as Stassen's (1997) typological study of intransitive predication, including (some) copula constructions.

This paper reports some preliminary findings of a cross-linguistic study of copula constructions, typologizing the range of constructions which languages may use as their most basic copula construction or constructions, and examining the patterns of case marking, constituent order and cross-referencing which are found in these constructions. It is particularly interesting to examine these features in order to establish whether there are universals in regard to the grammatical relations which the two NPs play in a copula construction. One of the aims of this project is to establish whether it is possible to claim that a language has 'a copula clause' construction, in the way in which it can be claimed that a language has 'an intransitive clause' and 'a transitive clause' construction or constructions.

2. Definitions

For the purposes of this work, a rather restrictive definition of copula construction has been adopted, to facilitate cross-linguistic comparison and enable data collection. A copula construction is defined as the most basic construction or constructions which a language uses to encode the meanings of: (a) identity of two participants normally encoded as noun phrases in that language (for example, 'that man is my father', 'that woman is Mary'); and (b)

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group membership or classification using noun phrases (for example, 'that woman is a doctor', 'that man is a teacher').

Clearly, there are various points which need to be clarified in this definition, although there is not space here to discuss many of them fully. Perhaps two which do need to be mentioned are the use of the phrases "most basic" and "normally encoded as noun phrases". A construction is considered to be less basic if there are two or more constructions essentially encoding the same information, but speakers believe that one of the two constructions (the "less basic") adds additional meaning which is missing from the first; however this is not to say that a language cannot have two or more basic copula constructions, depending on a variety of features which will be mentioned below. The second phrase, that these concepts should be "normally encoded as noun phrases" is required to exclude situations where, for example, a language may normally encode kinship concepts such as 'father' in a verb rather than a noun.

The two noun phrases in these copula constructions will be referred to throughout this paper as the Copula subject and the Copula complement. These terms (in particular the use of 'subject') should not be taken as giving any particular theoretical status to these noun phrases.

There are also, of course, many other semantic domains which a language may encode through the use of the same constructions used to encode notions of identity and group membership; for example, existence, location, possession are often encoded with this construction, and there is often formal identity between a copula verb and an auxiliary used to encode tense, aspect and other verbal features. However this study is restricted to the encoding of identity and group membership, for reasons of data collection and comparability. (For examples of the range of meanings encoded by copulas, see Declerck 1988; Hengeveld 1992.)

3. Copula construction strategies

The data on which this study is based come from grammatical descriptions of approximately seventy languages. The sample is not a statistically valid random sample of languages, because of the difficulty of finding complete and reliable information on the constructions used to encode identity and classification in many languages. However a range of typologically diverse languages has been examined, including languages from all inhabited continents and major language families.

Four strategies have been found which languages use to encode identity and group membership relations. Approximately half of the languages in the sample have only one copula construction, while the others have two or sometimes three different constructions. The choice of construction in these cases depends upon discourse and grammatical factors such as tense and aspect, polarity, the status of the clause as main or subordinate, the person of the

Copula subject, and the semantic relation expressed (identification or classification).

3.1 Verbal copula construction

A very common strategy which languages use to encode copula relations is a copula verb, similar to the English *be*. This is an element which is verbal and is present in a copula construction in addition to the Copula subject and the Copula complement. It is quite common for a copula verb to have somewhat different morphological possibilities compared with other verbs.

Examples of these constructions are:

- (1) *ten chłopiec jest moim uczniem*
 this.NOM boy.NOM is my.INSTR pupil.INSTR
 ‘This boy is my pupil’ (Polish, Comrie 1997:40)
- (2) *è-à-ra-ɪ ɲesì ɛkapɪlanì*
 3-PA-be-A he.NOM witch
 ‘He was a witch’ (Turkana, Dimmendaal 1983:76)

3.2 Particle copula construction

Some languages have a copula construction similar to the preceding, consisting of a Copula subject and a Copula complement plus an additional word, but where this word is not a verb. Most often, this additional word does not inflect, and consequently this construction will be called a particle copula construction; in some languages, however, this word does inflect, but for categories different from those of the verb. Examples of this construction are:

- (3) *is docht'ir È*
 COP doctor he.ACC
 ‘He is a doctor’ (Modern Irish, Doherty 1996:2)
- (4) *hɛn da dɪ Gaam.*
 he COP the chief
 ‘He’s the chief’ (Saramaccan, McWhorter 1995:349)

3.3 “Inflectional” copula construction

A third possible construction which languages use to indicate copula relations will be referred to here as an “inflectional” copula construction. In this construction, a language “treats the Copula complement as though it were a verb”—although this expresses it in an extremely imprecise fashion.

The important point is that in this sort of construction the Copula complement is inflected in a way which is somewhat similar to that in which verbs are normally inflected. In some cases, the Copula complement is in fact a verb derived from a noun in these constructions. For example, in West Greenlandic (Fortescue 1984) a suffix *-u-* is applied to a noun to derive a verb ‘to be Noun’, and this derived verb has all of the usual verbal properties. In

other cases, there are simply similarities between Copula complements and verbs. For example, in Pipil, spoken in El Salvador (Campbell 1985), verbs take prefixes indicating the person and number of their subject; and in some copula constructions, the Copula complement also takes prefixes which indicate the person and number of the Copula subject. However, the Copula complement is not a derived verb, and its behaviour is distinct from that of verbs, in that it cannot undergo verbal derivations, and so forth. The inflections which are used on the Copula complement in this case are identical to those on a verb; however this is not necessary for a construction to be treated as an “inflectional” copula, provided that they indicate (some of) the same categories as are indicated on the verb and are not normally indicated on nouns.

Examples of “inflectional” copula constructions are:

- (5) *ni-ta:kat*
1SGSUBJ-man
‘I am a man’ (Pipil, Campbell 1985:54)
- (6) *ben ^ğretmen-im*
I teacher-1SG
‘I am a teacher’ (Turkish, Geoff Haig, personal communication)

3.4 “Zero” copula construction

The final type of copula construction which a language may have is the “zero” copula construction, in which the Copula subject and Copula complement are simply juxtaposed, with no overt morphological material indicating the nature of the relationship between them.

Clearly there are a wide variety of issues here, such as the difficulty of recognizing a construction with no morphological material; deciding between what Bally (1920) called zero signs, understood copulas and elided copulas; distinguishing analytically between an “inflectional” copula and a “zero” copula in languages with no verbal morphology; whether a “zero” copula construction consists purely of two NPs, or whether there is a pause between them or specific intonation; and so on. However these complications cannot be dealt with here.

Examples of this construction are:

- (7) *pakarli maparnpa*
man.ABS sorcerer.ABS
‘The man is a sorcerer’ (Watjarri, Douglas 1981:238)
- (8) *Sara mora*
Sara teacher
‘Sara is a teacher’ (Modern Hebrew, Junger 1981:122)

3.5 Discussion of typology

A wide range of issues relating to this classification could be debated, but there is space here to mention only a few of them; in particular, the distinction between verbal and particle copulas, and “inflectional” and “zero” copulas.

The assignment of an additional word in a copula construction to the class of verbs or not depends on language-internal word-class criteria. As noted above, it is often the case that a verbal copula is a slightly defective verb, and in this case, and in languages such as Mandarin Chinese where there is little or no morphology, distinguishing whether or not this additional word is a verb or a particle is not always easy and in some cases may be impossible. In the data used here, I depend purely on the analysis in the available material—if the author says the word is a verb, I assume a verbal copula construction; if the author says it is not a verb, I assume a particle copula construction.

More complex still is the distinction between “inflectional” and “zero” copulas. In particular, in a language with no verbal morphology, is an unmarked Copula complement being treated like a verb in an “inflectional” copula construction, or simply unmarked in a “zero” copula construction? In this typology, such a case is considered to be a “zero” copula construction unless there is evidence of an “inflectional” copula construction, such as an “inflectional” copula in some other person/number/tense combination and the expectation of a lack of inflection in the appropriate circumstances.²

4. Case, constituent order and cross-referencing

Having categorized the various copula constructions into different types, it is important to look at what morphological and syntactic properties the different types have, and which properties, if any, are shared across the types. Ideally, this would involve an examination of the grammatical relations of the two NP arguments, the Copula subject and the Copula complement; and grammatical relations should, of course, be established on the basis of shared syntactic behaviour (cf. Andrews 1985). Unfortunately, however, there is almost no information available for the majority of languages to indicate the syntactic properties of these NPs, and all that is available is morphological information—case marking, constituent order and cross-referencing, for those languages for which these are relevant concepts.

4.1 Case marking

For those languages in the sample in which case marking occurs, the type of case marking found on the Copula subject and the Copula complement is given in Table 1. In the majority of languages, in fact, the case marking which is used on both Copula subject and Copula complement is unmarked, and is identical to the case marking used on intransitive subjects (S); however in

² Thus, for example, Turkish clearly has an “inflectional” copula, as can be seen in example (6) above; however a “zero” inflection would be expected in the third person singular, and consequently this is treated as an “inflectional” copula construction, even though formally speaking it appears to be a “zero” copula construction.

some languages, S is marked, and thus ‘unmarked’ and ‘marked in the same way as S’ can be distinguished, as shown in the table.

Table 1. Case marking in copula constructions.

	Copula subject	Copula complement
Verbal copula construction	as S	(a) as S (b) unmarked (c) other case (e.g. Equative)
Particle copula construction	unmarked	unmarked
“Inflectional” copula construction	as S	unmarked
“Zero” copula construction	as S	unmarked

The exact status of ‘unmarked’ case—whether it is formally unmarked or functionally unmarked and used, for example, in citation forms—is a complex issue which cannot be dealt with here.

For many languages the unmarked case of Copula subject in particle copula constructions, distinct from the marking of S, could be considered to be historically based. Many of these constructions have come, historically, from an earlier “zero” copula construction together with a resumptive pronoun—essentially, they are a grammaticalization of ‘John, he teacher’ (cf. Li & Thompson 1977). However this explanation does not always hold; for example, it is unable to account for the unmarked (accusative) Copula subject used in the Irish particle copula construction (see example (3) above), where the copula particle has historically developed from a true verb, yet the copula construction has precisely the case marking of other particle copula constructions, not that of verbal copula constructions.

There are a few languages which appear to be exceptions to the case marking regularities above. In particular, several languages of California, including Wappo (Li, Thompson, & Sawyer 1977) and Mojave (Munro 1976), have a marked case used for S, while the Copula subject in these languages is unmarked and the Copula complement is marked with the same case as S, whether there is a verbal copula or a “zero” copula construction. However younger speakers of Mojave are now using the same marked case for Copula subject as for S; and in both languages the copula verb is highly unusual, and may in fact be somewhere between a particle and a verb; this indeterminate status appears to correlate with the unusual case marking.

4.2 Constituent order

The relative order of elements in copula constructions could be expected to follow one of two patterns of constituent order. There are two nominal elements in copula constructions, and so it might be expected that the constituent order in copula constructions would follow the constituent order of the elements in a transitive clause, with the Copula subject and Copula complement following the order of transitive subject (A) and object (O)

respectively. Alternatively, the Copula complement is in some sense the semantic predicate, and thus the relative order of Copula subject and Copula complement might follow that of intransitive subject (S) and the verb. In fact, as can be seen in Table 2, both of these are possibilities, depending on the construction type.

Table 2. Constituent order in copula constructions

	Copula subject	Copula complement
Verbal copula construction	as A	as O
Particle copula construction	as S	as intransitive verb
“Inflectional” copula construction	as S	as intransitive verb
“Zero” copula construction	as S or as A	as intransitive verb or as O

For verbal copula constructions, the Copula complement is normally next to the copula verb, and the relative order of Copula subject and Copula complement-plus-verb is then identical to that of S and an intransitive verb. However, if O is not next to the verb in transitive sentences, neither is the Copula complement in copula sentences; the copula verb is in the same place relative to Copula subject and Copula complement as a transitive verb is to its two arguments. The relative order of Copula subject and Copula complement always parallels that of A and O.

In particle copula constructions, the particle is always next to the Copula complement. The relative order of Copula subject and Copula complement then reflects the order of S and intransitive verb.

For “inflectional” copula constructions, the relative order of Copula subject and (inflected) Copula complement always parallels that of S and (inflected) intransitive verb.

The status of constituent order in “zero” copula constructions is perhaps most interesting. In the majority of languages, of course, the relative order of S and intransitive verb is identical to that of A and O; and in these cases, the order of Copula subject and Copula complement is identical to both of these orders. However, there are a few languages where the relative order of A and O is distinct from that of S and intransitive verb. In all of the descriptions of these languages, if they have a “zero” copula construction, it is explicitly stated that Copula subject and Copula complement may occur in either order. That is, it could be suggested that languages associate Copula subject and Copula complement with S and an intransitive verb respectively, but also with A and O respectively. When the order of S and a verb mirrors that of A and O, this is the order used for Copula subject and Copula complement. However when the order of S and verb is in conflict with the order of A and O, the order of Copula subject and Copula complement may follow either pattern, depending perhaps on pragmatic features.

4.3 Cross-referencing

Cross-referencing is generally only relevant for verbal copula constructions and “inflectional” copula constructions. In both cases, cross-referencing only refers to the Copula subject argument, not the Copula complement argument, even if the language does allow two or more arguments to be cross-referenced. In general, the cross-referencing used is identical to that used to cross-reference S on verbs (if there is a split-S system, S_o). In a few cases the forms of the cross-referencing are distinct, but still refer to the Copula subject (for example, Ainu (Refsing 1986) cross-references the Copula subject on the verbal copula using the forms it otherwise uses with postpositions and to cross-reference A on transitive verbs).

There is one case of a particle copula which cross-references. In Hausa the particle copula marks gender (unlike verbs). If the genders of Copula subject and Copula complement are distinct, standard Hausa marks the gender of the Copula subject on the particle; however in spoken Hausa, speakers tend to mark the gender of the more salient of the two noun phrases, often in fact that of the Copula complement (Paul Newman, personal communication).

5. Conclusion

It has been shown above that there are cross-linguistic similarities in morphological behaviour of the Copula subject and Copula complement in particular copula construction types. However, it has also been shown that there are differences in the morphological behaviour of these elements in different construction types.

This means that while it may be reasonable to talk about, say, a Copula-subject-of-a-verbal-copula or a Copula-subject-of-a-“zero”-copula, it is not possible to treat Copula subject or Copula complement as unitary categories. Within one language, the Copula subject may have entirely different morphological properties depending on whether it is Copula-subject-of-a-verbal-copula or Copula-subject-of-a-“zero”-copula, making Copula subject and Copula complement meaningless as grammatical relations within that language and thus cross-linguistically.

In some languages, of course, there are fixed associations; for example, in English it seems clear that morphologically (and syntactically) the Copula subject is always treated in the same way, and is also treated in the same way as other subjects. However the variety of possible treatments of Copula subject and Copula complement suggest that these categories may be of limited use cross-linguistically.

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