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A PHASE EXTENSION APPROACH TO DOUBLE OBJECT CONSTRUCTIONS – EVIDENCE FROM MODERN GREEK[1]

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Abstract:

This article examines A-movement (a)symmetries in the double object construction in Modern Greek. Two types of double object constructions are attested in this language, the dative construction and the double accusative construction. These constructions, which are analysed as low applicatives, differ with regard to (i) the Case marking of the Goal, (ii) A-movement properties of Themes and (iii) formation of adjectival passives with Goal externalisation. The article shows that (i)-(iii) are interrelated phenomena in Greek and can be accounted for by exploiting recent findings on phases, namely *phase extension* whereby a phase expands as a result of movement of the phase head. The phase extension approach to double object constructions illustrates that head movement interacts with locality and that long passives can be licensed without phase EPP-features or multiple Specifiers. The article also dwells on the controversial issue concerning the quirky Subject status of fronted dative Goals in Greek and shows that the phase extension approach, in which dative clitics are analysed as phonetic realizations of applicative heads, supports the quirky Subject reading of fronted dative Goals.

keywords: *Modern Greek, double object constructions, applicatives, phase extension, A-movement, passivization, quirky Subjects*

1. Introduction

This article discusses symmetric and asymmetric passives in double object constructions (DOC) (see McGinnis 2001, Anagnostopoulou 2003, Doggett 2004 and Citko 2008 for recent discussion). The article shows, on the basis of Modern Greek, that the applicative head (APPL) introducing Goals can be parameterised as negative or positive in terms of head movement properties and that the movement parameter of APPL accounts for A-movement (a)symmetries. More specifically, I argue that APPL heads a phase in the sense of Chomsky (2000, 2001, 2004) and that head movement of APPL to the root verb triggers *phase extension* (Den Dikken 2006, 2007; Gallego & Uriagereka 2007).[2] Phase extension, in turn, licenses long passives. In the absence of head movement of APPL, phase extension is suppressed and only short passives are legitimate. This way of reasoning revives, in a sense, Chomsky's (1995) notion of minimal domains and equidistance, specifically the aspect that equidistance can come about via head movement (cf. Ura 1996, Anagnostopoulou 2003).

The current proposal highlights an alternative view to A-movement in DOCs whereby A-movement (a)symmetries are handled without reference to phase EPP-features or multiple Specifiers. In fact, the approach discussed in this paper renders these poorly understood concepts redundant. The latent problem concerning learnability, associated with multiple Specifiers (Mohr 2005 and others) is thus avoided. The phase extension approach also abolishes the need for two distinct serializations for Goals and Themes, supporting a Universal Base Hypothesis instead (cf. Kayne 1994). These virtues render the phase extension approach more restrictive and economic than

[2] The current proposal deviates slightly from den Dikken's (2006, 2007) original view concerning phase extension, primarily because I adopt a less restrictive version of the Phase Impenetrability Condition (PIC) according to which phases are evaluated at the next phase level (Chomsky 2001, 2004).

its recent predecessors (McGinnis 2001, Anagnostopoulou 2003, Doggett 2004, among others) and therefore more attractive in light of the principles of Universal Grammar and language acquisition.

The article is structured as follows. I begin with a cursory description of the Modern Greek DOC, which consists of two types, one where the Goal is realized as dative and another where the Goal is accusative. In addition to the Case marking of the Goal, these constructions differ in terms of long passives, clitic doubling and derivation of adjectival passives with Goal externalisation. In Section 3. I defend a low applicative analysis of Greek DOCs and propose that the applicative phrase is a Small Clause and a phase. I then present the mechanism underlying phase extension and demonstrate that phase extension derives all the key features associated with the Modern Greek DOC. Finally, I discuss potential typological extensions of the proposed analysis.

2. The double object construction in Modern Greek

The discussion in this article is restricted to Recipient DOCs[3], which, following Anagnostopoulou (2001), I assume to consist of two subtypes: one where the Goal is

[3] Beneficiary DOCs are not discussed in this article; these constructions involve theoretical peculiarities of two sorts: first of all, Greek Beneficiary DOCs display some affiliation with the prepositional dative construction in that they usually involve the presence of an adposition (the counterpart of *for* in English). Prepositional datives, however, are not DOCs (Anagnostopoulou 2003) and therefore fall out of the scope of this paper. Secondly, Beneficiary DOCs subcategorise for events and the class of verbs they are compatible with is substantially less constrained semantically than DOCs involving Recipients/Goals. These facts suggest that Beneficiary DOCs do not entail transfer of possession and thus pattern with Pylkkänen's (2002) *high* (rather than *low*) applicatives. Therefore, Beneficiary DOCs differ both

realized as dative (syncretic with genitives in Modern Greek) and another where the Goal is realized as an accusative. Themes are always realized as accusatives in the active voice. The former variant is referred to as "the dative construction" and the latter as "the double accusative construction".

2.1. The dative construction

The dative construction involves a dative Goal and an accusative Theme. The construction is exemplified in (1) with the verb *díno* 'to give':

(1) édosa tis Marías éna tetrádio
I-gave the Maria.DAT a notebook.ACC
'I gave Maria a notebook'

The DOC-status of the dative construction in terms of the familiar Barss & Lasnik (1986) battery of diagnostics has been convincingly established in E. Anagnostopoulou's work (2001, 2003). Greek dative Goals have been shown to display animacy effects and they also c-command Themes asymmetrically (Anagnostopoulou 2003, Bowers & Georgala 2007 and Kupula 2008, among others). Dative Goals are also interpretable as Possessors of the Theme (cf. Stowell 1981, Harley 2002, Pylkkänen 2002, Kupula 2008, among others).

The Case features of Greek dative Goals have been characterized as "semi-inherent" in that they undergo clitic doubling (signals structural Case in Greek) but do not

semantically syntactically from Recipient DOCs and considerations of space disallow me to embark on a more detailed analysis of this construction. See Anagnostopoulou (2005) for detailed discussion.

alternate with nominatives (signals inherent Case) (Anagnostopoulou 2003, Kupula 2008: 33). Although dative Goals do not alternate with nominatives, they can be fronted, in which case they retain the dative Case features. Native speakers report that clitic doubling of the Goal is strongly preferred in this environment. In the post-movement configuration, the verb continues to induce agreement with the retained nominative Theme in φ-features (as in Icelandic passives with quirky Subjects; Zaenen *et al.* 1985 and related literature):

(2) a. tis Marías$_i$ tis$_i$ dóthikan hártes
the Maria.DAT CL were-given maps.NOM
'Maria was given maps'
b.#tis Marías dóthikan hártes
the Maria.DAT were-given maps.NOM

There are indications that the fronted dative Goal in (2) undergoes A-movement to Spec,TP or at least passes through this position and checks the EPP feature of T (the Case feature of T being checked by the postverbal Theme, cf. Anagnostopoulou 2003). Therefore, the dative can be treated as a quirky Subject (as in Icelandic; Zaenen *et al.* 1985).

The latter issue is controversial, however. Anagnostopoulou (1999, 2003) argues, based on anaphoric binding, gapping under identity with nominatives and control of PRO, that only dative Experiencers (attested with Belletti & Rizzi's 1988 Class III psychological predicates) are quirky Subjects in Greek. Consider (3), which also

illustrates that preverbal dative Experiencers, too, are associated with clitic doubling, just like dative Goals in (2a) (Anagnostopoulou 1999):

(3) tis Marías ??(tis) arési to krasí
the Mary.DAT CL.DAT pleases the wine.NOM
'Mary likes the wine' (lit. "the wine pleases Mary")

Given the Case marking of the Experiencer and the clitic doubling associated with preverbal dative Experiencers, the Goal in (2a) and the Experiencer in (3) display identical behavior. This is unsurprising because that Goals *are* fairly often Experiencers (Stowell 1981, Reinhart 2002); see also Mohanan & Mohanan (1990) and Kemmer & Verhagen (1994), among others, for general cognitive and functional-typological remarks. In what follows, I reapply Anagnostopoulou's (1999) battery of diagnostics (anaphoric binding, gapping under identity with nominatives and control of PRO) and illustrate that dative Goals and dative Experiencers behave alike also in terms of quirky Subject properties.[4]

To begin with, Anagnostopoulou (1999) claims that only dative Experiencers can bind anaphors. This argument is inaccurate, because the "ungrammaticality" of constructions like (4b), from Anagnostopoulou (1999), is clearly of pragmatic rather than syntactic character:

[4] The discussion that follows might strike the reader as a lengthy parenthesis. However, establishing that dative Goals pattern with dative Experiencers in terms of quirky Subject properties is important for the correct theoretical understanding of the analysis that follows in 3.2.

(4) a. tis Marías$_i$ $^{??}$(tis) arési o eaftós tis$_i$

the Mary.DAT CL.DAT please the herself.NOM her

'Mary pleases herself'

b. tis Marías$_i$ $^{??}$(tis) mílise o eaftós tis$_i$

the Mary.DAT CL.DAT spoke the herself.NOM her

'herself spoke to Mary' (* in English, but OK – pragmatic considerations aside – in Greek)

Fronted dative Goals pattern with dative Experiencers also in allowing gapping under identity with a nominative Subject in the second conjunct (*contra* Anagnostopoulou 1999):

(5) a. tis dothike éna metállio kai [-] hárike

CL.DAT was-given a medal and became-happy

'she was given a medal and (she) became happy'

b. tis arési i musikí allá [-] sihénete to podósfero

CL.DAT please music but hates the football

'she likes music but (she) hates football'

The example in (6a) furthermore illustrates that dative Goals pattern with dative Experiencers in the ability to control a PRO (only attested with some participles in Modern Greek due to lack of infinitives). The example in (6b) where the same phenomenon is illustrated for a dative Experiencer, comes from Anagnostopoulou (1999):

(6) a. [akúgontas PRO_i óla aftá] mu_i dimiurjíthikan erotimatiká politikís físeos
hearing PRO all this me.DAT was-created questions political character.GEN
'having heard all this, I came to think of questions of political character'

b. [akúgontas PRO_i tin istoría], tis Marías$_i$ árhise na min tis arési o Pétros
hearing the story the Mary.DAT began not CL.DAT please the Peter.NOM
'having heard the story, Peter started not to appeal to Mary'

Having clarified somewhat the grammatical function of fronted dative Goals in passives (particularly the fact that they pattern with Experiencers and are associated with many behavioral characteristics of quirky Subjects), a note on Themes is in order. Themes, which surface as accusatives in the dative construction, as in (1), alternate with nominatives in passives. Long passives are thus legitimate in Greek. Passivization of Themes patterns with the EPP-driven movement of dative Goals in that the construction considerably improves with a concomitant clitic doubling of the Goal, as in (2a) (see also Markantonatou 1994 and Anagnostopoulou 2003 for extensive discussion on this phenomenon):

(7) a. o hártis tis$_i$ dóthike tis Marias$_i$
the map.NOM CL was-given the Maria.DAT
'the map was given Maria'

b.#o hártis dóthike tis Marias[5]

the map.NOM was-given the Maria.DAT

'the map was given Maria'

We conclude this section with Anagnostopoulou's (2001) observation (see also Levin & Rappaport 1986) that verbs associated with the dative construction systematically fail to produce well-formed adjectival passives with Goal externalization (see Anagnostopoulou 2001 for extensive discussion and more examples which even include nominalizations):

(8) a. harízo tu pediú éna podílato

I-donate the child.DAT a bicycle.ACC

'I donate the child a bicycle'

b.*éna harisméno pedí

a donated child

In light of the data presented above, it can be concluded that the dative construction is a "symmetric" DOC in allowing A-movement of both Goals and Themes (but only Themes check Case at Spec,TP). Dative Goals do not check Case at Spec,TP but reside in (or pass throught) this position as quirky Subjects. Symmetry is thus defined in terms

[5] Anagnostopoulou's (2003) judgment concerning the grammaticality of this construction is "?*". The data is subtle, however. Although native speakers agree that the presence of the clitic improves the construction, one of my anonymous reviewers is certainly accurate in pointing out that the absence of the clitic does not render the construction ungrammatical, contrary to what could be inferred from Anagnostopoulou's (2003) discussion. I return to discuss this phenomenon in 3.2.1.

of A-movement to Spec,TP and dissociated from actual alternation with nominatives. Clitic doubling of Goals is a central subsidiary ingredient in the A-movement of both arguments. Verbs associated with the dative constructions furthermore produce ill-formed adjectival passives with Goal externalization.

2.2. The double accusative construction

The double accusative construction, only available for a handful of ditransitive verbs including *didásko* 'to teach', *servíro* 'to serve' and *plirόno* 'to pay', differs from the dative construction in that Goals and Themes are both realized as accusatives, (9):

(9) didásko to pedí mathimatiká

I-teach the child.ACC mathematics.ACC

'I teach the child mathematics'

Like datives, accusative Goals display animacy effects and c-command Themes asymmetrically (Kupula 2008: 39). As accusatives, they also alternate with nominatives in passives; always, however, *without* concomitant clitic doubling of the Goal, (10b). Furthermore, long passives are strictly disallowed, (10c):

(10) a. o Jánnis dídakse tus fitités mathimatiká

the Jannis taught the students.ACC mathematics.ACC

'Jannis taught the students mathematics'

b. i fitités *(tus) didáhtikan mathimatiká

the students CL were-taught mathematics.ACC

'the students were taught mathematics'

c.*mathimatiká didáhtikan tus fitités

mathematics were-taught the students.ACC

'mathematics were taught the students'

Double accusative verbs differ from dative verbs also regarding the formation of adjectival passives with Goal externalization. Anagnostopoulou (2001) points out that double accusative verbs produce well-formed adjectival passives with Goal externalization:

(11) a. énas prósfata servirisménos pelátis

a recently served customer

b. mia kalá didagméni táksi

a well taught class

Therefore, the double accusative construction is an *a*symmetric DOC in which only short passives are legitimate. Double accusative verbs also produce well-formed adjectival passives with Goal externalization.

Having presented the relevant data, I now proceed to the theoretical apparatus to be exploited in its analytical investigation in 3.2.

3. The syntax of Greek DOCs

3.1. General remarks

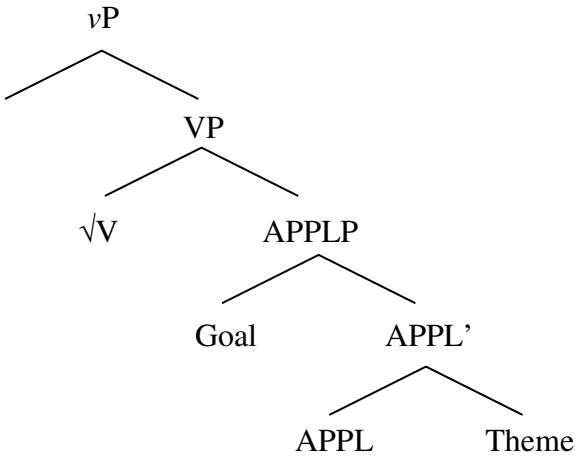
Following seminal insights in Baker (1988) and Marantz (1993), Greek DOCs are treated as recipient applicatives. I also adhere to Pylkkänen's (2002) height parameter on APPL, i.e. the insight that APPL can be either "high" or "low", depending on whether it subcategorizes for individuals (low APPL) or events (high APPL). Applicativized verbs are treated in accordance with the general principles of Distributed Morphology (Halle & Marantz 1993, Marantz 1997, Embick & Noyer 2001, Hale & Keyser 2002, among others), according to which APPL (probably a light verb, see Marantz 1993, 1997; Kupula 2008, or a "pro-verb", Bittner & Hale 1996) merges with an acategorial root, denoted henceforth as "√V" for descriptive purposes. Whether or not APPL-to-√V movement is invariably overt, is discussed in more detail in 3.2.

There are strong indications that Greek Recipient DOCs are *low* applicatives: Greek Recipient DOCs are consistently associated with a semantically restricted set of predicates (especially the double accusative variant) and entail the familiar possessive relation between the two objects. Greek double object verbs also test positive for Pylkkänen's (2002) most important diagnostic for low APPL, namely unsuccessful applicativization of unergatives[6]: as recently shown in Kupula (2008:54-56), unergative roots systematically resist applicativization in Greek. These facts allow us to posit the

[6] Pylkkänen's (2002) other diagnostic for low/high APPL, depictive predication (supposed to be licit for high APPL but ungrammatical with low APPL) turns out to be substantially more controversial (Peterson 2007, Kupula 2008:67-68). It has been reported in the literature that depictive predication depends on a wealth of factors such as the presence (or not) of sentential negation (Simpson 2005) or adverbial modification (Pijnenburg 1991). With these facts in mind, depictive predication might be totally insensitive for the height of APPL (high or low).

following syntactic representation for Greek Recipient DOCs (Diaconescu & Rivero 2007 argue for a similar parse for Rumanian):

(12)

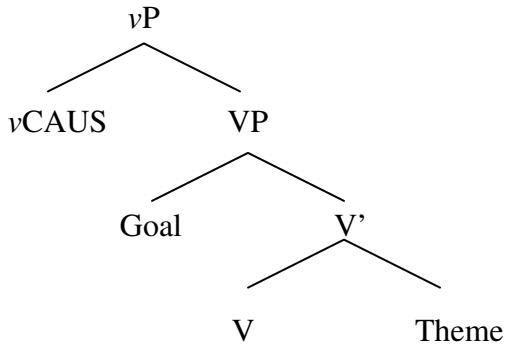


Following McGinnis (1998) and Anagnostopoulou (2001), I assume that APPL bears a Case-theoretic relation both to the Goal and the Theme. APPL checks the Case of the Theme (accusative in Greek) and also embodies a "morphological dative Case specification" (McGinnis's 1998 "m-Case"), thematically linked to its Specifier (the Goal). Therefore, Goals check structural Case against *v* and furthermore receive an inherent dative Case specification from APPL. This explains the "semi-inherent" Case-theoretical status of Greek dative Goals discussed briefly in 2.1. I return to discuss the precise nature of the licensing of the dative Case in 3.2.4.

The hypothesis I will explore in this paper is that the structure depicted in (12) is employed both for the dative construction *and* the double accusative construction (cf. Bowers & Georgala 2007). This claim contrasts with earlier views like Anagnostopoulou (2001), according to which the syntactic structure of double accusative constructions differs from that of dative constructions, the distinctive

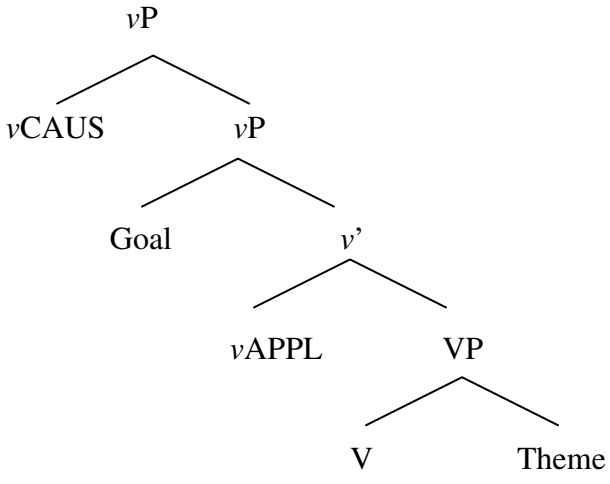
characteristic being presence vs. absence of APPL. According to Anagnostopoulou (2001), APPL is absent in double accusative constructions:

(13) *Greek double accusative construction* (Anagnostopoulou 2001)



In the dative construction, APPL is present. Anagnostopoulou's (2001, 2003) view on the dative construction replicates the Marantzian (1993) parse:

(14) *Greek dative construction* (Anagnostopoulou 2001)



The absence of APPL in double accusative constructions is undesirable with the methodological background established in Baker (1988) and Marantz (1993) – to which

Anagnostopoulou (2001) adheres – namely that double object constructions are recipient applicatives. Anagnostopoulou does, however, offer some empirical motivation for this claim. Recall that double accusative constructions differ from dative constructions in producing well-formed adjectival passives and nominalizations with Goal externalisation (see the examples in (8) and (11)). Anagnostopoulou deduces these differences with reference to a morphosyntactic principle known in the literature as *Myers's Generalization* (Myers 1984, Pesetsky 1995, Hale & Keyser 2002, among others):

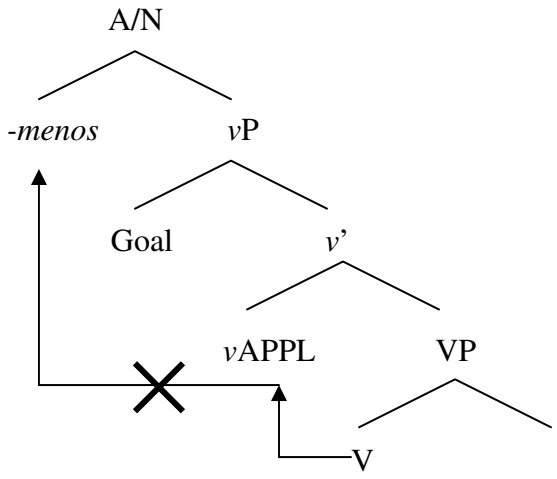
(15) *Myers's Generalization*:

Zero-derived words are not receptive for additional derivational morphemes.

Under the assumption that (15) is operative in Greek, the ungrammaticality of constructions like (8b) is deducible from a violation of (15) due to zero-derivation[7]:

[7] Anagnostopoulou's analysis might predict that adjectival passives with Goal externalization are well-formed in languages where APPL-derivation is overt. Unfortunately, this kind of data is not discussed in Anagnostopoulou (2001). On the other hand, it is not self-evident that "overt" applicative morphemes exist as functional heads. Overtness of APPL-derivations might simply be a result of a phonetic realization of a zero-morpheme due to an independent principle of the grammar (APPL would be null by default). As discussed in 3.2.2. APPL can be overt also in Greek, depending on whether external arguments are projected.

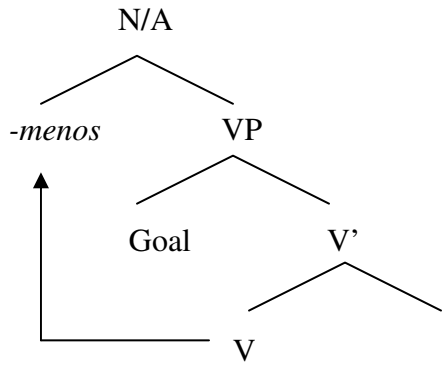
(16)



yielding: *haris-0*méno pedí* (a donated child)

In the absence of APPL, √V avoids zero-derivation, and offenses to (15) are circumvented. Consequently, double accusative verbs obtain as felicitous derivational input for adjectival passives with Goal externalization:

(17)



yielding: *didag-ménos fititís* (a taught student)

There is, however, an alternative account for the well-formedness of adjectival passives with Goal externalization which does not require the absence of APPL in double accusative constructions. The essence of the alternative proposal is that APPL is present

in both dative and double accusative constructions, but only interferes with √V in the former.

The line of reasoning goes as follows: presupposing the validity of the Small Clause analysis of DOCs (Kayne 1984, Hoekstra 1988, Den Dikken 1995, Harley 2002, among others), I follow Den Dikken (2006) in assuming that Small Clauses, as loci of predication, are phases[8] and that movement of the Small Clause head triggers *phase extension* (Den Dikken 2006, 2007; Gallego & Uriagereka 2007). I assume that the movement parameter of APPL is valued as positive in the dative construction; APPL thus moves to √V and triggers phase extension. Negatively valued movement parameter, on the other hand, retains APPL *in situ*, suspending phase extension. The presence vs. absence of phase extension subsequently explicates A-movement symmetries and ill-formed adjectival passives with Goal externalisation associated with dative constructions. It also accounts for A-movement *a*symmetries and well-formed adjectival passives with Goal externalisation associated with double accusative constructions. A negative correlation thus emerges between long passives and well-formedness of adjectival passives with Goal externalisation.

I round off the discussion with the claim that clitic doubling of dative Goals in passivized dative constructions is a visible signal of phase extension and, if dative clitics

[8] The current proposal contrasts with McGinnis's (2001) view according to which low applicatives are not phases, while high applicatives are. Consequently, low applicatives generate asymmetric DOCs, while high applicative generate symmetric DOCs because high applicatives, being phases, involve a phase EPP-feature that licenses a long passive. McGinnis (2001) analysis, however, involves many problems and can be shown to be invalid in a number of languages. McGinnis (2001:8) herself acknowledges some shortcomings in her analysis and the inconsistencies are further highlighted in a typological perspective e.g. in Peterson (2006, 2007).

are treated as phonetic realizations of APPL, it overtly shows that APPL has been displaced.

3.2 Low applicatives and phase extension

A well-known fact concerning phases (Chomsky 2000, 2001, 2004) is that only the edge of a phase can be mobilized for movement. The movement restrictions are regulated under the axiom known as the "Phase Impenetrability Condition" (PIC). I adhere to PIC in the less-restricted form articulated in Chomsky (2001, 2004):

(18) *Phase Impenetrability Condition* (Chomsky 2004:108)

At the phase ZP containing phase HP, the domain of H is not accessible to operations, but only the edge of HP.

According to (18), a non-phase head such as T still probes the *v*P-domain, unlike phase heads like C.

Den Dikken (2006, 2007) and Gallego & Uriagereka 2007) report that phases can expand as a result of movement of the phase head. The process is referred to as "phase extension" in den Dikken (2006, 2007) and, somewhat differently, "phase sliding" in Gallego & Uriagereka (2007). I embrace from the view of den Dikken (2006, 2007), presented in (19), a working definition of phase extension and subsequently relate it to the version of PIC cited in (18):

(19) *Phase Extension*

Syntactic movement of the *head* H of a phase α up to the head X of the node β dominating α *extends* the phase up from α to β; α loses its phasehood in the process, and any constituent located on the edge of α ends up in the domain of the derived phase β as a result of phase extension.

The definition in (19) implicates movement restrictions for the edge of the expanding phase because it ends up in the domain of the derived phase (phase domains are islands for movement). The movement restrictions arise because Den Dikken adopts the more constrained version of PIC (Chomsky 2000) according to which phases are not evaluated at the next phase level. Notably, however, the movement restrictions do not arise if (19) is applied to the less-constrained version of PIC in (18). In the current analysis, phase extension thus only extends movement opportunities.

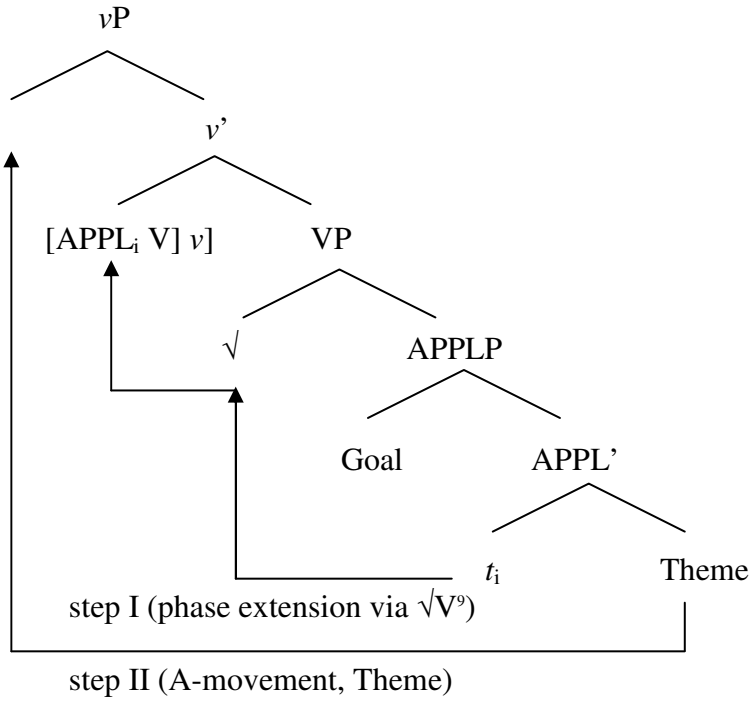
3.2.1. Phase extension and the dative construction

Following Legate (2003) and others, I assume that all *v*Ps, even passives and unaccusatives, are phases. If phases are evaluated at the next phase level under (18), the phase headed by low APPL is evaluated when topped with a *v*P. Under these conditions, we expect long passives to be suspended once *v*P is complete. The Greek data, however, indicate that Themes undergo A-movement in passives, albeit with concomitant clitic doubling of the Goal. In addition, adjectival passives with Goal externalization are ill-formed.

The phase extension approach allows us to interlace the A-movement properties of Themes with the ill-formedness of adjectival passives. In particular, the ill-formedness

of adjectival passives indicates that zero APPL moves to √V (Pesetsky 1995, Anagnostopoulou 2001, Kupula 2008). Because APPL heads a phase, its movement to √V triggers phase extension. Under the assumption that phases are evaluated at the next phase level, the extended phase (*v*P) is evaluated at CP, thus retaining its domain (the applicative phrase) transparent for probes like T. Consequently, long passives (as well as EPP-driven movement of dative Goals) are legitimate:

(20)

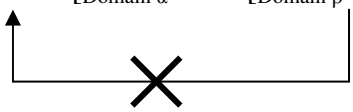


[9] Observe that head movement through √V creates a zero-derived root, APPL being a zero morpheme in Greek. The next step of the derivation would violate Myers's Generalization if internal merge with *v* is derivational. Given that the derivation converges, *v* must be inflectional. It could also be assumed that the intermediate projection (√V) might not be required if APPL is treated as a property of √V (cf. Kupula 2008 where APPLP is topped directly with *v* for expository purposes). Here, I have followed Pylkkänen's low applicative structure where the applicative phrase is topped with the verb root (which does not head a phase).

Alternatively, the long passive in (20) could be licensed via movement of the Theme to an extra Specifier/Phase EPP-feature related to APPLP (McGinnis 2001, Jeong 2007). This strategy, however, could not be executed in the low applicative framework due to principles of *Anti-Locality* (Grohmann 2003 and others) according to which complements cannot move to (or through) the Specifier of the same phrase. A-movement of Goals via an additional Spec,APPL would be blocked under the same principle. Phase extension, on the other hand, is immune to Anti-Locality because the analysis proceeds without reference to phase EPP-features or multiple Specifiers.

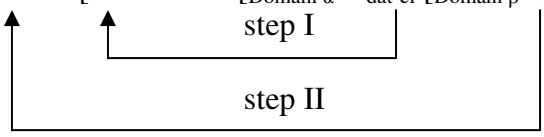
Observe that Anagnostopoulou (2003) accounts for Greek long passives with a strategy conspicuously similar to phase extension. Anagnostopoulou's (2003) system is couched in locality and minimal domains in the sense of Chomsky (1995) and begins with the observation that long passives violate locality because of the different domain affiliation of Goals and Themes in her framework. The derivation in (21) is supposed to represent the non-preferred (for some speakers ill-formed) construction exemplified in (7b)

(21) [NOM [$_{\text{Domain }\alpha}$ DAT [$_{\text{Domain }\beta}$ t_{nom}]



Anagnostopoulou then proceeds to illustrate that the locality violation in (21) is cancelled when the Goal undergoes clitic doubling. The central idea is that the dative clitic encapsulates the intervening formal features of the Goal, undergoes movement and thereby moves the intervening features of the Goal "out of the way". Consequently, a locality violation is eliminated (step I) and a long passive becomes legitimate (step II). This accounts for the well-formedness of constructions like (7a):

(22) [NOM [DAT-clitic [$_{\text{Domain }\alpha}$ $t_{\text{dat-cl}}$ [$_{\text{Domain }\beta}$ t_{nom}]]]]



Movement of a clitic in Anagnostopoulou's (2003) framework thus licenses an otherwise impossible movement operation and in this sense clearly patterns with Den Dikken's (2006, 2007) idea of phase extension, which also licenses an otherwise impossible movement operation. In light of the apparent similarities, an obvious question to ask is whether (21)-(22) above in fact reduce to phase extension and the movement parameter of APPL. Ideally, we should explain why phase extension is superior to Anagnostopoulou's (2003) analysis.

As it turns out, Anagnostopoulou's (2003) analysis involves two touchy and potentially problematic questions, both of which relate to different aspects of the *sine qua non* ingredient of her proposal, namely the presence of the dative clitic in (22). In particular: (i) Is the presence of the dative clitic motivated by locality? and (ii) Is the dative clitic strictly obligatory? It seems to me that the answer to both of these questions is negative.

To begin with, the thesis that dative cliticization is motivated by locality, is inaccurate. On closer inspection, it turns out that dative cliticization is quite insensitive for strict locality. As discussed in 2.1, clitic doubling of dative Goals is not induced only in long passives (where locality considerations admittedly become acute) but also in the EPP-driven A-movement of Goals themselves (where locality is not jeopardized):

(23) a. tis Marías tis dóthike éna dahtilídi

the Maria.DAT CL was-given a ring.NOM

'Maria was given a ring'

b.#tis Marías dóthike éna dahtilídi

the Maria.DAT was-given a ring.NOM

Constructions like (23) are not discussed in Anagnostopoulou (2003) but the example in (24) (Anagnostopoulou 2003:45) illustrates a reminiscent scenario: clitic doubling of the Goal is induced even if the Theme resides *in situ*. This gives a second indication that clitic doubling of Goals is a phenomenon quite independent of locality:

(24) ?*(tu) dóthike tu Pétru to vivlío

him was-given the Petros.DAT the book.NOM

'the book was given to Peter'

The second problem with Anagnostopoulou's analysis has to do with the strict obligatoriness of the dative clitic in passives. Although the presence of the clitic considerably improves the syntax, the omission of the clitic would rarely be fatal. In Anagnostopoulou's (2003) framework, however, the presence of the clitic is an absolute necessity; its omission would result in a locality violation, as in (21), and, consequently, severe ungrammaticality. In light of the relative subtleness of the data, however, this prediction is disproportionately strong.

I now proceed to illustrate that both of the shortcomings described above can be remedied in the phase extension approach.

I agree with Anagnostopoulou (2003) in that the dative clitic is associated with the formal features of the Goal. The alternative I propose is that this is due a base-generated Spec,Head relationship between the Goal and the dative clitic. In other words, I assume that the dative clitic represents APPL: it is a phonetic realization of the applicative head (cf. Bowers & Georgala 2007) and therefore a visible exponent of phase extension (the displacement of APPL in the dative construction). The idea that dative clitics constitute Spell-Out of APPL has been advanced also for other languages (see e.g. Pylkkänen 2000 for Japanese; Demonte 1995 and Cuervo 2003 for Spanish and Diaconescu & Rivero 2007 for Rumanian). If dative clitics are treated as applicative heads, the data in (23)-(24) are no longer puzzling in terms of locality.

The analysis of dative clitics as phonetic realizations of APPL has beneficial consequences also for the grammaticality judgements concerning long passives and passives with EPP-driven dative Goals. The dative clitic can now be treated as a free grammatical morpheme, a detached applicative marker on the verb (cf. Nichols 1992:55). Free grammatical morphemes, on the other hand, are known to be fairly often omissible (see especially Owens 2003 and Pearson 2005 for omissible applicative morphemes). This approach desirably leaves us enough margin to accommodate the sporadic absence of the clitic without jeopardizing the validity of the phase extension analysis: the omission of the clitic would be tolerated due to independent considerations, related to the status of the clitic as a free morpheme. As I pointed out above, Anagnostopoulou's (2003) system is too rigid in this sense.

3.2.2. On the Spell Out of APPL in passives

An obvious question to ask is why APPL should receive a phonetic realization in passives, but remain a zero morpheme in the active voice. The question can be approached with the preliminary observation that the Spell-Out of APPL also appears with Class III psychological predicates (see the examples in 3). Passives and Class III psych constructions, on the other hand, share a significant syntactic property, namely the lack of an external argument (Belletti & Rizzi 1988, Pesetsky 1995 among many others). We can now formulate a hypothesis that it is the lack of external arguments that triggers a phonetic realization of APPL.

The hypothesis is consistent with Pylkkänen's (2000) remarks on the topic. Pylkkänen, who discusses a similar issue concerning adversity passives in Japanese (analysed as low applicatives), claims that Spell-Out of APPL in passives mirrors the distinctive Spell-Out features of non-active morphology in general. The distinctive non-active morphology (including APPL) is deleted or rendered invisible under "CAUS" (a head that introduces external arguments).

Pylkkänen's (2000) claim, which appears to be perfectly in line with the Greek data, can be given a principled account with a recent incarnation of DOUBLY FILLED COMP FILTER (Koopman & Szabolcsi 2000: 39-42, Pearson 2005, Collins 2007). In short, the principle states that a head or its Specifier (but not both) can be overtly realized at the end of the derivation if the Specifier and the head share morphosyntactic features (like inflection). The definition in (25) comes from Pearson (2005):

(25) If H is a category containing some feature F, *[$_{HP}$ XP [$_{H'}$ H^0 …]] where XP and H^0 both overtly encode F.

Pearson (2005:401), who has recently exploited (25) for Malagasy, reports that applicative morphemes are spelled out in specific morphosyntactic environments in this language; particularly when the oblique argument introduced in Spec,APPL undergoes movement. Pearson's (2005) reasoning is applicable in Greek, with the provision that APPL is not phonetically realized in its base: the effects of Myers's Generalization strongly indicate that APPL moves to √V as a zero morpheme. Therefore, APPL must be phonetically realized *after* its head movement to √V and the functional structure merged above VP in passives is consistent with (25): a passive *v*P lacks an externally merged Specifier. This also applies to Class III psych constructions where APPL is realized phonetically as well. As a matter of fact, (25) predicts a Spell-Out of APPL also with traditional unaccusatives and, as shown in Anagnostopoulou (2003:23-26), the hypothesis is consistently borne out:

(26) a. i thea $^{?*}$(tu$_i$) parusiástike tu Pári$_i$ ston ípno tu
the goddess CL.DAT appeared the Paris.DAT in-the dream his
'the goddess appeared to Paris in his dream'

b. to gráma $^{?*}$(tis$_i$) írthe tis Marias$_i$ grígora
the letter CL.DAT came the Mary.DAT fast
'the letter came to Mary fast'

That DOUBLY FILLED COMP FILTER should apply after APPL has moved to √V has beneficial consequences for A-movement of Themes. Crucially, (25) is articulated with reference to Specifiers, but APPL is spelled out in Greek even in the A-movement of Themes (which are not Specifiers at the base). The potential problem is eliminated if the

Specifier position relevant for the application of (25) is an internally merged Spec,*v*P which can host both Goals and Themes in passives (precisely due to head movement of APPL, i.e. phase extension). See also Collins (2007) for discussion that (25) might even affect complements of H.[10]

At first sight, it seems that a wealth of counterexamples could be found for (25). In many well-documented languages with rich verbal inflection (Italian, Greek, Icelandic etc.), the Subject resides in Spec,TP and the verb in T, yielding a violation to (25). As it turns out, however, languages with rich inflectional properties generally allow pro-drop (Jaeggli & Safir 1989; for the potentially limited pro-drop opportunities in Icelandic, see Platzack 1985 and Thráinsson & Hjartardóttir 1986). Due to the fact that the Subject is identified through verbal inflection, it is largely redundant. Therefore, if the Subject for some reason does occur overtly in a pro-drop language, it could be treated as topicalized item (subsequent movement from Spec,TP to Spec,CP) (see Alexiadou 1999 for remarks along these lines concerning SVO orders in Greek). Covert Subjects, like *pro*, on the other hand, could freely remain at Spec,TP because they do not overtly encode any grammatical features; (25) would therefore not be violated.

3.2.3. Phase extension – the double accusative construction

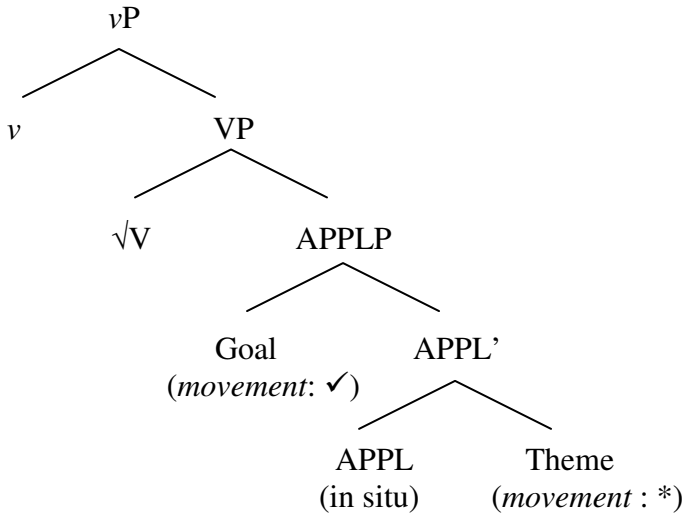
Double accusative constructions disallow long passives and while A-movement of Goals is legitimate, concomitant clitic doubling of the Goal is not induced. Furthermore, adjectival passives with Goal externalization derived from double accusative verbs are well-formed.

[10] Collins (2007) discussion on this particular point involves PPs headed by covert Ps.

I have followed Anagnostopoulou (2001) in assuming that the well-formedness of adjectival passives derived from double accusative verbs is due to √V not being zero-derived. Presupposing a common base for the dative and the double accusative construction (the structure in 12), APPL must therefore not undergo head movement to √V due to Myers's Generalization (i.e. it resides *in situ*). Because APPL heads a phase, the lack of APPL-to-√V movement implicates lack of phase extension.

Lack of phase extension, in turn, explicates the ill-formed long passives in double accusative constructions: their severe ungrammaticality is a PIC-reflex. Due to lack of phase extension, APPLP is now evaluated at *v*P. Accordingly, T no longer constitutes an accessible probe for APPL-domain and the Theme immobilizes as a consequence. Only the Goal (the edge of APPL-phase) is eligible for movement. The lack of phase extension in double accusative constructions is also mirrored in the absence of dative clitics in passives:

(27)



Crucially, the discussion concerning the dative construction and the effects of Myers's Generalization indicate that DOUBLY FILLED COMP FILTER becomes operative after

APPL has moved to √V. This explains why APPL is not spelled out in passivized double accusative constructions despite the fact that the Goal undergoes movement.

3.2.4. On the Case features of the Goal

Modern Greek appears to provide fairly good evidence for phase extension: phase extension is induced in the dative construction and it is suppressed in the double accusative construction. Another obvious difference between dative and double accusative constructions is the Case marking of the Goal. In the dative construction, where phase extension occurs, Goals surface as datives. In double accusative constructions, phase extension does not occur and Goals surface as accusatives.

Presupposing the validity of an identical base for dative and double accusative constructions, the question that now actualises is the following: what is the minimal morphosyntactic difference between dative and double accusative constructions that makes Goals surface as datives in the former and as accusatives in the latter? As far as I can see, there is only one possible answer to this question and it has to do with phase extension in the former.

Recall that McGinnis (1998) and Anagnostopoulou (2001) argue that APPL is related to both Themes and Goals; it is associated with an inherent dative Case specification for the Goal (McGinnis's "m-Case"). Now, the scope of APPL differs depending on whether it resides *in situ* or undergoes movement to √V. When APPL resides *in situ* (double accusative constructions) it locally c-commands only the Theme; when it undergoes movement to √V (dative constructions), it locally c-commands the Goal. These facts give us reason to believe that the syntactic position of APPL interacts with the Case features of the Goal.

Suppose that the inherent dative Case specification (m-Case) associated with APPL is discharged to the Goal in a position where APPL c-commands the Goal (*Agree* in the sense of Chomsky 2000). The process is reminiscent of "dativization of Subjects" in Burzio's (1986) sense; Burzio (1986: 274-277) claims that verb movement across Subjects can trigger dativization of the Subject. In the Small Clause analysis of DOCs, Goals, too, are Subjects. APPL, on the other hand, has been analysed as verbal, perhaps a light verb or a "pro-verb" (Marantz 1993, Bittner & Hale 1996, Kupula 2008:58-60).[11]

In double accusative constructions, on the other hand, Goals surface as accusatives (i.e. check only the "structural part" of their Case features through *v*) because APPL resides *in situ* and the only argument it locally c-commands in this position is the Theme. An obvious question to ask is why APPL does not discharge the morphological dative Case specification to the Theme instead. The reasons for this must be language specific in the sense that the dative Case specification is, in some languages (like Greek), sensitive for animacy and therefore thematically linked exclusively to Goals (or other animate arguments like Experiencers).

Interestingly enough, however, there are languages in which dative Case is insensitive for animacy and therefore compatible also with Themes. DOCs of this sort involve accusative Goals and dative Themes and have not, to my knowledge, been discussed in depth in generative literature before (but see Platzack 2006: 84ff for some discussion on Icelandic). These constructions are, however, widely attested at least in some Slavonic languages (see Dziwirek 2002 for extensive typological discussion) and

[11] APPL furthermore "delimits a Small Clause" in Bittner and Hale's (1996) terms and thus qualifies as a "Case binder". According to Bittner & Hale (1996), Case checking essentially results from Case binding where a locally c-commanding Case assigning head binds a DP.

a remarkably interesting detail concerning them is that they are associated with Greek double accusative verbs, specifically the verb '*to teach*'. Consider (28) from Russian (Dziwirek 2002; see also Soschen 2005 for arguments that DOCs are low applicatives also in Russian):

(28) Petja učil Katju matematike
Petja taught Katja.ACC math.DAT
'Petja taught Katja math'

If (28) is a configurational "double accusative construction" in Russian, the fact that the Theme is licensed dative Case would be perfectly in line with the claim that APPL resides *in situ* in (28) and discharges its morphological dative Case specification to the Theme under local c-command. Also the fact that only short passives are allowed in (28) (Dziwirek 2002:337) is consistent with the Greek double accusative construction (and the view that APPL resides *in situ* in 28).

The phase extension approach also provides for an additional piece of evidence for the quirky subjecthood of fronted datives (see 2.1.). The examples of the dative construction discussed so far involve an overt DP-dative (as in *tis Marias* tis dothike ena vivlio '*Mary* was given a book'). The question is how to interpret examples without DP-datives, as in (29):

(29) tis dothike éna vivlio
CL.DAT was-given a book
'(she) was given a book'

If dative clitics constitute phonetic realizations of APPL, *tis* in (29) cannot be treated as a pronominal dative Goal. Instead, the construction necessarily involves a covert *pro*-Subject (base-generated as Spec,APPL):

(30) *pro* tis dothike éna vivlío
pro CL.DAT was-given a book
'(she) was-given a book'

It would be extremely unattractive to interpret *pro* as a topicalized or left-dislocated item. Why would a covert item be topicalized? It is much more likely that the *pro* in (30) is a (quirky) Subject and resides in Spec,TP. As a covert Subject, its location at Spec,TP would be tolerated also by DOUBLY FILLED COMP FILTER.

4. Final remarks on English and Scandinavian

A common denominator in the languages examined so far is that they are morphologically rich in the sense of employing distinctive Case marking for datives. The consequences of the proposed analysis seem less clear for morphologically impoverished familiar languages, like English or many Scandinavian languages. A-movement (a)symmetries seem to vary almost arbitrarily in many of these languages: it is said that American English only allows short passives while British English allows both short and long passives (see Doggett 2004, Citko 2008 for recent discussion), yet speakers' judgements of ill/well-formedness of adjectival passives are, unsurprisingly, similar. Sometimes long passives are facilitated by the lightness of the Theme (Doggett

2004). In languages like Swedish, on the other hand, A-movement (a)symmetries seem to be lexically constrained in the sense that some verbs allow long passives while for other verbs these constructions are marginal at best (Emonds & Whitney 2005; see also Holmberg & Platzack 1995)[12]. It is beyond the scope of this paper to provide a typologically comprehensive account for all of these facts, but some discussion for future reference is in order.

Given that in some languages (like Swedish) long passives seem to be lexically defined and in some cases the lightness of the Complement of APPL (the Theme) facilitates these constructions, it is tempting to narrow many of the apparent inconsistencies to an idiosyncratic property of the applicative head itself. Suppose that APPL can be either "strong" or "weak" depending on its internal morphological complexity. Greek or Russian APPL is "strong" (cf. Anagnostopoulou 2001). On the other hand, some lability and inconsistencies might be expected with a "weak" APPL, attested e.g. in English or Scandinavian.

The concepts of "weak" and "strong" APPL seem to go hand in hand with "weak" and "strong" phases in the sense of Chomsky (2001). This proposal is empirically attractive because the differences between weak and strong phases were originally motivated by the possibility to project phase EPP-features. Strong phases project phase EPP-features, weak phases do not. Phase extension, on the other hand, clearly overlaps functionally with phase EPP-features in facilitating movement from phase domains.

[12] The verb *förära* 'to present' seems to allow a symmetric DOC. Examples like (1b-c), on the other hand, are marginal at best (if acceptable at all):

(1) a. medaljen förärades Johan
the medal was-presented Johan
b.?bilden visades mej tre gånger
the picture was-shown me three times
c.?*pennan gavs Cecilia
the pencil was-given Cecilia

With these facts in mind, it is tempting to assume that APPLP headed by a "strong APPL" triggers phase extension as a result of head movement of APPL. The process facilitates movement from a phase domain just like a phase EPP-feature would. The very notion of a "phase EPP-feature", however, becomes functionally redundant as it reduces to phase extension.

Head movement of "weak APPL", on the other hand, might not trigger phase extension, despite undergoing movement to √V, creating a zero-derived root and barring the formation of adjectival passives. In this sense, APPLP headed by a weak APPL would be very similar to a "weak phase" in which phase EPP-features are not projected. The latter state of affairs would be attested in the symmetric British English as well as with many verbs in Swedish.

5. Conclusions

In this article, I have discussed A-movement (a)symmetries in Modern Greek double object constructions in which Goals can be realized as either datives or accusatives. The article shows that symmetric and asymmetric passives interact with other morphosyntactic phenomena such as (i) clitic doubling of Goals in passives, (ii) well/ill-formedness of adjectival passives and (iii) the Case marking of the Goal. The phase extension approach allows a universal base for the dative and double accusative construction in Modern Greek and explains the interaction of (i)-(iii) above in terms of either negatively or positively evaluated movement parameter of APPL.

Much of the discussion in this paper points in the direction that symmetric and asymmetric passives reduce to the idiosyncratic morphosyntactic properties of APPL, its internal morphological complexity and movement parameter. In this view, a theory

of A-movement (a)symmetries in DOCs would neither require two base-generated orders for Goals and Themes (Holmberg & Platzack 1995, Doggett 2004) nor multiple Specifiers or *deus ex machina* phase EPP-features (as in McGinnis 2001, Anagnostopoulou 2003). It might be impossible to eliminate all arbitrariness and inconsistencies concerning a phenomenon as complex as the double object construction, but the approach taken in this paper illustrates that the arbitrariness (multiple Specifiers etc.) does not necessarily need to become a property of syntax. Instead, the locus of arbitrariness is narrowed to parameterizable idiosyncrasies of one functional head.

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