

Article

Morphological Integration of Loan Words in Kaliardá

Angela Ralli * and Andreas Rouvalis

Department of Philology, University of Patras, 26504 Rio-Patras, Greece; androuvalis@outlook.com

* Correspondence: ralli@upatras.gr

Abstract: This article deals with lexical borrowing and the morphological integration of loan words in Kaliardá, a Greek-based antilanguage, spoken in the urban areas of Greece by socially marginalized communities of cross-dressers, transgender people, and gay men. It is shown that the accommodation of most loans follows the general rules of Modern Greek morphology, namely, the stem-based word formation and compulsory inflection. However, for a considerable part of the borrowed items, there are certain morphological deviances compared to loan formation in Greek. More particularly, there is an overuse of the feminine grammatical gender, assigned to -human nouns, contrary to a neuterization tendency displayed by the Greek language, while the masculine grammatical gender is scarcely employed, and a significant number of feminine loans end in -o and -u in the citation form. Verbal loans do not substantially differ from those in Greek, with the exception of the frequent use of verbal periphrastic formations, consisting of an auxiliary inflected verb type, *avélo* or *vuélo* (both loans themselves), and a nominal item. Sometimes, *avélo* is also employed as a mediator for the integration of English verbs. The data under examination are drawn from a Kaliardá dictionary. Their accuracy is checked with 10 Kaliardá speakers in 2 big Greek cities, Athens and Patras, and they are enriched by a small oral corpus of 32 words collected through interviews. The investigated data comprise items from Italian, French and English, three principal donor languages in Kaliardá, but there are also loans from other languages, mainly from Romani and Turkish, but also from Albanian, German and Spanish.



Citation: Ralli, Angela, and Andreas Rouvalis. 2022. Morphological Integration of Loan Words in Kaliardá. *Languages* 7: 167. <https://doi.org/10.3390/languages7030167>

Academic Editors: Juana M. Licerias and Raquel Fernández Fuertes

Received: 3 February 2022

Accepted: 16 May 2022

Published: 1 July 2022

Publisher's Note: MDPI stays neutral with regard to jurisdictional claims in published maps and institutional affiliations.



Copyright: © 2022 by the authors. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (<https://creativecommons.org/licenses/by/4.0/>).

Keywords: Kaliardá; lexical borrowing; morphological integration; Greek; Italian; French; English

1. Kaliardá: An Introductory Overview

Kaliardá is a Greek variety that was originally created by socially marginalized communities of cross-dressers, transgender people, and was later picked up by gay men, as mentioned by Gkartzonika (2012). It is mainly used in the big urban areas of Greece, namely Athens, Thessaloniki and Patras. For many years, Kaliardá was thought to have appeared during the 1940s (Christopoulou 2016). Recently, however, the discovery of a 1904 issue of the satirical magazine *Petaktó Kórtē* brought new evidence, according to which the first attestation of Kaliardá, under the form of a short list of words, dates back to the beginning of the twentieth century. There is also a view spread among some Kaliardá speakers that the variety was created during the Ottoman era, that is, before the Greek independence war of 1821 and the creation of the first Modern Greek state in 1828 (Gkartzonika 2012). Moreover, a significant number of words which originate from Romani in the Kaliardá vocabulary, among which those naming the linguistic variety itself, has driven Montoliu (2005) to suggest that Kaliardá has been created in Gypsy male gay communities, although there are no diachronically relevant sources to justify this hypothesis. Today, the lexical influence on Kaliardá from languages other than Romani, for example from Italian, French and English, is bigger.

In the last 2 decades of the 20th century, the use of Kaliardá seems to have declined. In our opinion, there are basically two reasons for this. Firstly, the publication of a Kaliardá dictionary by Elias Petropoulos ([1971] 1993) contributed to the spread of the variety into the mainstream society, resulting to its inevitable fading as a secret language, limited to

people who did not abide to strict heterosexual norm. Secondly, through comedy, the variety got associated with an extremely offensive stereotype, that of an effeminate man, who should never be taken seriously and, thus, deserving to be ridiculed. In fact, in recent years, many speakers seem to have abandoned Kaliardá in an effort to disengage from this stereotype. As an additional reason, [Christopoulou \(2016\)](#) has proposed that the fading of Kaliardá was also instigated by opting out for other non-linguistic means of identity construction, for instance, clothing. Nowadays, Kaliardá has been confined to members of Lesbian, Gay, Bisexual, Transgender and Queer (LGBTQ) communities¹, who use it as an identity linguistic marker in various settings, as for instance in music ([Chalatsi 2018](#)). Nevertheless, all members of the LGBTQ communities do not necessarily speak the particular variety ([Gkartzonika 2012](#)).

In [Halliday's \(1976, 1978\)](#) terms, Kaliardá can be defined as an antilanguage that constitutes both a language of an antisociety and a sociolect, as it is utilized by a specific group of the social ensemble. The emergence of an antilanguage, that is, the creation of a linguistic variety that is used by a marginal community for group-internal communication, allows the speakers to have control over their language and communicate effectively in a variety of circumstances. It stems from the need to build “an alternative social structure, with its systems of values, sanctions, rewards and punishments” ([Halliday 1976](#), p. 573). The term ‘antisociety’ refers to a social subset that acts as a means of resistance to the social norm. Within an antisociety, individuals can construct the identity they wish without the danger of rejection, but “through the patterns of acceptance and gratification” ([Halliday 1978](#), p. 168). In this context, Kaliardá acts as “a marker of speech-community identity and membership, and fosters co-membership and camaraderie” ([Gkartzonika 2012](#), p. 26). It can also be characterized as a secret language which satisfies the need of speakers for secrecy. According to [Triandaphyllidis \(\[1947\] 1963, chp. 17\)](#), a secret language serves as a means of protection and defiance towards oppression imposed on its speakers by the society's limitations. Thus, for Kaliardá speakers, it ensures the exclusion of outgroups from communicating with them ([Gkartzonika 2012](#); [Swann et al. 2004](#), p. 281). Interestingly, a female Kaliardá speaker in P. Revenioti's documentary (recorded interview taken in [Καλιαρντά \[Kaliardá\] Documentary 2014](#), 7,05–7,08) is reported saying:

“We can talk about someone, make fun of him in his presence, without giving a clue of what we are talking about” (Translated from Greek by A. Rouvalis).

[Petropoulos \(\[1971\] 1993, p. 10\)](#) has proposed that Kaliardá has basically two varieties, Aplá Kaliardá (Simple Kaliardá) and Liárdo. Aplá Kaliardá is spoken by the majority of speakers, while Liárdo was created on the basis of Aplá Kaliardá and is used by the most initiated members of the antisociety. The latter consists of a smaller set of words, most of which derive from Aplá Kaliardá ([Rouvalis 2020](#)) and in [Petropoulos' dictionary](#); only 10% of the 3000 lemmas belong to Liárdo. In the current article, we use the term Kaliardá to refer to both subvarieties.

Kaliardá is phonologically and structurally based on Standard Modern Greek ([Petropoulos \[1971\] 1993](#); [Rouvalis 2020](#)). It shares with Greek its vowel and consonant system, syntax, and the structural pattern of morphological formations.² [Montoliu \(2005\)](#), who has examined the lexical stock of Kaliardá from an etymological perspective, has shown that words of all three morphological categories are represented in its lexicon, that is, inflected, derived, and compounds. More particularly, the Kaliardá lexicon contains a substantial number of Greek native words with their internal structure and inflection. In addition, a significant part of the lexical items results from *relexicalization* ([Halliday 1976, 1978](#)) and, thus, they diverge from the Greek items as far as roots (or stems) are concerned. Relexicalization is a process of insertion of new lexical resources into the grammatical frame of an existing language, which remains unaltered. Thus, according to [Halliday \(1976, 1978\)](#), it contributes to the formation of new varieties, as is the case of antilanguages, where it is employed to encode linguistic areas of interest that are considered to be central in a particular subculture. Its use is triggered by both linguistic and extra-linguistic factors, such as social, political and identificatory (on this, see also [Horvath and Wexler 1997](#),

p. 12). A similar notion to relexicalization is relexification, which has been used in studies dealing with the formation of pidgins and creoles, back in the 60's (see, among others, DeGraff 2002). Relexification was theoretically elaborated by Muysken (1981), who dealt with the insertion of Spanish vocabulary in Quechua, where the original meaning and use of the borrowed elements are kept and only their phonological representation is modified, or by Lefebvre and Lumsden (1989) and Lefebvre (1993, 1997, 1998) who studied the emergence of the lexicon in Haitian creole.³ However, the process of relexicalization (or relexification) has not been sufficiently investigated for the formation of antilanguages.

A basic characteristic of the Kaliardá lexicon is an overlexicalization of specific semantic fields concerning sexuality. For example, there are more than forty synonymous words for 'gay man' (for example, *anemómilos*, *krífo*, *karalubú*, etc.), four words for 'coitus' (*sarmoxamójelo*, *kuraváfiasma*, *kuravélta*, *kuraveltósimo*), and six words for 'female breast' (for example, *mudzadívaro*, *katsikanó*, *yalofuskú*, etc.). Moreover, there are ten words naming the variety itself (among others, *Kaliardá*, *Lubinístika*, *Fragolubinístika*, *Dzinavotá*). Interestingly, most of these names constitute lexical borrowings. For instance, *Kaliardá*, *Lubinístika* and *Dzinavotá* are based on roots borrowed from Romani, which appear combined with Greek inflectional endings, while *Fragolubinístika* is a Greek-structured compound with a first member from Romance (*frag-* < *franc* 'Western European') and the second member from Romani.

In Kaliardá, the significance of borrowing is striking. Borrowing is a core feature of queer varieties around the world (for an overview of these varieties see Barrett 2018, p. 216); the main reason for this is securing the secrecy of communication (Taylor 2007). The extensive influx of words from various languages and queer varieties suggests that speakers have several linguistic repertoires in their disposal, a fact that allows them to accommodate relexicalization in their vocabulary. Note that by examining the Turkish queer variety of Lubunca, Kontovas (2018) has challenged the idea that the abundance of borrowings in queer varieties could be achieved on the basis of extensive multilingualism. Nonetheless, a great number of loans from various languages are found in Lubunca as well, where Romani is the prime donor. Distinct from Lubunca, Polari, the English counterpart of Kaliardá, exhibits an extensive influence by Italian, and the name of the variety itself originates from the Italian verb *parlare* 'to talk'.

Some indicative examples of Kaliardá borrowed words are the following:⁴

(1)	Kaliardá loan	Origin
a.	<i>vísita</i> 'visit'	Italian <i>visita</i> 'visit'
b.	<i>bládis</i> 'doctor'	English <i>blood</i> 'blood'
c.	<i>grífi</i> 'nail'	French <i>griffe</i> 'claw'
d.	<i>madó</i> 'bread'	Romani <i>mařo</i> 'bread'
e.	<i>kukáro</i> 'cockroach'	Spanish <i>cucaracha</i> 'cockroach'
f.	<i>papí</i> 'document'	German <i>papier</i> 'paper'
g.	<i>duvdéza</i> 'coffin'	Albanian <i>te vdes</i> 'to die'
h.	<i>secéri</i> 'sweet'	Turkish <i>şeker</i> 'sugar'

The vocabulary of loans is not limited to some specific areas of interest of the community but extends to various semantic fields, as illustrated by the examples listed in (2), drawn from Italian, French and English, three of the principal donor languages in Kaliardá:

- (2)
- a. animals (*γυγύλφισ* 'wolf' < English *wolf*, *παπίτζα* 'butterfly' < French *papillon*, *χόρσι* 'horse' < English *horse*, *φιδέλις* 'dog' < Italian *fidele* 'faithful')
 - b. food (*φρομάζι* 'cheese' < French *fromage*, *κάρνο* 'meat' < Italian *carne*, *λακρίμι* 'onion' < Italian *lacrima* 'tear')
 - c. political and social organization (*ρένα* 'queen' < French *reine*, *ρένος* 'king' < French *reine* 'queen', *πριμάτσος* 'prime minister' < Italian *primo* 'first')
 - d. professions (*δράβις* 'driver' < English *driver*, *τελάρα* 'female tailor' < English *tailor*, *τελόρις* 'male tailor' < English *tailor*)
 - e. clothing (*πρεζαντασζόν* 'formal clothing' < French *presentation* 'presentation', *δρέσα* 'cloth' < English *dress*)
 - f. religion (*μिरάκλι* 'miracle' < French *miracle* 'miracle', *Γόδα* 'goddess' < English *God*, *σακρού* 'icon' < French *sacrée* 'sacred')
 - g. body parts (*σcίνι* 'skin' < English *skin*, *όci* 'ear' < Italian *occhio* 'eye', *griffi* 'nail' < French *griffe* 'claw')

In many cases, the exact origin of loans cannot be detected and, sometimes, it can be traced back to more than one language, as illustrated by the examples in (3), where glossing indicates the grammatical-gender value in Kaliardá, Italian and French (English nouns do not have a morphologically marked grammatical gender):

(3)	Kaliardá	Model word	Donor language
a.	fivros.MASC 'fever'	fièvre.FEM/fever 'fever'	French/English
b.	enémis.MASC 'enemy'	ennemi.MASC/enemy 'enemy'	French/English
c.	plafóna.FEM 'ceiling'	plafone.MASC/plafond.MASC 'ceiling'	Italian/French
d.	mirákli.NEU 'miracle'	miracle.MASC/miracle 'miracle'	French/English
e.	animáli.NEU 'animal'	animale.MASC/animal.MASC 'animal'	Italian/French
f.	futúri.NEU 'future'	futuro.MASC/futur.MASC/future 'future'	Italian/French/English

Assuming that loans are orally transferred, the predominant source language in the examples of (3) must be Italian, since the pronunciation of this language does not significantly differ from that of both Greek and Kaliardá, the latter being phonologically similar to Greek. This is not the case for English and French, the vowel systems of which are different from the Greek vowel system, which has only five vowels, /i/, /e/, /a/, /o/, /u/, as compared to the variety of vowels that we can find in French and English. However, if loans are adopted on the basis of written words, their origin can be difficult to determine. For example, the Kaliardá word for 'future' is *futúri*. Orally, it seems to be based on the Italian *futuro* /fu'turo/, not on the French *futur* /fy'tyr/ or on the English *future* /'fju:tʃər/. The only difference from the original Italian word is inflection, because *futúri* is accommodated according to the Greek inflection of neuter nouns in -i (see the Greek words *çéri* 'hand', *xartí* 'paper', etc.). In contrast, all three languages (Italian, French and English) seem to be possible candidates as donors, if the word is adopted from the written register (Italian *futuro*, French *futur*, English *future*).

In the following sections, we will describe and try to explain the morphological integration in Kaliardá of nouns and verbs originating from Italian, French and English, the main donor languages in this variety. Our data are drawn from 2 sources: (a) from Petropoulos' ([1971] 1993) dictionary⁵ (228 loans), the first to be published on this variety. Many of Petropoulos' loans come from Italian, French and English, while there are also examples from Greek⁶ and other languages such as Romani, German, and Spanish. A considerable number of them are of doubtful or even unknown origin; (b) from a corpus of 32 loans collected by Andreas Rouvalis, through interviews conducted with the use

of questionnaires⁷ with ten LGBTQ community members and Kaliardá speakers in two big cities: Athens and Patras. The interviewees were all male, as declared on their official documents, and ranged between 40 and 60 years old. The particular data collection was achieved during the global health crisis of COVID-19 pandemic, which undoubtedly had an impact on our research plans. More precisely, the imposed restrictions prevented us from conducting oral interviews. Moreover, during the lockdown, it was extremely hard to find speakers, because people were generally reluctant to talk about a variety associated with their sexuality to strangers, via internet, whom they had never met in person and, therefore, did not trust. For this reason, we were forced to restrict ourselves to a small number of informants (ten specifically) whom we already knew socially and were the ones who first brought the variety to our attention. A questionnaire sent to the interviewees via e-mail included two kinds of questions: close- and open-ended. The close-ended questions aimed at confirming, to some extent, the data provided by Petropoulos ([1971] 1993) in his dictionary. The second part of our questionnaire consisted of an open-ended question in which we asked the interviewees to give us any foreign word that comes to mind and is not included in Petropoulos' ([1971] 1993) seminal work. We subsequently asked them to use that word in a sentence.

From these 2 sources, we reached a total of 260 examples, 233 nouns and 27 verbs. In order to be sure about our findings and conclusions reported in this article, we selected loans of transparent etymology, and items that were part of Petropoulos' dictionary and verified by our informants.

From the data, it will become obvious that the inserted words in Kaliardá are fully adjusted to the Greek pronunciation, but sometimes, their meaning is metaphorically altered, depending on the particular needs of the speakers. For instance, the word for 'dog' is *fidélis*, borrowed from the Italian adjective *fidele* 'faithful' (or from the French *fidèle*), because a characteristic behavior of dogs is to be faithful to their masters; the notion of 'onion' is conveyed with the integrated loan *lakrími*, originating from the Italian noun *lacrima* 'tear', since cutting onions may bring a person to tears.

The article is structured into two main sections, followed by a summary. The first introductory section presents an overview of Kaliardá and some of its peculiarities. The transfer of foreign nouns and verbs as well as the characteristics and strategies of their accommodation are presented in Section 2, which is divided in two subsections. Section 2.1 is dedicated to verbal loans and Section 2.2 contains the borrowed nouns and the properties of their integration. Finally, Section 3 has a summary of the observations concerning the investigated data, the findings and the proposals that are put forward in Section 2.

2. Loan Word Accommodation in Kaliardá

With some exceptions mentioned below, Kaliardá generally obeys the rules of loan adoption and adaptation in Greek (see, among others, Ralli et al. 2015; Melissaropoulou 2016; Ralli 2021; Ralli and Makri 2020). It has borrowed mainly nouns, but also verbs, though to a lesser extent. Sporadic examples can be found from other grammatical categories, such as adjectives (for example, *kretinú.FEM* 'stupid' < Italian *cretina.FEM* 'stupid', pronouns (for example, *emánde* 'me, my' < Romani *mande* 'me') and other parts of speech (for example, *náka* 'not' < Romani 'not'). Thus, Kaliardá conforms to Haugen's (1950) borrowability scale, proposed for Norwegian and Swedish immigrant speech in the US, where nouns are the most frequent category of transfer, followed by verbs and the other categories.⁸

As mentioned in the introduction, in this article, we focus on the accommodation of loan verbs and nouns from three languages which have greatly influenced Kaliardá as donors, namely, Italian, French and English. As a first observation, it is important to point out that most loan verbs and nouns appear to be fully integrated in Kaliardá, carrying inflection according to the Greek morphological pattern, where an inflected item consists of a stem and an inflectional suffix.⁹ That is why loan nominal and verbal items are reanalyzed as stems before accepting the addition of the Greek inflectional suffix, while sometimes,

inflection is preceded by a derivational suffix, such as the following Kaliardá example depicts, drawn from borrowing from English:

(4)	Kaliardá klin-ár-o ¹⁰	<	English clean
	clean-DSUF-1SG		
	‘I clean’		

Therefore, assuming that Kaliardá is a non-regional variety of Greek, it obeys the basic principles of the recipient’s morphology, as has been expected regarding the role of morphology in contact settings involving morphologically rich languages (see, among others, Sankoff 2001; Gardani et al. 2015). Nevertheless, there are also sporadic cases of Kaliardá uninflected borrowed items, mainly nouns. Nouns originate either from nouns (5a) or from the register of expressions (5b), which usually adopt a metaphorical meaning, without any addition of inflection. In these cases, all relevant nominal morpho-syntactic features, that is, gender, case, and number, are provided by an accompanying item, such as the article in the examples below:

(5)	Kaliardá		Origin
a.	to	buá	French bois
	the.NEU.SG	flower	wood.MASC
	‘the flower’		‘wood’
b.	o	tutafé	French tout à fait
	the.MASC.SG	absolute	‘absolutely’
	‘the panhedonist’		

It is worth mentioning that most uninflected loan nouns in Kaliardá come from French; there is a very small number of loans from English, and none from Italian. This difference from donor to donor may be due to the fact that, from the three languages, only Italian bears overt inflectional endings and, thus, Italian nouns are not morphologically distant from the Greek ones, which are also overtly inflected.¹¹

With respect to verbs, we found only one instance¹² which is kept as such, the English *close*, but it appears as the second part of a verbal periphrasis, combined with the auxiliary verbal form *avélo*, a loan from the Romani verb *avel* ‘be, become, come’.¹³

(6)	Kaliardá	English
	avélo kloz	to close
	‘I close’	

Today, *avélo* is not employed alone.¹⁴ In both our corpus and the Petropoulos’ dictionary, it always appears combined with a native Greek or a loan item, nominal and adverbial, or even with a sound imitation, to express various verbal meanings (for example, *avélo xtípes* ‘I inject drugs’ < Greek **xtípa*.FEM < Greek *xtipó* ‘I hit’, *avélo kontratémpe* ‘I push’ < Italian *contratempo* ‘countertime, against’, *avélo puf* ‘I smoke’, etc.).¹⁵ Sometimes, there is an alternative form to the *avélo* periphrasis, consisting of the loan item, the verbalizer *-ar-* (see discussion in Section 2.1) and the relevant inflectional suffix, as for instance, *kontratempáro* ‘I push’. Parallel to the *avélo* periphrasis is that with *vuélo*, a more recent formation according to Petropoulos ([1971] 1993), which sometimes alternates with the *avélo* one, without any difference in meaning, as in *vuélo xtípes* ‘I inject drugs’, or it produces a different verbal meaning (compare *avélo dzóka* ‘I play’ and *vuélo dzóka* ‘I kiss’ < English noun *joke*). *Vuélo* can also be used with loans, other than those combined with *avélo* (for example., *vuélo ksplíka* ‘I explain’ < French *expliquer*), and, occasionally, the periphrasis alternates with a one-word verbal form in *-aro* (for example, *explikáro* ‘I explain’). Similarly to *avélo*, *vuélo* is a non-independent word, but while *avélo* comes from Romani, *vuélo* originates from the Italian verb *volere* or from the French *vouloir* ‘to want’. We are driven to this etymology by both the form and the meaning of ‘willingness’ that is often expressed in the *vuélo* constructions.

In Petropoulos' ([1971] 1993) dictionary, there is a total of 74 periphrases with *avélo* and 36 ones with *vuélo*, while in the corpus collected through interviews, there are 9 occurrences of *avélo* and 5 with *vuélo*. Given the variety of meanings that both *avélo* and *vuélo* can assume in their periphrastic constructions, that is, 'be, become, do, have, want, give, take, put', as well as a light verb function (see Section 2.1), we are tempted to propose that they have undergone a kind of grammaticalization: they have become functional elements, parts of verbal periphrases, fulfilling the need of Kaliardá speakers to enrich the domain of the small number of one-word verbs with verbal expressions.

In what follows, we examine in detail the integration of both verbs and nouns in Kaliardá by investigating their most typical characteristics.

2.1. Verbal Loans

According to Wohlgemuth (2009), there are three integration strategies for verbal loans: direct, indirect and the strategy involving the use of an auxiliary element (light verb for Wohlgemuth). According to the direct strategy, the loan is used as such and only its pronunciation may be altered in order to match the pronunciation of the recipient language. Among the verbal loans of this strategy, we should also list those which bear compulsory inflection that is employed by default, as is the case for Greek, and, thus, it cannot be considered to constitute a true integrating element (on this, see also Wohlgemuth 2009). The indirect strategy concerns accommodation with the help of an integrator, usually a native, productively used, derivational suffix, which is added after the borrowed element and before the native inflectional material. Loans which are accommodated according to the third strategy are not morphologically modified, in that they do not bear any derivation or inflection, but they are preceded by an auxiliary verb, which carries all native inflectional features. Let us see how the three strategies are represented in Kaliardá verbal loans.

Similarly to Greek, most borrowed verbs appear to be integrated with the use of the verbalizer *-ar-* and are inflected following the Greek first verbal inflection class (VIC1).¹⁶ In other words, their accommodation obeys the indirect strategy. Note that *-ar-* is a loan itself, since it originates from the Italo-Romance infinitival suffix *-are* (for example, Italian *parl-are* 'to speak'). It has been adopted in Greek, and by allogeous exaptation (Gardani 2016) it has been changed into a derivational suffix; it has assumed the specific duty to build verbs from nominal or verbal bases of languages other than Greek (see Ralli 2012a, 2012b, 2016, 2021 for details).¹⁷ Consider the following indicative Greek examples, which contain a borrowed base recategorized as stem, the integrating element *-ar-*, and the Greek personal endings:

- (7)
- | | | | |
|----|-------------------|----|--|
| a. | English (to) film | -> | Greek film-ár-o 'I film'
film-ár-is 'you film'
film-ár-i '(s)he films'
etc. |
| b. | French maquiller | -> | Greek makij-ár-o 'I make up'
makij-ár-is 'you make up'
makij-ár-i '(s)he makes up'
etc. |

It is important to stress that, according to the requirements of Greek morphology, verbal loans adapted via the indirect strategy are reanalyzed/recategorized as stems in order to fit the stem-based Greek derivational pattern. Before becoming a stem, the borrowed item is adjusted to the Greek pronunciation and/or undergoes deletion of its native ending. For illustration, see the verbs in (8), originating from Italian, English and French, nowadays used as Kaliardá loans:

(8)		Kaliardá	Origin
a.	vin-ár-o	'I drink'	Italian vino.MASC
b.	plej-ár-o	'I play'	English play
c.	stop-ár-o	'I stop'	English stop
d.	kup-ár-o	'I cut'	French couper
e.	les-ár-o	'I leave, I abandon'	French laisser
			'to leave'

Less frequently than *-ar-*, another verbalizer which appears in Kaliardá verbs based on loan items (verbs or nouns) is *-iaz-*, as the data in (9a,b) depict, while there are also sporadic examples with a third verbalizer, *-ev-* (9c). The choice of a specific verbalizer to integrate a verb is rather ad hoc and does not depend on the language the loan comes from.

(9)		Kaliardá	Origin
a.	virdziɲ -áz-o	'I close'	English virgin
b.	mirakál-áz-o	'I admire'	French miracle.MASC/English miracle
c.	mutš-év-o	'I tick, I deceive'	Italian mucciare
			'to escape, to slip away'

Note that both *-iaz-* and *-ev-* belong to the most productively employed suffixes for loan verb integration in the history of Greek. *-iaz-* was frequent in the verb adaptation of items of Gallo-Romance origin in Medieval Cypriot, during the Gallo-Romance dominion (ca. 12th–14th c. AD), as shown by Ralli (forthcoming), while *-ev-* is attested in verbal loans of Pontic and South Italian Greek (Ralli 2021).

(10)	Loan	Origin
a.	Cypriot kunsentiázo	Gallo-Romance (Old Provençal)
	'I consent'	cousentir
b.	Pontic ɣantur-év-o	Turkish kandırmak
	'I trick'	'to trick'
c.	Griko kunt-é-o ¹⁸	Salentino kuntare
	'I narrate'	'to narrate'
d.	Greko spend-éggu-o ¹⁹	Calabrian spend-iri
	'I spend'	'to spend'

Ralli (2021) has argued that the use of *-ev-* in both Pontic and South Italian Greek shows the conservative character of these varieties, since *-ev-* was the most productive verb-forming suffix in Ancient Greek (Chantraine 1933). As for the productivity of *-iaz-*, it has been attested in certain areas of the Medieval Greek speaking world, among which, Cyprus and the Peloponnese (Chatzidakis 1905–1907).

It should be further mentioned that, with the exception of the Italian-based *-ar-* which is added to foreign bases, the specific verbalizers, *-iaz-* and *-ev-*, come from the array of the available native Greek derivational suffixes. They are productively used in Greek denominative verb formation, as the following examples illustrate:

- (11)
- | | | | |
|----|------------|---|---------------------------------|
| a. | muxl-iáz-o | < | Greek múxl(a).FEM ²⁰ |
| | 'I mould' | | 'mould' |
| b. | xor-év- | < | Greek xor(ós).MASC |
| | 'I dance' | | 'dance' |

Although to a limited extent compared to the indirect strategy, the direct strategy is also attested in Kaliardá loan-verb formation, that is, the strategy which does not involve any use of integrators but implies only the addition of an inflectional suffix and presupposes the reanalysis of the foreign word into a stem in order to receive inflection. Note that this strategy is common in verb borrowing from Italian, since most Italian infinitival forms contain *-ar-* in their native infinitival ending, that is, the predecessor of the Greek (and Kaliardá) *-ar-* integrator. Therefore, the only requirement for the insertion of Italian verbs is the addition of Greek inflection, as in (12):

- (12)
- | | | |
|----|--------------|---------------|
| | Kaliardá | Italian |
| a. | tornáro | tornare |
| | 'I return' | 'to return' |
| b. | trotáro | trottare |
| | 'I travel' | 'to trot' |
| c. | kodináro | continuare |
| | 'I continue' | 'to continue' |

As far as the two insertion strategies, direct and indirect, are concerned, it is important to point out that they create formations which are inflected according to the first verbal inflection class (VIC1). Verbal loans belonging to the second verbal inflection class (VIC2) are absent from Kaliardá. In this respect, Kaliardá differs from a significant number of VIC2 verbal loans originating from Turkish, which appear in some Modern Greek varieties. See, for instance, the Asia Minor Aivaliot (Ralli 2019), where VIC2 loans are very common (for example, Aivaliot *axtardó* 'I overthrow' < Turkish *aktardı*, third person singular of the past tense of the verb *aktarmak* 'to overthrow').

Finally, the third strategy entailing the use of an auxiliary verb, which acts as a verbal shell integrating the loan, is rather absent from the Kaliardá verb accommodation. There is one exception: the periphrastic form *avélo klox* 'I close', which is mentioned in (6). In this periphrasis, the English verb remains uninflected, while *avélo*, a verbal loan from the Romani *avel* 'be, become, come', is used in Kaliardá with an auxiliary, integrating function. Note that the auxiliary verb strategy is completely absent from verb integration in Modern Greek dialects and its use has been discussed by Ralli (2012b, 2016) within the context of Greek immigrant and heritage varieties affected by English in the US, Canada, and Australia. Interestingly, while these immigrant and heritage varieties employ the native Greek verb *káno* 'to do' (for example, Canadian Greek *káno fry* 'I fry', *káno wake up* 'I wake up') as a kind of integrator, Kaliardá uses the Romani verb *avélo*. Ralli (2012b, 2016) has suggested that the particular strategy is preferred when the loan verb originates from a language with poor verbal morphology, as is, for instance, English. In this way, while the compulsory inflection is carried out by the native *káno*, the loan remains uninflected and, thus, aligns with the inflectional properties of the donor. This suggestion is corroborated by the rare evidence provided by Kaliardá, where in the verb periphrastic formation containing *avélo*²¹ as integrating element and an English verb (for example, (6a)), the borrowed verb is morphologically unchanged, while *avélo* displays the verbal inflection of Greek (*avel -o.1SG*), and its endings vary according to the person-number context (for example., *avel-is.2SG klox* 'you close', *avel-i.3SG klox* '(s)he closes', etc.).²²

2.2. Nominal Loans

As opposed to verbal loans which are massively adapted according to the indirect strategy, Kaliardá mainly employs the direct strategy to integrate nominal loans, aligning

with Greek and its areal varieties, where loans from Turkish and Romance are inserted in the vocabulary (see also [Ralli et al. 2015](#); [Melissaropoulou 2016](#); [Manolessou and Ralli 2020](#) for details). There is a limited number of Kaliardá loan nouns that are accommodated with the indirect strategy (see end of Section 2.2), while there is no strategy implying the use of any auxiliary element.

As has been the case with verbs, in this subsection, indicative examples of Kaliardá nominal loans are given in the citation form, this time in the nominative singular, unless the noun is used only in the plural number. Grammatical gender is indicated for those languages where grammatical gender constitutes an overtly realized feature (Italian or French) and the original item is translated only if its meaning differs from that of the loan. As depicted in (13)–(15), Kaliardá does not always keep the grammatical gender of the borrowed item, while a change may also occur in the pronunciation, the meaning and stress placement:

(13)	Kaliardá	Italian
	kudzínos.MASC	cugino.MASC
	‘brother’	
	móndos.MASC	mondo.MASC
	‘world’	
	lútsis.MASC	luce.FEM
	‘sun’	‘light’
	vestíta.FEM	vestito.MASC
	‘disguise’	‘dress’
	veritá.FEM	verità.FEM
	‘truth’	
	tésta.FEM	testa.FEM
	‘head’	
	kárbono.NEU	carbone.MASC
	‘coal’	
	léti.NEU	letto.MASC
	‘piece’	‘bed’
	kárno.NEU	carne.FEM
	‘meat’	
	tuváli.NEU	tovaglia.FEM
	‘handkerchief’	‘tablecloth’
(14)	Kaliardá	French
	sakrú.FEM	sacrée.FEM
	‘icon’	‘sacred’
	fransí.FEM	Français.MASC
	‘gay man’	‘French’
	réna.FEM	reine.FEM
	‘queen’	
	rénos.MASC	reine.FEM
	‘king’	
	kabára.FEM	cabaret.MASC
	‘pub’	
	musúro.NEU	mouchoir.MASC
	‘towel’	‘handkerchief’
	grífi.NEU	griffe.FEM
	‘nail’	‘claw’
	sjélos.MASC	ciel.MASC
	‘sky’	
	súkra.FEM	sucre.FEM
	‘sugar’	
	prézantashón.FEM	présentation.FEM
	‘formal wear’	‘presentation’

(15)	Kaliardá	English
	batéro.FEM	butter
	‘fat’	
	skrúdza.FEM	screw
	‘screw’	
	drésa.FEM	dress
	‘cloth’	
	telóris.MASC	tailor
	‘male tailor’	
	jánkis.MASC	Yankee
	‘American’	
	cek.NEU	cake
	‘immature boy’	
	gífti.NEU	gift
	‘gift’	
	frídzo.NEU	fridge
	‘fridge’	
	léði.FEM	Lady
	‘gay man’	
	Gódis.MASC	God
	‘God’	

Beside these creations and others of similar structure, there are also those which blend constituents from different languages in a kind of inflected compounds, where the compound structure displays the Greek pattern, that is, it has the compound marker -o- between the basic constituent parts and inflection (Ralli 2013). For illustration, consider the examples in (16):

- (16)
- xótsolos.MASC ‘sun’ (another word for ‘sun’ beside lútsis, see (13)) < English hot + Italian sol(e) ‘sun’ + Greek inflectional suffix -os
 - fastsiðerókaro.NEU ‘rapid train’ < English fast + Greek stem siðer- ‘iron’ + Greek compound marker -o- + English car + Greek inflectional suffix -o
 - terolimnúðes.FEM.PL ‘mud.PL’ < Italian terr(a)/French terre ‘earth’ + Greek compound marker -o- + Greek limn(i) ‘lake’ + Greek stem ending segments -uð- + Greek inflectional suffix -es
 - ofitsóftero.NEU ‘air force officer’ < Italian uffici(o) ‘office’ + Greek compound marker -o- + Greek fter(ó) feather’ + Greek inflectional suffix -o

It should be noted that most data in (13)–(15) confirm what has been observed by Ralli (2002) with regards to grammatical gender assignment in Greek: human nouns denoting male entities are allotted the masculine gender, while the feminine gender characterizes nouns designating a female person.²³ Some Kaliardá examples include *telóris*.MASC (<English *tailor*), *réna*.FEM ‘queen’ (<French *reine*), *kudzínos*.MASC ‘brother’ (<Italian *cugino*).

Nevertheless, one can also find exceptions to the +human feature as gender activator, due to linguistic or extra-linguistic factors. Consider the following cases: (a) feminine gender allocation is extended to naming gay men, even when the original nouns appear to be masculine in the donor language, as in the Kaliardá *fransí*.FEM ‘gay man’ < French ‘French; (b) the word for ‘air-force officer’, *ofitsóftero* (16d), is neuter, triggered by a desire to make fun of officers; (c) *pópolo* ‘people’, borrowed from the Italian masculine noun *popolo*, is also neuter, but for a different reason from *ofitsóftero*: here, one can evoke the phonological similarity of the endings between the donor and the recipient language: *popolo* in Italian ends in -o, and Kaliardá speakers probably match it with the Greek inflectional suffix -o of many Greek native neuter nouns and adjectives in the citation form, that is, in the nominative singular. See, for instance, the Greek neuter noun *vunó* ‘mountain’ and the neuter adjective *psiló* ‘high’ as in the noun phrase *to psiló vunó* ‘the high mountain’.²⁴

Finally, nouns designing animals can be masculine, feminine or neuter, similarly to Greek. In the spirit of [Dahl \(2000\)](#), who has argued that animals are mapped between human and inanimate entities in the animacy continuum, something which makes some animals (for example, mammals) to be considered as +human, a number of Kaliardá loanwords denoting animals are accommodated twice, carrying different gender specifications and inflectional suffixes. Consider, for instance, the English word *wolf*, which appears under the forms of masculine *γυγύλfis* and feminine *γυγύλfo*. Both formations involve doubling of the syllable *-γυ-*, representing an imitation of the wolf's howling, addition of a stem final vowel (/i/ for masculine and /o/ for feminine)²⁵ and the appropriate inflectional material taken from the range of Greek inflectional suffixes (for example, in the nominative singular, *-s* for *γυγύλfis* and *ø* for *γυγύλfo*).²⁶

As far as -human nouns are concerned, they generally show all three grammatical gender values, that is, masculine, feminine and neuter, but to a noticeably different extent. More particularly, there are many neuter nouns, in alignment with the property of Greek -human nouns and those of most Modern Greek varieties, regional, immigrant and heritage, to be predominantly neuter.²⁷ Note that neuter has been proposed to be the default grammatical gender for -human Greek nouns (also known as the unmarked gender) in a number of works, among others, in [Dressler \(1997\)](#), [Anastassiadi-Symeonidi \(1994\)](#) and [Christofidou \(2003\)](#). According to [Chatzidakis \(1905–1907\)](#), the prevalence of neuter exists in the Greek language since the late Medieval period (ca. 11th c.–16th c. AD), and it seems that Kaliardá is not an exception to this rule. Nevertheless, the Greek-based tendency for assigning neuter gender is often overruled by a marked preference in Kaliardá to employ the feminine value, as the following examples illustrate:

(17)		Kaliardá	Italian
	a.	kolóra.FEM 'painting'	colore.MASC 'color'
	b.	kuóra.FEM 'heart'	cuore.MASC 'heart'
	c.	letsóna.FEM 'lesson'	lezione.FEM 'lesson'
(18)		Kaliardá	English
	a.	divórsa.FEM 'divorce'	divorce
	b.	dzóka.FEM 'game'	joke
(19)		Kaliardá	French
	a.	kabára.FEM 'pub'	cabaret.MASC 'pub'
	b.	plafóna.FEM 'ceiling'	plafond.MASC (or Italian plafone.MASC) 'ceiling'

For a number of loans originating from Italian, one could evoke the influence of the grammatical gender of the source as a trigger for grammatical gender allocation in the target language. Thus, the feminine gender of the Italian word *lezione* 'lesson' (17c) is kept in the Kaliardá *letsóna*, contrary to the neuter value that characterizes the Greek corresponding word *máthima*.NEU 'lesson'. However, the influence of the source language is not always decisive, since for the French masculine *cabaret* (19a) and the Italian masculine *plafone* (or the French *plafond*) of (19b) we observe the feminine gender in Kaliardá. In each example of (17)–(19), addition of the *-a* stem formative takes place²⁸, which characterizes the most productive Greek feminine nouns.²⁹

Although not frequently activated, another factor for the presence of feminine gender may also be the existence of a synonymous native noun in Greek, as shown by the examples under (20a–c).

(20)		Kaliardá	Origin	Native Greek
a.	kuóra.FEM	‘heart’	Italian cuore.MASC	karðjá.FEM
b.	súkra.FEM	‘sugar’	French sucre.MASC	záxari.FEM
c.	prúfa.FEM	‘proof’	English proof	apóðiksi.FEM
d.	lútsis.MASC	‘sun’	Italian luce.FEM	ílos.MASC
			‘light’	‘sun’

In fact, for certain formations, the influence of the recipient language is unquestionable, and not only for feminine gender assignment. As shown in (20d) (see also (22) for more cases), the loan noun can be masculine driven by the masculine value of a synonymous Greek noun. Apart from the grammatical gender assignment, the influence of the recipient is also obvious in some blend formations, as for example the neuter noun *pilári* ‘pillow’, which contains the English segment *pil-*, from *pillow*, and the Greek ending *-ari* from the Greek native neuter word *maksilári* ‘pillow’.

Given the large number of feminine -human loan nouns, which overcomes those of the Greek language, we propose that feminine holds a prominent position in the grammatical gender assignment in Kaliardá loans originating from all donor languages, competing the tendency for neuterization. As reported by Gkartzonika (2012, p. 27), some speakers justify this preference by a desire for playfulness. The predominance of the feminine gender contrasts gender allocation in Greek, where -human nouns can be masculine, feminine, and mainly neuter.

Crucially, feminine loan-formation displays another peculiarity in Kaliardá, as compared to feminine loans in Greek: a significant number of them, about 62 in our corpus, end in -u (45) and -o (17) in the citation form (for example, *sakríu*.FEM ‘icon’ < French *sacrée*, *virdzíno*.FEM ‘virgin’ < English *virgin*). These final vowels are also present in a relatively small number of Greek native nouns that are mainly used in the vernacular language and constitute formatives for building stem allomorphs of the singular number. For illustration, consider the Standard Modern Greek *alepú*.FEM ‘fox’ and the vernacular Greek *palávo*.FEM ‘foolish’; in the singular number, they display a $\emptyset$ inflectional suffix in nominative, accusative and vocative cases and -s in the genitive case (for example, Greek *alepú-s*, Kaliardá *sakríu-s*, Greek *palávo-s*, Kaliardá *virdzíno-s*).³⁰ In the plural number, a -ð- segment is added to nouns in -u (for example, Greek *alepúð-es*.NOM/ACC/VOC.PL, Greek *alepúð-on*.GEN.PL, Kaliardá *sakríð-es* NOM/ACC/VOC.PL ‘icons’, Kaliardá *sakríð-on*.GEN.PL, -es and -on being the relevant inflectional endings), whereas items in -o show a stem allomorph without the formative vowel (for example, Greek *paláv-es*.NOM/ACC/VOC.PL, *paláv-on*.GEN.PL Kaliardá *virdzín-es*. NOM/ACC/VOC.PL *virdzín-on*.GEN.PL).³¹

Up to this point, we have claimed that the vast majority of -human nouns range between feminine and neuter grammatical gender. This also justifies the double accommodation of the English noun ‘butter, which occurs as feminine in the singular number, and as neuter in the plural:

(21)		Kaliardá	English
a.	batéro.FEM.SG	‘fat’	butter
b.	batérja.NEU.PL	‘fat’	butter

Only few -human loans are masculine, most of them because of an existing corresponding Greek masculine noun (see also (20d)):

(22)	Kaliardá	Origin	Native Greek
a.	móndos.MASC 'world'	Italian mondo.MASC/ French monde.MASC	kózmos.MASC 'world'
b.	sjélos.MASC 'sky'	Italian cielo.MASC/ French ciel.MASC	uranós.MASC 'sky'
c.	krósos.MASC 'cross'	English cross	stavrós.MASC 'cross'

It is important to point out that a comparison of the borrowed nouns in the three donor languages under examination, that is, Italian, French and English, reveals the crucial role played by the phonological similarity of the endings between the donor and the recipient language, most particularly of the word-final vowels between the Italian donor and the Greek/Kaliardá recipient, for allotting a specific gender value. For instance, most Italian masculine nouns ending in -o (for example, *olio* 'oil') and feminine nouns ending in -a (for example, *visita* 'visit') are transferred in Kaliardá as neuter nouns in -o (for example, Kaliardá *óho*) and feminine ones in -a (for example, Kaliardá *vízita*), respectively. The *pópolo*.NEU 'people' example, mentioned above, is another indicative case of this type of gender assignment. However, due to competing factors that are at play, there are notable deviances from the aforementioned tendencies, for instance the existence of synonymous Greek words (for example, Kaliardá *kudzínos*.MASC 'brother' < Italian *cugino*.MASC 'cousin' Greek *adelfós* 'brother').

It is also possible that the matching of endings between the Italian lexical borrowings in -a and the Greek native words also in -a contributes to the enhancement of the big number of feminine loan nouns in Kaliardá, even when the original word is not feminine. Consider the noun *artista*, which can be masculine or feminine in Italian but is accommodated in Kaliardá only as the feminine *artístá*, because Greek nouns ending in -a in the citation form are always feminine. Nevertheless, an explanation referring to the matching of endings is not always valid as is the case of French nouns in (22a,b) and (23a)³² or in that of the English ones, which end in a consonant ((22c), (23b)).

(23)	Kaliardá	Origin
a.	kabára.FEM 'pub'	French cabaret.MASC
b.	divórsa.FEM 'divorce'	English/French divorce

We further believe that a matching of the word-final vowels between the borrowed items from Italian and the Greek native words plays a crucial role not only in gender determination, but also as far as the allocation of a particular form of inflection is concerned.

Generally, loan noun integration in Kaliardá implies not only grammatical gender assignment but distribution to specific nominal inflection classes (NICs as well), as is also the case of Greek nouns and those of most Modern Greek dialectal varieties. According to [Ralli \(2000\)](#), Standard Modern Greek has eight nominal inflection classes: NIC1 and NIC2 contain masculine nouns, NIC3 and NIC4 consist of feminine nouns and NIC5-8 contain neuter ones. Standard Modern Greek + human nouns inflect according to the first three inflection classes, which also contain -human masculine and feminine nouns. NIC4 is reserved to abstract feminine nouns of usually learned origin, while the last 4 classes comprise neuter nouns, with some exceptions characterized by the -human feature (see [Ralli 2000, 2022](#) for details). In Kaliardá, loan nouns appear inflected according to NIC1 (masculine nouns in -os, for example, *siélos* 'sky' < Italian *cielo*), NIC2 (masculine nouns in -is, for example, *bládis* 'surgeon' < English *blood*), NIC3 (feminine nouns in -a, for example, *lága* 'water' < Italian *l'acqua*, -o, *enémo* < French *ennemie* / English *enemy*, or -u *gloriú* 'glory' < English *glory* / Italian *gloria*), NIC5 (neuter nouns in -o, for example, *frídzo* < English fridge) and NIC6 (neuter nouns in -i, for example, *grifi* < French *griffe*). There are also 2

occurrences of NIC3 feminine nouns in -i, *fransí* (< French *Français*) and *léði* (< English *Lady*), both denoting a gay man.³³

Crucially, the matching between the final vowel of the original items and the final vowel of Greek nouns does not trigger only grammatical gender assignment but may ascribe loans to specific inflection classes. This often occurs in the case of Italian-based loans (for example, Kaliardá NIC3 *libertá* ‘freedom’ < Italian *libertà*), and rarely in that of loans of another origin, as is the English *Yankee*, which has been transferred in Kaliardá as the NIC2 *jánkis* ‘American’. However, notable exceptions exist, most often due to the influence of a corresponding Greek noun. Beside the cases illustrated in (20) and (22), consider the Kaliardá word *soldátis* ‘soldier’ which derives from the Italian masculine noun *soldato* ‘soldier’: it is classified as a NIC2 noun (nouns in -is), instead of being assigned to NIC1 (nouns in -os), because the Greek word for soldier, *stratiótis*, ends in -is. Moreover, the French word *jalousie* ‘jealousy’ is accommodated as the NIC3 *zalúza*, influenced by the Greek corresponding word *zíla* ‘jealousy’. We should add that in feminine nouns, the final vowel of the accommodated loan, that is, whether it is /a/ or less frequently /u/ and /o/ (for example, Kaliardá *verγonú* ‘shame’ < Italian *vergogna*, Kaliardá *virđzino* ‘virgin’ < English *virgin*), and very rarely /i/ (for example, Kaliardá *fransí* ‘gay man’ < French *Français*) does not make any difference into attributing a loan to a specific inflection class because this vowel belongs to stems and all native vowel-ending feminine nouns are inflected according to NIC3 (see Ralli 2000, 2022 for details).

The following table resumes the number of loans of our corpus distributed in each inflection class, where nouns are counted according to their type in the citation form:³⁴

There are also 11 uninflected nouns, such as *prezantasjón.FEM* ‘formal dress’, which do not belong to a particular inflection class but are assigned gender, usually shown by a preceding determiner and/or modifier, for example, *i.FEM ómorfi.FEM prezantasjón.FEM* ‘the nice formal dress’).

NIC4, NIC7 and NIC8 are not used in Kaliardá borrowings. These inflection classes are inherited from Ancient Greek: NIC7 is reserved to +learned neuter nouns in -os (for example, Greek *krátos* ‘state’), most of them belonging to closed-class items. The other 2 inflection classes, that is, NIC4 and NIC8, usually encompass native feminine and neuter deverbal nouns in -si (for example, Greek *kínisi.FEM* ‘movement’ < Greek *kinó* ‘to move’) and -ma (for example, Greek *kínima.NEU* ‘movement’), as well as some rare non-deverbal ones (for example, Greek *póli.FEM* ‘town’ and Greek *sóma.NEU* ‘body’).

The almost equal distribution of neuter loan nouns into 2 inflection classes, NIC5 and NIC6, depicted in Table 1, is in accordance with the classification of native Greek neuter nouns, where these two inflection classes are very productively used.

Table 1. Inflection classes of Kaliardá Italian, French and English loan nouns.

	NIC1 (in -os)	NIC2 (in -is)	NIC3 (in -a)	NIC3 (in -i)	NIC3 (in -o)	NIC3 (in -u)	NIC5 (in -o)	NIC6 (in -i)	Total
Masculine	10	7	—	—	—	—	—	—	17
Feminine		—	55	2	17	45	—	—	119
Neuter		—	—	—	—	—	40	46	86
Total	10	7	55	2	17	45	40	46	222

It is worth noting that, at times, the same foreign stem produces two Kaliardá words, the difference of which is depicted on their gender and inflection. For example, the Italian *lacrima* ‘tear’ is adopted as the NIC5 *lákrimo* ‘tear’ and the NIC6 *lakrími* ‘onion’; the English *screw* is transferred as the NIC3 *skrúdzá.FEM*³⁵ ‘screw’ and the NIC6 *skrúdzi.NEU* ‘nail’; the English *birth* is accommodated as the NIC3 *bérθa.FEM* ‘birth’ and the NIC5 *bérθa.NEU.PL* ‘birthday anniversary’. This leads us to suppose that the difference in gender and inflection

class is used in Kaliardá as a way to enrich the lexicon by producing homonymous items from the same loan base.

To partially summarize, the morphological integration of +human nouns following the direct strategy is less complex than that of -human ones. While the feature of humanness plays a crucial role for gender determination, several factors compete in the grammatical gender assignment and the integration of -human nouns. We have seen that these factors include a Greek-based tendency for neuterization, a penchant for assigning feminine gender, a certain influence of the recipient language as far as the existence of synonymous items are concerned, as well as a matching of the word-final vowels between the borrowed nouns, principally originating from Italian, and the native ones. The data reveal that in this competition, a noteworthy preference is observed for building feminine nouns.

As a last word, we should add something about the less frequent indirect accommodation of nouns, involving the presence of a Greek suffix as mediator. The data show that there is a small number of loans which are integrated with the use of five different derivational suffixes, *-aci-*, *-ari-*, *-ats-*, *-oz-* and *-oni*, of various productivity degrees.

(24)	Kaliardá ³⁶	Origin
a.	rovespácis.MASC 'democrat'	French Robespierre.MASC
b.	fidentsáris.MASC 'fiancé'	Italian fidanzato.MASC 'fiancé'
c.	primatsos.MASC 'prime minister'	Italian primo.MASC 'first'
d.	amitsjóza.FEM 'friendship'	Italian amicizia.FEM 'friendship'
e.	muvjóni.NEU 'cinema'	English movie

Two of those suffixes, *-aci-* and *-ari-*, are among the most productive suffixes in Kaliardá (Rouvalis 2020). They appear in both loans and nouns derived on native Greek bases (for example, Kaliardá *labácis* 'extremely clean' < Greek *lábo* 'I shine', Greek *oktáris* 'member of Parliament' < Greek *októ* 'eight'). *-aci-* belongs to the native Greek suffixes that produce diminutive formations, and *-ari-* is of Latin origin (Latin *-arius*) creating nouns denoting profession. The other three suffixes are of Italian origin: *-oni-* (Italian *-one*) adds an affective meaning and is less frequent than *-aci-* and *-ari-*. *-oz-* (Italian *-oso*) and *-ats-* (Italian *-accio*) sporadically appear to be combined with Italian bases and bring a pejorative connotation.

The use of the indirect insertion strategy for the accommodation of nouns, beside the adjustment to the Greek pronunciation, may also trigger the deletion of a part of the original word. Sometimes, this may be due to the ease of pronunciation (for example, *rovespácis* instead of **rovespierácis*, *fidentsáris* instead of **fidentsatáris*), and sometimes to the rules of Greek morphology to build a derived stem by adding a derivational suffix to a simple stem. As a result, in the example under (24c), the Italian inflectional ending *-o* (*prim-o*) is deleted and the remaining part of the word, that is, *prim-*, is treated as a simple stem, to which the speakers attach the derivational suffix *-ats-* and the inflectional suffix *-os*. The Kaliardá noun *amitsjóza* (24d) consists of a part of the stem of the Italian noun *amicizia*, the derivational suffix *-oz-*, the stem final vowel *-a*, and the inflectional suffix *-ø*. As for the noun *muvjóni*, it derives on the basis of the English noun *movie* with the help of the derivational suffix *-oni*.

The fact that between the direct and the indirect integration strategy Kaliardá prefers the first one is also depicted by the ease of producing masculine and feminine nouns by simply assigning to stems different gender values, before adding the relevant inflection. In contrast, the production of native feminine nouns in Greek principally occurs by changing a masculine base into feminine with the use of a derivational suffix. For illustration, consider the following examples in the citation forms (nominative singular), where hyphens

separate the stems from the derivational suffixes and the derivational suffixes from the inflectional ones:

(25)				
a.	Greek	vasilá-s	vasíl-isa-ø	French
		‘king’	‘queen’	
	Kaliardá	rén-os	réna-ø	reine.FEM
b.	Greek	líko-s	líc-ena-ø	English
		‘male wolf’	‘female wolf’	
	Kaliardá	γυγύλfi-s	γυγύλfo-ø	wolf

In (25a), the French word *reine* ‘queen’ appears in Kaliardá as the feminine *réna* and the masculine *rénos* (the stem *ren-* is enriched with *-a-* in the feminine gender), and the English *wolf* is accommodated as the female *γυγύλfo* and the masculine *γυγύλfis* (25b) with the addition of /a/ and /i/ to the stem.³⁷ In contrast, Greek expresses the notions of ‘queen’ and ‘female wolf’ by adding to the masculine bases *vasil-* and *lik-* the derivational suffixes *-isa* and *-ena*, respectively, which are responsible for assigning the feminine gender.

3. Conclusions

In this article, we have dealt with lexical borrowing from Italian, French, and English, and the morphological noun and verb integration in Kaliardá, a linguistic variety spoken by members of the LGBTQ community in Greece. After providing an overview of Kaliardá and its main characteristics, our investigation demonstrated that the accommodation of loanwords generally obeys the basic principles of Greek morphology, in that most borrowed nouns and verbs are built on a stem-based morphological pattern and are overtly inflected. However, there are also deviances. More particularly, similarly to Greek, loan verb integration is principally based on the indirect insertion strategy, with the help of the Italian-based verbalizer *-ar-* that commonly appears in verbal loans of the Greek language, and only Italian verbs are adapted according to the direct strategy, due to the matching of the Italian infinitival ending *-are* and the Greek verbalizer *-ar-*. Interestingly, there is also one case which employs the Romani-based verb *avélo* ‘be, become’ as an auxiliary element for adapting an English verb, where the English part of the periphrases *avélo* + English verb remains invariable, while *avélo* is regularly inflected. The adoption of loan nouns mostly employs the direct strategy, and few loans use a small number of Greek-based derivational suffixes as mediators for their integration. With some exceptions, the accommodation of human loan nouns does not significantly differ from that in Greek and is constrained by the feature +human and biological sex. In contrast, in Kaliardá -human nouns, several factors compete as grammatical gender activators and for the assignment of an inflection class; namely, a Greek-based neuterization tendency, the influence of Greek with respect to native nouns that are synonymous to loans, as well as a word-final vowel similarity between the endings of native Greek nouns and those of the Italian loans. Most importantly, as opposed to Greek, there is a marked preference in Kaliardá for building feminine nouns, ascribed to the productively used in Greek third inflection class. Many of these nouns end in *-a* in the citation form, similarly to most Greek feminine nouns, but there is also a significant number of items in *-u* and *-o*, the endings of which characterize the vernacular Greek. Finally, a comparison of the integration procedures of loans from Italian, French and English, which constitute the three principal donors of Kaliardá, reveal that the variety has frequently used relexicalization to build its lexicon, but the structure and its morphological rules remain Greek.

Author Contributions: A.R. (Angela Ralli) and A.R. (Andreas Rouvalis) had equal contributions to Section 1. A.R. (Angela Ralli) is the author of Sections 2 and 3 and A.R. (Andreas Rouvalis) has collected the data and built the corpus. All authors have read and agreed to the published version of the manuscript.

Funding: This research was not funded by any funding agency, international or national institution.

Institutional Review Board Statement: The study did not require any ethical approval. The 10 speakers who were interviewed and consulted about the accuracy of the material of this article were Rouvalis' friends and gave an informal consent. All data included in this article is listed in Petropoulos' ([1971] 1993) dictionary.

Informed Consent Statement: An informal consent was obtained from all 10 Kaliardá speakers who were consulted about the accuracy of the data drawn from Petropoulos' ([1971] 1993) dictionary.

Acknowledgments: We sincerely thank the three anonymous reviewers for their most constructive comments which made the article benefit greatly.

Conflicts of Interest: The authors declare no conflict of interest.

List of Abbreviations

SG = singular, PL = plural, 1 = first person, 2 = second person, 3 = third person, NEU = neuter, FEM = feminine, MASC = masculine, DSUF = derivational suffix, NOM = nominative, ACC = accusative, GEN = genitive, VOC = vocative, PRES = present, PASS = passive.

Notes

- ¹ The Lesbian community is added to Kaliardá speakers by Ioannidi (1977). However, Petropoulos ([1971] 1993) disagrees with this view.
- ² Unless necessary for explanatory purposes, in this article, Greek will be used as a cover term for both Standard Modern Greek and its regional varieties.
- ³ Lefebvre (2008), in a more recent study about certain language-contact situations, refers to the relexification process as 'relabelling'.
- ⁴ In this article, Kaliardá words will be given in a broad phonological transcription with the characters of the International Phonetic Alphabet and stress will appear on the relevant vowel.
- ⁵ Petropoulos wrote his dictionary between 1968 and 1971. In the 1993 edition, he added some more entries to the original 3000 and suggested (p. 250) that the Kaliardá words could be around 5000.
- ⁶ Many of the Greek-based words display different gender, stress, inflection and meaning, e.g., *ḡáxtílo*.FEM 'piano' < Greek *ḡáxtílo*.NEU 'finger'. There is also a considerable number of formations, derived or compound, which contain native Greek constituents and structure, but they do not constitute Greek actual words, e.g., *nu n ázome* 'I think' < Greek *nun*.ACC.SG 'mind' + *-iaz*.DSUF + *-ome*.1SG.PRES.PASS, *nekroxartú*.FEM 'photograph' < Greek *nekr(ós)*.MASC 'dead' + *xart(i)*.NEU 'paper'.
- ⁷ The interviewees were all Mr Rouvalis' friends and gave an informal consent to check the accuracy of the data that are used in this work.
- ⁸ As shown by Melissaropoulou and Ralli (2019), languages can vary with respect to categories other than nouns, the latter being the most frequently borrowed category cross-linguistically.
- ⁹ See Ralli (2022) for details regarding the property of stem-based morphology in the Greek language and the analysis of inflected words into stems and inflectional suffixes. Note that the Kaliardá borrowed nouns and adjectives follow the Greek inflection in both singular and plural. Similarly, verbs are inflected in all paradigmatic tenses. Deviances from Greek inflection are always mentioned in this paper.
- ¹⁰ In the citation form, Greek verbs are given in the first person singular of the present tense, since the overtly expressed infinitival form was lost from the language in the Hellenistic period (ca. 3rd c. BC–3rd c. AD).
- ¹¹ Another explanation for the absence of inflection in many French loans may be due to the desire of Kaliardá speakers to keep unaltered the French words due to the high prestige of French. The prominent status of French is also shown by the fact that some Greek words containing an /r/ are sometimes pronounced in Kaliardá with a Parisian /ʁ/, the latter being absent from the range of Greek consonants.
- ¹² There is one instance in our corpus. However, there may be more of these formations with verbs from other languages, which we were not able to identify as such due to their etymological opacity.
- ¹³ For a variety of examples with *avel* and its different meanings in Romani, see the database of the University of Manchester Romani Project: <https://romani.humanities.manchester.ac.uk//rms/browse/phrases/phraselist> (accessed on 30 January 2022). We thank Evangelia Adamou for pointing this out to us.
- ¹⁴ However, in Petakto Korte it is listed with the Romani meaning 'to come'.
- ¹⁵ See (Petropoulos ([1971] 1993, pp. 17–22) for more examples and the variety of meanings that these periphrases can have.
- ¹⁶ Greek verbs are inflected according to two inflection classes (VIC1 and VIC2), the endings of which differ as far as the present, imperfect and future continuous paradigms are concerned. In the paradigm of past perfective (the so-called 'aorist tense'),

and in that of future perfective the difference between the two verbal inflection classes is eliminated. See Ralli (2022) for more information.

-are shows as -ar in Venetian, an Italo-Romance dialect, which is the donor language for many Modern Greek regional varieties, such as Heptanesian and Cretan. Since there is no evidence whether Kaliardá has been directly influenced by Venetian, we assume here that it has used the expected -ar- suffix of Standard Modern Greek.

In Griko, the South Italian Greek variety spoken in Salento, the intervocalic /v/ is dropped (Karanastasis 1997).

In Greko, the Calabrian variety, -ev- appears as -eggu- (Karanastasis 1997).

Occasionally and for clarification purposes, segments that are not employed in loan adaptation appear in parentheses.

There is no instance of *vuélo* exhibiting a similar behaviour in our corpus, as it combines only with nouns.

In our corpus, there are only examples in the present tense.

As shown by Ralli (2022), gender is a morphosyntactic feature of Greek nominal stems, the inflectional endings being marked for case and number.

Nevertheless, for *pópolo*, the neuter gender assignment in Kaliardá could also be further instigated by the unspecified biological sex of the entity, as suggested by Kiranoudis (2001) for similar cases of lexical borrowing from Turkish in Northern Modern Greek dialects.

The masculine stem *γυγύλfi* is further enriched with a -ð- in the plural number, e.g., *γυγύλfið-es* 'wolves.MASC.NOM/ACC/.PL'. In contrast, the plural stem of the feminine form does not contain any -ð- or the vowel /o/, e.g., *γυγύλf-es* 'wolves.FEM.NOM/ACC.PL' (See Ralli 2022 for details on the inflection of masculine and feminine nouns).

The *ø* ending appears in the nominative, accusative and vocative cases of the singular number. In the plural number, all forms show overtly realized inflectional suffixes, -es for the nominative, accusative and vocative forms and -on for the genitive.

See Makri (2020) for examples in the Heptanesian dialect, Manolessou and Ralli (2020) for examples in South Italian Greek, and Ralli and Makri (2020) for evidence drawn from the Immigrant Greek spoken in Canada.

The inflectional ending in the citation form, that is, in the nominative singular is *ø*. See also footnote 26.

See Christofidou (2003) on the productivity notion in Greek feminine nouns in -a.

For the inflectional endings, see also footnotes 26 and 28.

The Kaliardá nouns and adjectives follow the Greek inflection in singular and plural. Similarly, verbs are inflected in all tenses. Deviances from Greek inflection are always noted.

The word-final /ə/ of *monde* is not overtly pronounced in standard French. Therefore, the word is considered as ending in a consonant. Even if /ə/ is considered as overtly realized, it does not match to any of the Greek endings.

In the entire corpus, there are another 3 occurrences of feminine nouns in -i, all of them originating from Romani.

In Petropoulos' ([1971] 1993) dictionary, loan nouns from languages other than Italian, French and English are assigned in more or less equal numbers masculine, feminine and neuter gender values.

Another homonymous item is *skrídzø* 'stingy' which comes from a different English base, Scrooge.

-s and -os are the inflectional endings of the NIC1 and NIC2 masculine nouns in the nominative singular. A *ø* suffix is the inflectional ending for the NIC6 neuter nouns in -i (see Ralli 2022) for details and footnotes 26 and 28).

Due to the rules of Greek phonology, after the addition of the /a/, /i/ of *vasili* changes into a semi-vowel [j], and subsequently /1/ is palatalized into /λ/. Moreover, /k/ of *lik* is also palatalized into [c] before the front vowel /e/ of the derivational suffix -ena.

References

- Anastassiadi-Symeonidi, Anna. 1994. *Νεολογικός δανεισμός της Νεοελληνικής* [Neological Borrowing in Modern Greek]. Thessaloniki: Estia.
- Barrett, Rusty. 2018. Speech play, gender play, and the verbal artistry of queer argots. *Suvremena Lingvistika* 44: 215–42.
- Chalatsi, Georgianna. 2018. «Τι θα γράψω στο φύλο;» Queer αναπαράστασεις σε ελληνικά D.I.Y. τραγούδια [What Should I Write on Gender? Queer Representations in Greek D.I.Y. Songs]. Bachelor's. essay, University of Patras, Patras, Greece.
- Chantraine, Paul. 1933. *La formation des noms en grec ancien*. Leuven: Peeters Publishers.
- Chatzidakis, George N. 1905–1907. *Medieval and Modern Greek*. Athens: Sakellarios, vols. 1 and 2.
- Christofidou, Anastasia. 2003. 'Γένος και κλίση στην Ελληνική. Μια φυσική προσέγγιση' [Gender and inflection in Greek. A natural approach]. In *Θέματα νεοελληνικής γραμματικής: Το γένος* [Themes of Modern Greek Grammar: Gender]. Edited by Anna Anastassiadi-Symeonidi, Angela Ralli and Despina Chila-Markopoulou. Athens: Patakis, pp. 100–31.
- Christopoulou, Katerina. 2016. *Μια λεξικολογική προσέγγιση στο περιθωριακό λεξιλόγιο της Νέας Ελληνικής* [A Lexicological Approach of the Greek Slang Vocabulary]. Ph.D. dissertation, University of Patras, Patras, Greece.
- Dahl, Osten. 2000. Animacy and the notion of semantic gender. In *Gender in Grammar and Cognition, I: Approaches to Gender*. Edited by Barbara Unterbeck, Matti Rissanen, Terttu Nevalainen and Mirja Saari. Berlin: Mouton de Gruyter, pp. 99–115.
- DeGraff, Michel. 2002. Relexification: A reevaluation. *Anthropological Linguistics* 44: 321–414.
- Dressler, Wolfgang U. 1997. On productivity and potentiality in inflectional morphology. *Classnet Working Papers* 7: 3–22.

- Gardani, Francesco. 2016. Allogeneous exaptation. In *Exaptation and Language Change*. Edited by Muriel Norde and Frank Van de Velde. Amsterdam/Philadelphia: John Benjamins, pp. 227–260.
- Gardani, Francesco, Peter Arkadiev, and Nino Amiridze, eds. 2015. *Borrowed Morphology*. Berlin: Walter de Gruyter.
- Gkartzonika, Galini. 2012. An Ethnographic Analysis of Kaliarda: The Greek Gay Variety. Master's dissertation, Northeastern Illinois University, Chicago, IL, USA.
- Halliday, Mark. 1976. Anti-languages. *American Anthropological Association* 78: 570–84. [\[CrossRef\]](#)
- Halliday, Mark. 1978. *Language as Social Semiotic: The Social Interpretation of Language and Meaning*. London: Edward Arnold.
- Haugen, Einar. 1950. The analysis of linguistic borrowing. *Language* 27: 211–22. [\[CrossRef\]](#)
- Horvath, Julia, and Paul Wexler. 1997. *Relexification in Creole and Non-Creole Languages. With Special Attention to Haitian Creole, Modern Hebrew, Romani and Rumanian*. Wiesbaden: Harrassowitz Verlag.
- Ioannidi, Hélène. 1977. Kaliardá. La langue secrète des homosexuels grecs. *Topique* 20: 1–35.
- Karanastasis, Anastasios. 1997. Γραμματική των ελληνικών ιδιωμάτων της Κάτω Ιταλίας [A Grammar of South Italian Greek Dialects]. Athens: Academy of Athens.
- Καλιαρντά [Kaliardá] Documentary. 2014. Directed by Paola Revenioti. Athens.
- Kiranoudis, Pavlos. 2001. Μορφολογία των τουρκικών δανείων της ελληνικής: μέρος Α': προσαρμογή ονομάτων, μέρος Β': τουρκικά παραγωγικά μορφήματα [Morphology of Turkish Loanwords in Greek Part A: Accommodation of Nominals, Part B: Turkish Derivational Suffixes]. Ph.D. dissertation, University of Thessaloniki, Thessaloniki, Greece.
- Kontovas, Nicholas. 2018. *Turkish Queer Slang: Language Contact and the Construction of Non-Ethnic Identity*. Class Lecture. Leiden: Leiden University.
- Lefebvre, Claire. 1993. The role of relexification and syntactic reanalysis in Haitian Creole: Methodological aspects of a research program. In *Africanisms in Afro-American Language Varieties*. Edited by Salikoko S. Mufwene. Athens: University of Georgia Press, pp. 254–79.
- Lefebvre, Claire. 1997. On the cognitive process of relexification. In *Relexification in Creole and Non-Creole Languages. With Special Attention to Haitian Creole, Modern Hebrew, Romani and Rumanian*. Edited by Julia Horvath and Paul Wexler. Wiesbaden: Harrassowitz Verlag, pp. 72–99.
- Lefebvre, Claire. 1998. *Creole Genesis and the Acquisition of Grammar: The Case of Haitian Creole*. Cambridge: Cambridge University Press.
- Lefebvre, Claire. 2008. Relabelling: A major process in language contact. *Journal of Language Contact* 2: 91–111. [\[CrossRef\]](#)
- Lefebvre, Claire, and John Lumsden. 1989. Les langues créoles et la théorie linguistique. *Canadian Journal of Linguistics* 34: 249–72. [\[CrossRef\]](#)
- Makri, Vasiliki. 2020. Gender in Greek Dialects Affected by Romance. Ph.D. dissertation, University of Patras, Patras, Greece.
- Manolessou, Io, and Angela Ralli. 2020. On borrowing and integrating Italo-Romance nouns in South Italian Greek. In *Tra etimologia romanza e dialettologia. Studi in onore di Franco Fanciullo*. Edited by Patricia del Puente, Francesca Guazzelli, Lucia Mulinu and Simone Pisano. Alessandria: Edizioni dell'Orso, pp. 261–78.
- Melissaropoulou, Dimitra. 2016. Loanword integration as evidence for the realization of gender and inflection class: Greek in Asia Minor. In *Contact Morphology in Modern Greek Dialects*. Edited by Angela Ralli. Newcastle upon Tyne: Cambridge Scholars Publishing, pp. 145–78.
- Melissaropoulou, Dimitra, and Angela Ralli. 2019. Revisiting the borrowability scale(s) of free grammatical elements: Evidence from Modern Greek contact induced varieties. *Journal of Language Contact* 12: 707–36. [\[CrossRef\]](#)
- Montoliu, César. 2005. Is Kaliardá, Greek Gay slang, a mixed Gypsy language? *Erytheia: Revista de Estudios Bizantinos y Neogriegos* 26: 299–318.
- Muysken, C. Pieter. 1981. Halfway between Quechua and Spanish: The case for relexification. In *Historicity and Variation in Creole Studies*. Edited by Arnold Highfield and Albert Valdman. Ann Arbor: Karoma Publishers, pp. 52–78.
- Petropoulos, Elias. 1993. Καλιαρντά [Kaliardá]. Athens: Nefeli. First published 1971.
- Ralli, Angela. 2000. A feature-based analysis of Greek nominal inflection. *Glossologia* 11–12: 201–27.
- Ralli, Angela. 2002. The Role of morphology in gender determination: Evidence from Modern Greek. *Linguistics* 40: 519–51. [\[CrossRef\]](#)
- Ralli, Angela. 2012a. Morphology in language contact: Verbal loanblend formation in Asia Minor Greek (Aivaliot). In *Morphologies in Contact (Studia Typologica)*. Edited by Thomas Stolz. Berlin: Akademie Verlag, pp. 185–201.
- Ralli, Angela. 2012b. Verbal loanblends in Griko and Heptanesian: A case study of contact morphology. *L'Italia Dialettale* 73: 111–32.
- Ralli, Angela. 2013. *Compounding in Modern Greek*. Dordrecht: Springer.
- Ralli, Angela. 2016. Strategies and patterns of loan verb integration in Modern Greek varieties. In *Contact Morphology of Modern Greek Dialects*. Edited by Angela Ralli. Newcastle upon Tyne: Cambridge Scholars Publishing, pp. 73–108.
- Ralli, Angela. 2019. Affixoids and verb borrowing in Aivaliot morphology. In *The Morphology of Asia Minor Greek. Selected Topics*. Edited by Angela Ralli. Leiden: Brill, pp. 221–54.
- Ralli, Angela. 2021. Contrasting Romance and Turkish as source languages: Evidence from borrowing verbs in Modern Greek dialects. *Journal of Language Contact* 14: 220–52. [\[CrossRef\]](#)
- Ralli, Angela. 2022. *Μορφολογία [Morphology]*. New Updated Version of the 2005 edition. Athens: Patakis.
- Ralli, Angela, and Vasiliki Makri. 2020. Examining the integration of borrowed nouns in immigrant speech: The case of Canadian Greek. In *The Interaction of Borrowing and Word Formation*. Edited by Pius ten Hacken and Renata Panocová. Edinburgh: Edinburgh University Press, pp. 237–58.

- Ralli, Angela, Marianna Gkiouleka, and Vasiliki Makri. 2015. Gender and inflection class in loan noun integration. *SKASE* 12: 422–60.
- Ralli, Angela. forthcoming. Borrowing from Gallo-Romance. In *Proceedings of the First Meeting on Greek and French Comparative Studies*. Edited by Rea Delveroudi, Sophie Vassilaki and Evangelia Vlachou. Athens: University of Athens.
- Rouvalis, Andreas. 2020. «Ματσομπερντεδόκουτα, τζιναβοστουντότσαρδα και κουλουμπουριάσματα»: Οι διαδικασίες σχηματισμού λέξεων στα καλιαρντά. [«Matsoberdeðókuta, dzinavostudótsarða ce kuluburjázmata» Word formation Processes in Kaliardá]. Master's dissertation, University of Patras, Patras, Greece.
- Sankoff, Gillian. 2001. Linguistic outcomes of language contact. In *Handbook of Sociolinguistics*. Edited by Peter Trudgill, Jack Chambers and Natalie Schilling-Estes. Oxford: Basil Blackwell, pp. 638–68.
- Swann, Joan, Ana Deumert, Theresa Lillis, and Rajend Mesthrie. 2004. *A Dictionary of Sociolinguistics*. Edinburgh: Edinburgh University Press.
- Taylor, Heather. 2007. Polari: A Sociohistorical Study of the Life and Decline of a Secret Language. Bachelor's dissertation, The University of Manchester, Manchester, UK.
- Triandaphyllidis, Manolis. 1963. Ελληνικές συνθηματικές γλώσσες [Greek slangs]. In *Α παντα Μανώλη Τριανταφυλλίδη [Manolis Triantaphyllidis Complete Works]*. Thessaloniki: Institute of Modern Greek Studies, vol. 2. First published 1947.
- Wohlgemuth, Jan. 2009. *A Typology of Verbal Borrowings*. Berlin and New York: Mouton de Gruyter.