

# Greek

## 172. Greek

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### Abstract

*This article deals with word-formation in Modern Greek. It provides a basic description of the structure and properties of compounding, derivation and blending, which is followed by explanations drawn from various theoretical analyses that have been proposed in the literature. All issues and claims are illustrated with a number of examples, which, for clarity reasons, are given in a broad phonological transcription.*

### 1. Introduction

Since the early sixties, word-formation in Modern Greek (hereafter Greek) has triggered increasing interest within linguistic research (see, among others, Koutsoudas 1962) and a variety of morphological phenomena has been analyzed within the framework of various linguistic schools, resulting in a number of studies, both descriptive and explanatory (see Ralli 2003 for the state-of-the-art of Greek morphology). Basic questions, such as “what is the structure of words”, “what are the basic units and rules/patterns responsible for the analysis and generation of morphologically-complex items”, “what is the relation between the various word-formation processes” and “where is the locus of word-formation in grammar” have received a variety of answers, depending on the theoretical approach one deals with.

This article should be seen as a synthesis of the major points that can be found in the existing literature on Greek word-formation of the last forty years, but when needed, reference is made to older works as well. Issues that have attracted attention, such as constituency, headedness, selection, etc. are dealt with in the following sections, and certain major works regarding Greek morphology are cited. Although Greek has a wide variety of intriguing phenomena affecting word-formation, there are areas that are relatively well studied, e.g. compounding, and areas that still call for a thorough exploration (e.g. prefixation).

The main sections of this article are dedicated to derivation and compounding, but hints to inflection are also made. The reason for this choice relies on the fact that Greek

nouns, adjectives, verbs and certain pronouns are overtly inflected and their endings are part of the word structure, most of the time intermingling with the other constituents of the word. For clarity reasons, I list the word bases (stems) and the derivational suffixes with the appropriate inflectional endings. The latter are included in parentheses, together with other material which is irrelevant for the argumentation. Parentheses are absent only when the entire base is used for compounding or derivational purposes, i.e. when a base coincides with a free word. Conventionally, nominal words are given in the nominative singular forms; the first person singular of the present tense is provided for verbs, since Modern Greek has lost its overt infinitival forms. Moreover, all Greek exam- ples are listed in a broad phonological transcription, and stress is assigned properly.

It is worth pointing out that word-formation via conversion or stem-internal vocalic change (ablaut) is also possible, but in Greek, these operations are of limited productivity and usually affect stems, since the presence of overtly realized inflection renders difficult the change of category of the word as a whole. On the one hand, conversion is restricted to a small production of denominal verbal stems (e.g. *γλωσολογ*<sub>V</sub>(ó) ‘to talk about language, behave like a linguist’ ← *γλωσολόγ*<sub>N</sub>(os) ‘linguist’). On the other hand, ablaut applies only to learned stems of Ancient Greek origin (e.g. *λόγ*<sub>N</sub>(os) ‘speech, oration’ ← *λέγ*<sub>V</sub>(o) ‘to talk, say’, *αποχ*<sub>N</sub>(i) ‘abstention’ ← *απέχ*<sub>V</sub>(o) ‘to be off’).

## 2. General overview

Morphology is a particularly developed component in the grammar of Greek, since it displays productive word-formation patterns for both derivation and compounding. Greek morphology is mainly stem-based in that most words are formed by adding an affix – prefix or suffix – to a stem (derivation), or a stem to another stem or word (compounding). Stems can be either morphologically simple (i.e. stems without any affixal or other material), or morphologically complex. On synchronic grounds, morphologically-simple stems coincide with roots. In Ancient (Classical) Greek (5<sup>th</sup> and 4<sup>th</sup> c. BC), however, a distinction between the two notions was necessary since roots gave rise to stems with the addition of thematic vowels. For instance, the Ancient Greek word *άνθρωπος* ‘man, human being’ contained the root *ανθρῶp-*, the thematic vowel *-o-* and the inflectional ending *-s*, i.e. the case (nominative) and number (singular) exponent. Nowadays, thematic vowels have lost their original stem-forming role and the border between stems and roots is blurred. Since the distinction between the two notions is not structurally relevant, most of the time thematic vowels are considered to be parts of the inflectional endings (Ralli 2005). Thus, *άνθρωπος*, today’s form for ‘man, human being’, is analyzed as containing the root/stem *ανθρῶp-* and the inflectional ending *-os*. Note that in this article, the term “stem” is used to refer to both roots and stems.

Greek belongs to the fusional type of languages, in that the words of its major grammatical categories bear inflection, and inflectional endings are portmanteau morphemes, combining more than one morpho-syntactic feature. Nouns, adjectives, and certain pronouns inflect for gender, case, and number, while they are distributed into several inflection classes (ten according to Ralli 2005). Articles express the same morpho-syntactic features of nouns and adjectives, but they do not display a transparent and thus, analyz-able structure, into stem and inflectional ending. Verbs are morphologically marked for

voice, aspect, tense, person and inflection class (mood has lost its overt marking in Modern Greek), and are divided into two basic inflection classes. Generally, inflected words are usually formed on the basis of combining a stem and an inflectional ending, as in the pattern [Stem-INFL]<sub>Word</sub> (e.g. *δρόμ-ος* ‘road-MASC.NOM.SG.’, *ορέ-ος* ‘nice-MASC.NOM.SG.’, *πίζ-ο* ‘play-IMPERF.PRES.1SG’ ‘I play’). The structure is slightly more complex in the perfective form of verbs, where the ending contains an aspectual marker *-s-* (+perfective) and the portmanteau morpheme combining the features of past, person and number: [Stem-INFL]<sub>Stem-INFL</sub><sub>Words</sub> as in *δός-αμε* ‘give-PERF-PAST.1PL’ ‘we gave’ (Ralli 2005). Inflection is generally realized as suffixation. The augment *e-* in the past tense of verbs is the only case where inflection could be considered to appear as a prefix, and in fact, it indicated the past tense in Ancient Greek. Nowadays, the use of *e-* is connected with the presence of stress, since it is absent in unstressed position (compare *έ-δος-α* ‘I gave’ with *δός-αμε* ‘we gave’). Since its occurrence is not compulsory in the past tense, its inflectional status is doubtful. In fact, in the literature, it has been often considered as a morpho-phonologically inserted element (Babinotis 1972; Ralli 2005).

Derivation appears as suffixation, or prefixation. It forms stems out of stems and affixes. As already mentioned, a derived stem needs an inflectional ending in order to become a word, and be used for syntactic purposes. The general patterns of Greek derived words are the following:

- |        |   |    |  |
|--------|---|----|--|
| (1) a. | [Stem DSUF] <sub>Stem-INFL</sub> <sub>Word</sub><br>e.g. [[ <i>χορ</i> <sub>N</sub> - <i>έβ</i> <sub>V</sub> ] <sub>V-o</sub> ] <sub>V</sub><br>dance-DSUF-IMPERF.PRES.1P.SG<br>‘I dance’ | b. | [[[ <i>ά-γνωστ</i> ] <sub>A</sub> ] <sub>A-os</sub> ] <sub>A</sub><br>PREFIX-known-NOM.SG<br>‘unknown’ |
| c.     | [ <i>para-γελό</i> ] <sub>V</sub> <sub>Word</sub><br>[ <i>para-γελό</i> ] <sub>V</sub> <sub>V</sub><br>PREFIX-laugh.IMPERF.PRES.1P.SG<br>‘I laugh a lot’                                  |    |  |

(1b) and (1c) differ with respect to the morphological status of the base, i.e. whether the prefix is added to a stem or to a word. As proposed by Ralli (2004), the criteria for selecting a stem or a word are mainly phonological (change of stress), and semantic (change of meaning). For instance, while the prefix *a-* triggers a change of stress of the adjective it is attached to (compare *άγνωστος* ‘unknown’ and *γνωστός* ‘known’), there is no such change in a verb like *γελό* ‘to laugh’, when it accepts *para-* ‘a lot’. It should be noticed that more than one affix can be added to a base, the exact number of which is restricted by the various constraints and selectional restrictions which operate on derivational structures (see section 4 for more information).

Contrary to inflection, the form of which has become poorer in Modern Greek as compared to Ancient Greek, the language has experienced a significant growth of compounding since the Hellenistic period (ca. 3<sup>rd</sup> c. BC–3<sup>rd</sup> c. AD). It is important to note that in the late medieval period (after the 13<sup>th</sup> c. AD), a considerable number of verb-verb coordinative compounds is introduced (Manolessou and Tsolakidis 2009; Ralli 2009b), which make Greek diverge from all the other Indo-European languages, where coordination usually affects nominals. Compounding is based on the combination of two

lexemes (see Bauer 2001: 695 for a proper definition of the process). In Greek, the first constituent is usually a stem, while the second can be a stem or a word. There are few exceptions as far as the first constituent is concerned, namely, cases where an invariant adverbial word is used, such as in the example *ksanayráfo* ‘to rewrite’ (*ksaná* ‘again’ + *yráfo* ‘to write’). A linking element *-o-* appears between the two lexemes (e.g. *sime-stolizmós* ‘flag decoration’ ← *simé(a)* ‘flag’ + *stolizmós* ‘decoration’); it is a semantically empty element originating from an ancient thematic vowel (Ralli and Raftopoulou 1999), the presence of which indicates the process itself. As such, it has been called ‘compound marker’ (Ralli 2008a). Crucially, the marker is not realized if the first constituent is an uninflected word, or if the second constituent begins with a vowel which is stronger than /o/ on the sonority hierarchy ( $\acute{a} > a > \acute{e} > e > \acute{o} > o > \acute{i} > i > \acute{u} > u$ ) proposed by Hatzidakis (1905–1907) and subsequently elaborated by Kaisse (1982). For instance, there is no compound-internal *-o-* in *nksanayráfo* ‘rewrite’ (← *ksaná* ‘again’ + *yráfo* ‘write’) and in *ladémboros* ‘oil merchant’ (← *lád(i)* ‘oil’ + *émboros* ‘merchant’). However, when the two constituents are in a loose structural relation, the *-o-* is present, even if the second constituent begins with a strong vowel. This is the case for compounds which bear a coordinative relation between their two members (e.g. *piyenoérxome* ‘to come (and) go’ ← *piyén(o)* ‘to go’ + *érxome* ‘to come’). It should be noticed that the Greek *-o-* appears in a wide range of non-native (also called ‘neoclassical’) compounds of other European languages, that is, in compounds whose constituent parts have been borrowed from Ancient Greek or Latin (e.g. *ge-o-graphy*, *soci-o-linguist*, etc.).

Compounds show inflection on their right-hand constituents. If the second constituent is a word, the compound bears the inflectional ending of the word (e.g. *eleokaliériyia* ‘olive culture’ ← *elé(a)* ‘olive’ + *kaliériyia* ‘culture’). However, a different inflectional ending may be used from that of the second constituent – when taken in isolation – if this constituent is a stem (e.g. *ladolémono* ‘oil (and) lemon (sauce)’ ← *lád(i)* ‘oil’ + *lemón(i)* ‘lemon’).

Although compounding differs from derivation, the order of application between the two processes, the use of certain units of an unclear status, the so-called “affixoids”, as well as the existence of specific constraints affecting both processes prove that compounding and derivation intermingle in such a way that only the same grammatical domain can handle compounds and derived words properly. In previous work, I have suggested that this domain should be morphology (Ralli 2010). In fact, as shown below, Greek compounds are one-word units, morphologically and phonologically, exhibiting all the morphological properties of words. However, under the influence of English, the emergence of certain recent formations of phrasal structure, displaying semi-visibility to syntactic operations, suggests that another type of phrasal compounding is under development in Greek. Most of these formations constitute terms, are restricted in the domain of specific sublanguages (science, football, etc., e.g. *deltio kerú* ‘weather report’), and their formation argues in favour of the morphology-syntax interaction (see section 3.5, as well as Ralli and Stavrou 1998 and Ralli forthcoming).

Finally, it should be noted that the well-known neoclassical formations of most European languages (e.g. *anthropology*, *hemisphere*, etc.) are compounds, since they obey the laws of Greek compounding. Many of them are calques, which are fully integrated into the Greek morphological system in that they combine stems, and bear Greek affixes and inflection. For instance, the English term *neology* has been reformulated in Greek as *neoloyía*, where the stems *ne-* ‘young’ and *-loy-* ‘doctrine about language’ are linked to

each other by the compound marker *-o-*, and the combination as a whole accepts the derivational affix *-ia* (there is no overtly realized inflectional suffix in this example). Crucially, as observed by Ralli (2008b), the neoclassical type of formations is formed productively in Greek, as proven by the large number of neologisms appearing each day in the media. A considerable number of them belongs to synthetic compounds, which contain deverbal bound stems, i.e. stems that cannot be free with the presence of inflectional affixes (see section 3.4).

### 3. Composition

Compounding as a very productive word-formation process of the Greek language is attested since Homeric Greek (Tserepis 1902). It produces compounds belonging to the major grammatical categories of nouns, adjectives and verbs. Nouns display combinations of two nouns (e.g. *kreatayorá* ‘meat market’ ← *kréa(s)* ‘meat’ + *ayorá* ‘market’) and adjective and noun (e.g. *asximópapo* ‘ugly duckling’ ← *ásxim(o)* ‘ugly’ + *pap(i)* ‘duck’). Adjectives combine two adjectives (e.g. *ikonomikopolitikós* ‘economic-political’ ← *ikonomik(ós)* ‘economic’ + *politikós* ‘political’), a noun and an adjective (e.g. *laomísitos* ‘hated (by the) people’ ← *la(ós)* ‘people’ + *misitós* ‘hated’), or an adverb with an adjective (e.g. *adikoxaménos* ‘lost in vain’ ← *ádik(a)* ‘in vain’ + *xaménos* ‘lost’). Verbs may contain either a noun and a verb (e.g. *xaropalévo* ‘to fight (with) death’ ← *xár(os)* ‘death’ + *palévo* ‘to fight’), two verbs (e.g. *aniyoklíno* ‘to open (and) close’ ← *aníγ(o)* ‘to open’ + *klíno* ‘to close’) or an adverb and a verb (e.g. *kakopernó* ‘to badly live’ ← *kak(á)* ‘badly’ + *perno* ‘to pass/live’). As claimed in previous work (Ralli 2009a), adverbial compounds, in their vast majority, are secondary formations resulting from a suffixation process, which adds the most common adverbial suffix *-a* to primary compounds, usually adjectives (e.g. *vorioanatoliká* ‘[north-east]<sub>ADV</sub>’ ← *vorioanatolik(ós)<sub>A</sub>* ‘north-east’ + *-a<sub>ADV</sub>* ← *vóri(os)<sub>A</sub>* ‘north’ + *anatolikós<sub>A</sub>* ‘east’).

It is worth noticing that the nominal stems participating in compounds do not always coincide with those that appear in the citation form, that is, in the nominative singular: they often display an allomorphic variation which is usually found in other cases and/or in plural (e.g., *ematokílizma* ‘wallowing in blood’ ← *émat-os* ‘blood-GEN’ (*éma* ‘blood.SG) + *kílizma* ‘wallowing’, *papadópedi* ‘altar boy’ ← *papád-es* ‘priest-PL’ (*papás* ‘priest-SG’) + *pedi* ‘boy’). See Ralli (forthcoming) for more details.

#### 3.1. Stress and morphological structure

Greek compounds bear only one stress (they are phonological words), but do not have a uniform stress pattern. In many cases, stress is located on the antepenultimate syllable, independently of the position of stress of the compound members, when taken in isolation (e.g. *kuklóspito* ‘doll’s house’ ← *kúkl(a)* ‘doll’ + *spít(i)* ‘house’). In other cases, stress falls on the same syllable as that of the second constituent of the compound (e.g. *xartopetséta* ‘paper napkin’ ← *xart(i)* ‘paper’ + *petséta* ‘napkin’). As suggested by Nespors and Ralli (1996), the position of stress in Greek compounds depends on their structure. Compounds containing stems, such as *kuklóspito*, do not have fixed stress proper-

ties, and as such, are submitted to a compound-specific phonological law placing stress on the antepenultimate syllable. On the other hand, compounds combining a stem and a word, like *xartopetséta*, keep the stress of the right-hand word, *petséta* and, as such, have fixed stress properties. As proposed by Ralli (2007, 2009a, forthcoming), stress properties and the form of the inflectional ending are the basic criteria for classifying Greek compounds into four structural patterns: a) [stem stem] (e.g. *rizógalo* ‘milk (and) rice (pudding)’ ← *ríz(i)* ‘rice’ + *γάλ(a)* ‘milk’); b) [stem word] (e.g. *xrisavví* ‘golden dawn’ ← *xris(i)* ‘golden’ + *avví* ‘dawn’); c) [word stem] (e.g. *eksódikos* ‘extrajudicial’ ← *ékso* ‘out’ + *δίκ(i)* ‘trial’); d) [word word] (e.g. *ksanavrísiko* ‘to find again’ ← *ksaná* ‘again’ + *vrísiko* ‘to find’). In fact, compounds whose second constituent is a stem are stressed on the antepenultimate syllable and may bear a different inflectional ending from that of the second member, when taken in isolation. This is not the case for the other two categories which keep the stress and the ending of their right-hand word. It should be noticed that the most widespread and productively formed types are a) and b), while c) and d) count few examples.

Inflection appears on the right-hand side of a Greek compound. It is worth noting, though, that a very limited number of Ancient Greek compounds with word-internal inflection is still in use, such as *niktilambís* (Ancient Greek *nyktilampēs*) ‘shining at night’ ← *niktí* ‘night.DAT’ + *-lambis* ‘who shines’ and *nunexís* (Ancient Greek *nounek-hēs*) ‘well minded’ ← *nun* ‘mind.ACC’ + *-ex-is* ‘who has’. These compounds contain the ancient inflected forms *niktí* (there is no dative case in Modern Greek) and *nun* (nowadays, *-n* has been lost from forms in accusative case) on their left-hand constituent, and should be analyzed as fossilized cases.

### 3.2. Headedness in compounding

Many Greek compounds are endocentric obeying Williams’ (1981) Right-hand Head Rule, according to which the head occupies the second position of the structure and is responsible for transmitting to the compound its grammatical category and basic meaning (e.g. *kokinóxoma<sub>N</sub>* ‘clay earth’ ← *kókin(o)<sub>A</sub>* ‘red’ + *xóma<sub>N</sub>* ‘earth’, *kozmo<sub>s</sub>ákustos<sub>A</sub>* ‘world known’ ← *kózm(os)<sub>N</sub>* ‘world’ + *ksakustós<sub>A</sub>* ‘known’, *siyovrázo<sub>V</sub>* ‘to simmer’ ← *siy(á)<sub>ADV</sub>* ‘low’ + *vrázo<sub>V</sub>* ‘to boil’). Greek also contains a considerable number of the so-called “exocentric” compounds (Ralli and Andreou to appear). Typical examples of these cases are *kalótixos<sub>A</sub>* ‘who has good luck’ ← *kal(ós)<sub>A</sub>* ‘good’ + *tíx(i)<sub>N</sub>* ‘luck’ and *misoyínis<sub>N</sub>* ‘misogynist’ ← *mis(ó)<sub>V</sub>* ‘to hate’ + *γín(i)<sub>N</sub>* ‘woman’. Exocentric compounds show a unique behavior with respect to a number of points: a) the grammatical category and other morpho-syntactic features are not inherited from any of the stems. For instance, *kalótixos* may be used as an adjective of masculine gender, while the right-hand member is a feminine noun (*tíx(i)* ‘luck’) and the left-hand member (*kal(i)* ‘good’) is an adjective agreeing with the noun in the feminine gender; b) their inflectional endings are usually different from those of the second member, when taken separately (compare *kalótixos* and *tíxi*); c) semantically, the meaning of the compound does not denote a subset of the entities expressed by the second member of the formation, as opposed to what happens with the meaning of endocentric compounds. For example, *misoyínis* does not designate ‘a kind of woman’ but rather ‘someone who hates women’.

Finally, a category of compounds which is also problematic for headedness involves the coordinative compounds (also called “dvandva”, see section 3.3), such as *alatoipipero* ‘salt (and) pepper’ ← *alát(i)* ‘salt’ + *pipér(i)* ‘pepper’, or *aniyoklino* ‘to open (and) close’ ← *aniy(o)* ‘to open’ + *klino* ‘to close’, since both constituents are of an equal status and neither of them prevails over the other. Formations like these could be treated as headless, but in the literature, they have also been treated as double-headed (see Kageyama 2009 for Japanese coordinative compounds) or even headed (see Ralli forthcoming for the Greek ones) because it may be the case that certain morphosyntactic features of the second constituent are inherited by the compound as a whole (e.g. *γινεκό-πεδα* ‘women-(and)-children.NEU’ ← *γινέκ(es)*.FEM ‘women’ + *πεδ(ιά)*.NEU ‘children’).

### 3.3. Compound-internal relations and order of constituents

The basic constituents of a compound formation, that is the two stems or the stem and the word that participate in the structure of a compound may be in a subordinative, attributive, or coordinative relation (Scalise and Bisetto 2009). In the first two cases, the left-hand member acts like a modifier of the right-hand member, as in the examples *αγριόγата* ‘wild cat’ ← *άγρι(a)* ‘wild’ + *γάта* ‘cat’ (attributive relation) and *δραxμοφονιάς* lit. drachma-killer ‘miserable’ ← *δραxμ(i)* ‘drachma (Greek coin)’ + *φονιάς* ‘killer’ (subordinative relation). Among the productively formed compounds, we also find cases showing a coordinative relation, i.e. compounds the constituents of which are of the same category. For example, two verbs (e.g. *αναvozvίno* ‘to switch on (and) off’ ← *ανάv(o)* ‘to switch on’ + *zvíno* ‘to switch off’), two nouns (e.g. *ψοmοtίρι* ‘bread (and) cheese’ ← *ψοm(i)* ‘bread’ + *tίρι* ‘cheese’), or two adjectives (e.g. *πικρόγλίκος* ‘bitter-sweet’ ← *πικρ(ός)* ‘bitter’ + *γλίκός* ‘sweet’) are concatenated without the overt use of a conjunction, and neither constituent modifies the other.

In compounds with a subordinative or an attributive relation the constituent order is strict: the modifier precedes the head. There are few examples, though, which seem to contradict this order, since their constituents combine in a more or less flexible order:

- |     |    |                    |        |    |                    |
|-----|----|--------------------|--------|----|--------------------|
| (2) | a. | <i>καρδιοxtίπι</i> | versus | b. | <i>xtίποkάρδι</i>  |
|     |    | ‘heartbeat’        |        |    | lit. beat-heart    |
|     |    | <i>κεfαλόπονος</i> | versus |    | <i>πονοκέfαλος</i> |
|     |    | ‘headache’         |        |    | lit. ache-head     |

As argued by Ralli (2007, 2008b), these occurrences do not constitute real counter-examples to the property of fixed order. An explanation is found in the long history of the Greek language: examples like (2a) display the typical structure of Modern Greek compounds, where the modifier (*καρδιά* ‘heart’ and *κεfάλ(i)* ‘head’) precedes the head (*xtίπος* ‘beat’ and *πόνος* ‘pain’), whereas, examples like (2b) belong to an Ancient Greek exocentric pattern, where a verb (e.g. *xtίπο(ό)* ‘to beat’, *πονο(ό)* ‘to be in pain’) precedes its complement (*καρδιά* ‘heart’ and *κεfάλ(i)* ‘head’, respectively). Similar compound structures are formations like *φιλόμυσος* ‘who loves (Ancient Greek *phileō*) art’ and *μισογίνις* ‘who hates (Ancient Greek *miséō*) women’.

In coordinative compound structures, the constituent parts should, in principle, be placed in a free order, since neither constituent modifies the other. In fact, such cases are common among adjectives (compare, for example, *makróstenos* ‘long (and) narrow’ with *stenómakros* ‘narrow (and) long’). As opposed to adjectives though, the constituent order is rather fixed in nouns and verbs, as shown by the examples *ladólémono* ‘oil (and) lemon’ (\**lemonólado* ‘lemon (and) oil’ or *aniyoklíno* ‘to open (and) close’ (\**klinaníyo* ‘to close (and) open’). One can assume that this fixed constituent-order may be imposed by independent pragmatic reasons: for example, the order may follow temporal iconicity, or the constituents appearing first express more basic concepts than constituents occupying the second position (see also Andriotis 1957). However, as shown in Ralli (forthcoming), pragmatic reasons are not sufficient for explaining the fixed order of constituents bearing a coordinative relation.

### 3.4. Compounds with a verbal/deverbal element

Verbal and deverbal (synthetic) compounds are abundant in Greek, and new formations are frequently coined. It has been suggested by Ralli (2007, 2008b, 2009a) that most of verbal compounds, especially those containing a noun as the left constituent (e.g. *xartopézo* ‘to play cards’ ← *xart(i)* ‘paper’ + *pézo* ‘to play’, *afisokoló* ‘to stick posters’ ← *afís(a)* ‘poster’ + *koló* ‘to stick’), are innovative formations, since they did not exist in Ancient Greek. On the other hand, deverbal compounds, that is, compounds whose second constituent is a deverbal noun or adjective (see section 4.2 (7d, 9b)), were common in Ancient Greek, and are still productively created today.

It is important to stress that, in both verbal and deverbal compounds, the complement/argument of the verbal head, or of the deverbal head, can be saturated by the non-head (the left-hand member), and saturation occurs within the limits of the compound structure. For instance, in a compound like *katsikokléftis* ‘goat-thief’, the first constituent *katsik(a)* ‘goat’ is the “theme” of the base *kléfti(s)* lit. who steals ‘thief’. Generally, there is a range of semantic roles that are usually expressed by the first constituent of a Greek verbal or deverbal compound (see Di Scullo and Ralli 1999, and Ralli forthcoming for details). For an illustration, consider the following examples:

- |     |    |   |             |                              |
|-----|----|---|-------------|------------------------------|
| (3) | a. | <i>pondikofáyoma</i> ‘rat eating’             | Agent:      | <i>pondík(i)</i> ‘rat/mouse’ |
|     | b. | <i>kardiokatakítis</i> ‘heart-conqueror’      | Theme:      | <i>kardi(á)</i> ‘heart’      |
|     | c. | <i>oksiyonokólisi</i> ‘welding’               | Instrument: | <i>oksiyón(o)</i> ‘oxygen’   |
|     | d. | <i>liθóstrotos</i> ‘stone paved’              | Material:   | <i>líθ(os)</i> ‘stone’       |
|     | e. | <i>ematokilizma</i> ‘wallowing in blood’      | Location:   | <i>éma</i> ‘blood’           |
|     | f. | <i>ayrotodaniodítisi</i> ‘farmer-loan-giving’ | Goal:       | <i>ayrót(is)</i> ‘farmer’    |
|     | g. | <i>poltopíisi</i> ‘pulp-making’               | Result:     | <i>pol(tós)</i> ‘pulp’       |

It is worth noticing that a particular class of deverbal compounds contains stems which remain bound, even under the presence of an inflectional ending, and for certain linguists (cf. Anastasiadi-Symeonidi 1996), they could be assigned the status of affixoids. For instance, in (4), the second constituent is not a free unit and cannot become one, even with the appropriate inflectional ending:



(4)	Compound	Deverbal stem
a.	<i>ktinotrófos</i> ‘cattle-breeder’	<i>-trof-</i> (← <i>tréf(o)</i> ‘to feed’)
b.	<i>anthropofáγos</i> lit. man eater ‘cannibal’	<i>-faγ-</i> (← <i>tró(o)</i> , aorist <i>éfay(a)</i> , ‘to eat’)
c.	<i>rasofóros</i> lit. cassock carrier ‘clergyman’	<i>-for-</i> (← <i>fér(o)</i> ‘to carry’)
d.	<i>γlosolóγos</i> lit. tongue talker ‘linguist’	<i>-loy-</i> (← <i>léy(o)</i> ‘to talk’)

As shown by Ralli (2008b), bound stems belong to nominals, and derive from a verbal base of an Ancient Greek origin, often with a simple change of the stem-internal vowel (ablaut, e.g. 4a, c, d), and rarely through a conversion of the stem allomorph of the aorist tense (4b). It should be noticed that some autonomous inflected words share the same form with certain bound stems, but bear a different meaning. For instance, the bound stems *-loy(os)* ‘who talks about, specialist of a discipline’ and *-for(os)* ‘who carries/bears’ exist side-by-side with the free words *lóγos* ‘speech, oration’ and *fóros* ‘tax’, respectively. The latter originate from the same verbal stem as the corresponding bound stems, but on synchronic grounds, they constitute distinct derivatives.

Constructions containing a bound item have always been in use in Greek, throughout its long history (Chantraine 1933). Many of them originate from Ancient Greek, such as *theolóγos* ‘who talks about the divine, theologian’ (← Ancient Greek *theós* ‘God’ + *-loy-* (← Ancient Greek *lég(ō)* ‘to talk’)) and have undergone the most striking diachronic changes which affected Greek during the Hellenistic period. Other constructions are recent creations for the specific purposes of scientific terminology, due to scientific and technological development, particularly in the nineteenth century. In today’s language, many of these constructions have become part of the every-day vocabulary, and bound stems currently combine with stems of common words for the creation of neologisms, as illustrated by the examples *burδolóγos* ‘who talks trash’ (← *búrδ(a)* ‘trash’ + *-loy-*) and *katsariδoktóno* ‘cockroach-repellent’ (← *katsariδ(a)* ‘cockroach’ + *-kton-* ‘killer’). In addition, they can serve as a base to further word-formation, since they may accept a derivational suffix (e.g. *-ia*) for the production of derivative nouns. For instance, *kerδoskopía* ‘speculation’ (← *kérδ(os)* ‘profit’ + *-skop-* (← Ancient Greek *skopéō* ‘to target, observe’)) is formed on the basis of *kerδoskóp(os)* ‘speculator’, *efθinofovia* ‘fear for responsibilities’ on *efθinófov(os)* ‘who fears responsibilities’ (← *efθin(i)* ‘responsibility’ + *-fov-* (← *fov(áme)* ‘to fear’)), etc.

Similar constructions appear in the vocabulary of other languages, and are listed under the class of neoclassical formations, which are complex words consisting of stems of Ancient Greek and/or Latin origin (e.g. English *sociologist*, French *sociologue*, Italian *sociologo*, etc.). Interestingly, several of these words belong to a vocabulary of internationalisms, because they have the same meaning, and a quasi identical form in various languages. Consider, for instance, the Greek word *astronómos*, which appears as *astronomer* in English, *astronome* in French, *astronomo* in Italian, etc.

### 3.5. Phrasal compounds

In recent years, there has been a tendency to form terms which display characteristics of noun phrases, but also certain properties of compounds (for details, see Anastasiadi-

Symeonidi 1986, 1996; Ralli and Stavrou 1998; Ralli forthcoming). Structurally, these constructions contain an adjective and a noun (e.g. *psixrós pólemos* ‘Cold War’) or two nouns (e.g. *praktorío idíseon* lit. agency news ‘news agency’, *pedí thávma* lit. child wonder ‘wonder boy’). In the first case, the adjective agrees with the noun head in gender, number and case, while in the second case, the non-head (second constituent) is assigned genitive case by the head (*praktorío idíseon*), or it displays an invariant form in the nominative singular (*pedí thávma*). The salient properties which make these constructions resemble compounds imply a certain degree of structural opacity. For instance, it is impossible to reverse the order of their constituents, as is usually the case with common noun phrases in Greek, their non-head cannot be independently modified, and no item, or parenthetical expression, can be inserted between the constituents. Moreover, in the case of adjective-noun formations, the definite article cannot be doubled, unlike what is the case for the corresponding phrases (compare *o meýalos o pólemos* lit. the big the war ‘the big war’ with \**o psixrós o pólemos* lit. the cold the war ‘the Cold War’). Also, adjective-noun constructions may be subject to derivational suffixation on condition that the inflectional ending of the adjective is truncated and a compound marker is introduced between the adjective and the noun (e.g. *psixr-o-polem-ik(ós)* ‘Cold-War like’ ← *psixrós pólemos* ‘Cold War’). Nevertheless, both types of formations share with noun phrases the property of containing two independent inflected words, corresponding to two phonological words, and their constituents are placed in the same order as that of noun phrases with a similar structure. Moreover, they differ from compounds in that there is no compound marker between their members.

Following recent work, I have claimed (Ralli 2011, forthcoming) that these formations constitute phrasal compounds. Assuming that compounding is a word-formation process which cuts across morphology and syntax, depending on the language one deals with, I have proposed that Greek one-word compounds are morphological objects since they are subject to morphological rules and principles and are formed from proper morphological units (stems and compound marker). On the contrary, phrasal compounds showing semi-visibility to syntactic operations, are created in syntax. Their phrasal nature is also proven by the fact that there is no clear borderline between them and the noun phrases, since their syntactic visibility is scalar, depending on the particular example one deals with. For instance, while *léksi kliði* lit. word key ‘key word’ is strongly opaque, *ánthropos ktínos* lit. man beast ‘human beast’ is rather transparent.

Finally, it is worth adding that formations of a compound-internal appositive relation, like *metafrastís díerminéas* ‘translator interpreter’, fall under the same category of phrasal compounds, since they share with them the same semi-syntactic/semi-word properties.

#### 4. Derivation

Greek derivation is realized either as prefixation or suffixation. Compared to prefixation, suffixation displays more variability. While prefixes are usually transparent to the properties of the base, most suffixes can be category changing, and transmit their features to derivative formations. As such, they are heads of their structures.

With respect to their origin, affixes may be divided into three categories: a) affixes which originate from Ancient Greek and are still in use (e.g. *-osini* in a deadjectival noun

like *kalosíni* ‘goodness’ ← *kal(ós)* ‘good’ + *-osíni*); b) affixes which are the product of grammaticalization, i.e. those deriving from other affixes or words (e.g. the prefix *kse-* which results from the combination of the Ancient Greek preposition *ek-* with the verbal syllabic augment *e-* (e.g. *kseperno* ‘to surmount, overcome’ ← *kse-* + *perno* ‘to pass’, Ralli 2004); c) affixes which are borrowed from other languages. Among those of the third category, one finds examples originating from Italian (e.g. the verbal suffix *-ar(o)* ← Italian *-are*, as in *voltáro* ‘to stroll’ ← *vólt(a)* ‘stroll’ + *-ar(o)*), Turkish (e.g. the nominal suffix *-dzi(s)* ← Turkish *-cI*, in nouns denoting profession, as in *xalvadžís* ‘halva seller’ ← *xalvá(s)* ‘halva’ + *-dzi(s)*), and Slavic (e.g. the diminutive suffix *-itsa* which forms feminine nouns from feminine bases, as in *ðaskálitsa* ‘little female teacher’ ← *ðaskál(a)* ‘female teacher’ + *-itsa*).

Finally, as is usually the case for all word-formation processes, there are different degrees of productivity, depending on the process and on the type of the affix involved (Bauer 2001). For example, diminution (e.g. *kukláki* ‘little doll’ ← *kúkl(a)* ‘doll’ + *-akí*) is subject to fewer constraints, and thus more productive, than the formation of deverbals (see section 4.2). Furthermore, within the same process, certain derivational affixes are more productively used than others of the same type. Consider the suffix *-iz(o)*, which creates verbs out of nominal bases (e.g. *alatízo* ‘to salt’ ← *alát(i)* ‘salt’ + *-iz(o)*): its productivity prevails over that of the also denominal suffix *-en(o)* (e.g. *anaséno* ‘to breathe’ ← *aná(s)* ‘breath’ + *-en(o)*).

#### 4.1. Prefixation

As proposed in earlier work (Ralli 2005), there are two kinds of prefixes: (a) bound prefixes and prefixes which have an autonomous form, but do not bear a clear-cut lexical meaning, since the latter is determined in relation with the meaning of the base which combines with the prefix. Prefixes of the second type originate from certain Ancient Greek prepositions, which, already in Classical Greek, were used as preverbs. Some of these preverbs keep the old prepositional function in certain fixed expressions (e.g. *aná xíras* ← Ancient Greek *aná kheíras* ‘at hand’), while others (*andí, apó, katá, metá*) appear as prepositions or adverbs, in restricted contexts, and with a specific meaning. For instance, *apó* denotes the provenance in a sentence like *íme apó tin Eláda* ‘I am from Greece’, and *metá* has an adverbial function, expressing the future, as in the sentence *ða se ðo metá* ‘I will see you later’.

- (5) a. Bound prefixes: *a-* (*á-γnostos* ‘unknown’), *dis-* (*dis-prófertos* ‘unpronounceable’), *ef-* (*ef-parusíastos* ‘presentable’), *kse-* (*kse-xorízo* ‘to distinguish’).
- b. Preverbs: *aná* (*anaféro* ‘to report’), *andí* (*andíyráfo* ‘to copy’), *apó* (*apoxoró* ‘to leave’), *ðiá* (*ðiayráfo* ‘to erase’), *is* (*ispnéo* ‘to breathe in’), *ek* (*ekpnéo* ‘to breathe out’), *en* (*entíno* ‘to tighten’), *epí* (*epivlépo* ‘to supervise’), *katá* (*kata-yráfo* ‘to register’), *metá* (*metaþéto* ‘to transpose’), *pará* (*parakáno* ‘to overdo’), *perí* (*periyráfo* ‘to describe’), *pro* (*protíno* ‘to propose’), *pros* (*prostréxo* ‘to hasten’), *sin* (*sintonízo* ‘to coordinate’), *ipér* (*ipertonízo* ‘to overstress’), *ipó* (*ipoyráfo* ‘to sign’).



A derived word has only one inflectional marker, but it may involve more than one derivational suffix. The cumulative order of derivational suffixes follows from their categorial and selectional properties. For instance, a derived word like *εκπαιδευτικός* ‘educational’ contains the prefix *εκ*, the stem *πεδ-* of the word *πεδί* ‘child’, the verbal suffix *-ev-*, the nominal suffix *-ti-*, the adjectival suffix *-ik-* and the closing inflectional suffix *-os* ([[[[*εκ*[*πεδ-εβ*]]-*τ*]-*ικ*]-*ός*]).

The following list displays the most frequent derivational suffixes in Greek. They are classified according to their category and the category of the base they select. Suffixes and examples are taken from Ralli (2005: 147–154).

(7) Noun suffixes

a. Denominal suffixes

a1. Various denominal suffixes

<i>-izm(os)</i>	<i>elinizmós</i>	‘Hellenism’	←	<i>élin(as)</i>	‘Greek’
<i>-isti(s)</i>	<i>elinistís</i>	‘Hellenist’	←	<i>élin(as)</i>	‘Greek’
<i>-ia</i>	<i>lemoniá</i>	‘lemon tree’	←	<i>lemón(i)</i>	‘lemon’
<i>-iliki</i>	<i>proedriliki</i>	‘presidency’	←	<i>próedr(os)</i>	‘president’
<i>-onas</i>	<i>eleónas</i>	‘olive field’	←	<i>elé(a)</i>	‘olive’

NB. *-iliki* is of Turkish origin (*-ilk*).

a2. Suffixes of ethnic nouns

<i>-[i/o]ti(s)</i>	<i>Meyarítis</i>	‘inhabitant of Mégara’			
	<i>Pireótis</i>	‘~ Pireás			(Piraeus)’
<i>-[i/a]n(os)</i>	<i>Zakinthinós</i>	‘~ Zákynthos			(Zante)’
	<i>Afrikanós</i>	‘~ Afrikí			(Africa)’
<i>-i/e(os)</i>	<i>Lésvios</i>	‘~ Lésvos			(Lesbos)’
	<i>Kerkiréos</i>	‘~ Kérkira			(Corfu)’
<i>-ez(os)</i>	<i>Verolinézos</i>	‘~ Verolínio			(Berlin)’

NB. *-ez(os)* originates from the Italian *-ese*.

a3. Suffixes of professional nouns

<i>-a(s)</i>	<i>yalatás</i>	‘milk man’	←	<i>yála</i>	‘milk’
<i>-dzi(s)</i>	<i>taksidzís</i>	‘taxi driver’	←	<i>taksí</i>	‘taxi’
<i>-ari(s)</i>	<i>varkáris</i>	‘boatman’	←	<i>várk(a)</i>	‘boat’
<i>-ieri(s)</i>	<i>portiéris</i>	‘doorman’	←	<i>pórt(a)</i>	‘door’
<i>-ador(os)</i>	<i>tornadóros</i>	‘turner’	←	<i>tórn(os)</i>	‘lathe’
<i>-isti(s)</i>	<i>podósferistís</i>	‘soccer player’	←	<i>podósfer(o)</i>	‘soccer’
<i>-ia(s)</i>	<i>isodimatías</i>	‘rentier’	←	<i>isódima</i>	‘income’

NB. As already stated, *-dzi(s)* is of Turkish provenance (*-cI*) and is the most frequent of all suffixes creating professional nouns. *-ador(os)* and *-ieri(s)* originate from the Italian *-atore* and *-iere*, respectively, while *-ari(s)* comes from the Latin *-arius*.

## a4. Diminutive suffixes

-aki	<i>ánthropáki</i>	‘little man’	←	<i>ánthrop(os)</i>	‘man/human being’
-itsa	<i>kuklitsa</i>	‘little doll’	←	<i>kúkl(a)</i>	‘doll’
-uli(s)	<i>γatúlis</i> .MASC/	‘little cat’	←	<i>γát(a)</i>	‘cat’
/ula/uli	<i>γatúla</i> .FEM/ <i>γatúli</i> .NEU				

NB. *-aki* is the most frequent diminutive suffix in Standard Modern Greek. It combines with nouns of all gender values, and creates neuter diminutives (Melissaropoulou and Ralli 2008). The suffix *-itsa* is feminine selects feminine bases and, as already mentioned, originates from Slavic. As for *-uli(s)/-ula/-uli*, they form masculine (*-uli(s)*), feminine (*-ula*) and neuter (*-uli*) diminutives, respectively. It should be noticed that the diminutive suffixes *-aki* and *-uli(s)/ula/uli* can also be added to adjectival bases in order to form diminutive nouns (see c below). In other words, they can be category changing.

## a5. Augmentative suffixes

-ar(os)/-ara	<i>pódaros</i> .MASC/ <i>podára</i> .FEM	‘big foot’	←	<i>pód(i)</i> .NEU	‘foot’
-akla(s)/-akla	<i>ádraklas</i> .MASC/ <i>adrákla</i> .FEM	‘big man’	←	<i>ádr(as)</i> .MASC	‘man’

NB. Greek augmentatives are exclusively masculine and feminine. Diminutives belong to all three gender values, although neuters are more frequent (Melissaropoulou 2009).

## a6. Suffixes forming feminine nouns (see also Pavlakou and Koutsoukos 2009)

-isa	<i>taverniárisa</i>	‘female tavern owner’	←	<i>taverniár(is)</i>	‘male tavern owner’
-ina	<i>dikiyorína</i>	‘female lawyer’	←	<i>dikiyór(os)</i>	‘male lawyer’
-u	<i>taksidzú</i>	‘female taxi driver’	←	<i>taksidz(ís)</i>	‘male taxi driver’

## b. Deverbal suffixes

-ti(s)	<i>xoreftís</i>	‘dancer’	←	<i>xorév(o)</i>	‘to dance’
-tira(s)	<i>kinitíras</i>	‘engine’	←	<i>kin(ó)</i>	‘to move’
-ea(s)	<i>singraféas</i>	‘writer’	←	<i>sinýráf(o)</i>	‘to write’
-si	<i>lísi</i>	‘solution’	←	<i>lín(o)</i>	‘to solve’
-m(os)	<i>skotomós</i>	‘killing’	←	<i>skotón(o)</i>	‘to kill’
-simo	<i>déximo</i>	‘fastening’	←	<i>dén(o)</i>	‘to fasten’
-ma	<i>diávazma</i>	‘reading’	←	<i>diaváz(o)</i>	‘to read’
-ia	<i>kaliéryia</i>	‘culture’	←	<i>kaliery(ó)</i>	‘to cultivate’
-i(o)	<i>γραφío</i>	‘office/desk’	←	<i>γράff(o)</i>	‘to write’
-tria	<i>xoréftria</i>	‘female dancer’	←	<i>xorév(o)</i>	‘to dance’

NB. *-ti(s)* and *-tira(s)* form both agent and instrumental nouns.

## c. Denominal and deadjectival suffixes

-otita	<i>ánthropótita</i>	‘humanity’	←	<i>ánthrop(os)</i>	‘human being’
	<i>ayaθótita</i>	‘goodness’	←	<i>ayaθ(ós)</i>	‘good’
-osini	<i>nikokirosíni</i>	‘tidiness’	←	<i>nikokir(á)</i>	‘housekeeper’
	<i>kalosíni</i>	‘goodness’	←	<i>kal(ós)</i>	‘good’
-ila	<i>kapníla</i>	‘smoky smell’	←	<i>kapn(ós)</i>	‘smoke’
	<i>kokiníla</i>	‘redness’	←	<i>kókin(os)</i>	‘red’
-ada	<i>varkáda</i>	‘boating’	←	<i>várk(a)</i>	‘boat’
	<i>aspráda</i>	‘whiteness’	←	<i>áspr(os)</i>	‘white’
-aki	<i>mikráki</i>	‘little person’	←	<i>mikr(ós)</i>	‘little’
-uli	<i>omorfúli</i>	‘little beautiful person’	←	<i>ómorf(os)</i>	‘beautiful’

NB. *-osini* does not generally combine with bases of popular origin. *-ada* originates from the Venetian *-ada*.

## (8) Adjectival suffixes

## a. Denominal

-in(os)	<i>nómimos</i>	‘legal/legitimate’	←	<i>nóm(os)</i>	‘law’
-er(os)	<i>laðerós</i>	‘oily’	←	<i>láð(i)</i>	‘oil’
-eni(os)	<i>asiménios</i>	‘silver made’	←	<i>asím(i)</i>	‘silver’
-isi(os)	<i>vunísios</i>	‘mountainous’	←	<i>vun(ó)</i>	‘mountain’
-ik(os)	<i>nomikós</i>	‘legal’	←	<i>nóm(os)</i>	‘law’
-in(os)	<i>ksílinos</i>	‘wooden’	←	<i>ksil(o)</i>	‘wood’
-ios	<i>uránios</i>	‘celestial’	←	<i>uran(ós)</i>	‘sky’

NB. Adjectival suffixes are listed in their masculine form. Their feminine and neuter counterparts end in *-i/-a* and *-o*, respectively.

## b. Deverbal

-t(os)	<i>skepastós</i>	‘covered’	←	<i>skepáz(o)</i>	‘to cover’
-sim(os)	<i>katikísimos</i>	‘inhabitable’	←	<i>katik(ó)</i>	‘to inhabit’
-tiri(os)	<i>kinitírios</i>	‘motive/driving’	←	<i>kin(ó)</i>	‘to move’
-te(os)	<i>plirotéos</i>	‘payable’	←	<i>pliro(no)</i>	‘to pay’
-men(os)	<i>ayapiménos</i>	‘beloved’	←	<i>ayap(ó)</i>	‘to love’

NB. *-tiri(os)* and *-te(os)* are of learned origin and do not combine with popular bases. *-men(os)* forms past participles; it is listed together with the adjectival suffixes, since participles in *-men(os)* are inflected like adjectives and have adjectival properties.

## c. Deadjectival (diminutives)

-uli(s)/ula/	<i>asprúlis</i> .MASC/	‘whitish’	←	<i>áspros</i> .MASC/	‘white’
<i>uliko</i>	<i>asprúla</i> .FEM/			<i>áspri</i> .FEM/	
	<i>asprúliko</i> .NEU			<i>áspro</i> .NEU	
-utsik(os)	<i>meyalútsikos</i> .MASC/	‘biggish’	←	<i>meýalos</i> .MASC/	‘big’
	<i>meyalútsiki</i> .FEM/			<i>meýáli</i> .FEM/	
	<i>meyalútsiko</i> .NEU			<i>meýalo</i> .NEU	

NB. *-utsik(os)* resulted from a combination of the Italian diminutive suffix *-uccio* and the Greek adjectival suffix *-ik(os)*.

*-uliko* contains a combination of the noun suffix *-uli* and the adjectival *-iko*.

## (9) Verbal suffixes

## a. Denominal

*-ar(o) filmáro* ‘to film’ ← *film* ‘film’

NB. As mentioned above, *-ar(o)* originates from the Italian infinitival marker *-are* (Ralli to appear)

## b. Denominal and deadjectival

<i>-iz(o)</i>	<i>zografizo</i>	‘to paint’	←	<i>zográf(os)</i>	‘painter’
	<i>kaθarízo</i>	‘to clean’	←	<i>kaθar(ós)</i>	‘clean’
<i>-ev(o)</i>	<i>psarévo</i>	‘to fish’	←	<i>psár(i)</i>	‘fish’
	<i>ayriévo</i>	‘to become wild’	←	<i>áyri(os)</i>	‘wild’
<i>-on(o)</i>	<i>kliðóno</i>	‘to lock’	←	<i>kliði</i>	‘key’
	<i>areóno</i>	‘to thin out’	←	<i>are(ós)</i>	‘loose, thin’
<i>-en(o)</i>	<i>θerméno</i>	‘to heat’	←	<i>θerm(ós)</i>	‘hot’
	<i>anaséno</i>	‘to breathe’	←	<i>aná(s)a</i>	‘breath’

## (10) Adverbial suffixes

<i>-a</i>	<i>kalá</i>	‘well’	←	<i>kal(ós)</i>	‘good’
<i>-os</i>	<i>akrivós</i>	‘exactly’	←	<i>akriv(is)</i>	‘exact’

NB. Both suffixes form adverbs out of adjectival stems. *-os* is the Ancient Greek suffix *-ós*; nowadays, it combines with bases of learned origin.

## 5. Blending

In Greek, blending is a rather novel but fast developing word-formation process, which is mostly found in the vocabulary of slang, used by young people and other well-defined social groups. According to Ronneberger-Sibold (2006) blends are deliberate creations resulting from the structural fusion of two words, the by-product of which is the truncation of segmental material from the inner edges of the two constituents, or from only one of them. With respect to Greek, it has been proposed by Ralli and Xydopoulos (to appear) that blends resemble compounds, since they involve the combination of at least two lexemes, are phonological words, and their structure follows the structure of [stem word] compounds (see section 3). In fact, Greek blends and compounds combine the same grammatical categories: there are noun-noun (e.g. *ayapúdi* ‘love song’ ← *ayáp(i)* ‘love’ + (*tray*)*údi* ‘song’) or adjective-noun instances (e.g. *vlaksitzís* ‘stupid taxi driver’ ← *vlaks* ‘stupid’ + (*taks*)*itzís* ‘taxi driver’), noun-verb (e.g. *sidirázo* ‘to buy a newspaper in order to get the CD’ ← *sidí* ‘CD’ + (*ayó*)*rázo* ‘to buy’), adverb-verb (e.g. *ípulegízo* ‘to approach in an insidious manner’ ← *ípul(a)* ‘insidiously’ + (*pros*)*egízo* ‘to approach’) and verb-verb ones (e.g. *vréalízi* ‘it rains in small drops’ ← *vréx(i)* ‘it rains’ + (*psi*)*xalízi* ‘to drizzle’), as well as adjective-adjective combinations (e.g. *psidrós* ‘tall and fat’ ← *psi(lós)* ‘tall’ + (*xo*)*drós* ‘fat’). Moreover, the constituent members of both categories bear the same functional relations, that is, subordinative, attributive and coordinative. Subordinative and attributive blends are subject to rightward headedness, exactly like endocentric compounds, where the head transmits its category and specific meaning to the new formation. Crucially though, and as opposed to compounding, where exocentric



constructions are productively built, Greek blending does not show any exocentric structures. Furthermore, blends are subject to a form reduction affecting both constituents, while the marker *-o-*, which is obligatory in compounds, never surfaces in blends.

Blends bear a prosodic structure, as put forward in the relevant literature (Arvaniti 1998): while the first constituent can be reduced to the point of keeping only the onset of the first syllable and the second constituent, i.e. the head, is reduced but keeps the maximum of material. Since blends, like compounds, are subject to right headedness, Ralli and Xydopoulos (2012) have suggested that maximization of the size of the head makes the structure easier to identify, and facilitates the semantic recoverability of the formation. Generally, the following instances of segment reduction can be identified: a) the syllabic length of the second constituent is maintained, while the first constituent contributes two syllables to the blend (e.g. *si.di.rá.zo* ‘to buy a newspaper in order to get the free CD’ ← *si.dí* ‘CD’ + *a.yo.rá.zo* ‘to buy’); b) the first syllable of the second constituent is replaced in its entirety by that of the first constituent (e.g. *vlá.ma* ‘extremely stupid’ ← *vlá.kas* ‘stupid’ + *vlí.ma* ‘thick’); c) the syllabic structure of the first constituent is almost entirely reduced except for the onset of its first syllable, which replaces the onset of the first syllable of the second constituent (cases termed ‘acro-blends’ by Koutita-Kaimaki and Fliatouras 2001) (e.g. *kró.po.li* ‘wax and propolis’ ← *ke.rí* ‘wax’ + *pró.po.li* ‘propolis’); d) the entire form of the second constituent is kept, and only the onset of the first one is added to it, producing voicing, where applicable (e.g. *kré.vo.me* ‘to burp while having a haircut’ ← *ku.ré.vo.me* ‘to have a haircut’ + *ré.vo.me* ‘to burp’). As generally noticed by Ronneberger-Sibold (2006), the extent of form reduction varies, depending on the speaker’s willingness to communicate a small or bigger part of the meaning of the combination.

Since blends are created intentionally, it is worth mentioning Ralli and Xydopoulos’ (2012) suggestion that blending is situated at the boundary of linguistic competence and creativity. On the one hand, blends share structural properties with compounds, thus, blending could be considered as part of the native speaker’s linguistic competence. On the other hand, blends differ from compounds in that speakers create them intentionally, for specific communicative purposes.

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