(1981/2017). In A. Bunger (Ed.)., *Special volume: Reissue of Innovations in Linguistic Education Volume 2. IULC Working Papers in Linguistics*, Vol. 17, No. 3.

# PROBLEMS IN QUEBECOIS MORPHOPHONOLOGY

Marc Picard
Université du Québec à Trois-Rivières

Québécois (Québec French) has a very interesting network of morphophonemic processes which affect the articles/pronouns *le, la* and *les*, and which interact in a rather intricate way. In asking students to formulate and order these processes, one also has the opportunity of touching on various topics such as the nature of morphophonemic rules in general, and their relation to phonetically-statable rules. From a diachronic viewpoint, the origin of such rules can be a source of exposition and discussion, for there is some controversy, for example, as to whether morphophonemic processes must ALWAYS stem from purely phonological rules, as claimed by Hooper (1976), or whether SOME morphophonemic processes can emerge full-blown (cf. Picard 1977, 1980).

As mentioned above, the morphophonemic problems in question, which will be presented in five sections, involve the segments *le, la* and *les*, the underlying forms of which are /lə/, /la/ and /le/ respectively. Following are the English equivalents of these segments:

A - *le* /lə/

(1) MASCULINE ARTICLE

Ex. *LE lion* "THE lion"

(2) MASCULINE PRONOUN

Ex. *je LE regarde* (a) "I'm looking at HIM"

(<*je regarde LE GARÇON* "I'm looking at THE BOY")

(b) "I'm looking at IT"

(<*je regarde LE LIVRE* "I'm looking at THE BOOK")

B - *la* /la/

(1) FEMININE ARTICLE

Ex. *LA lionne* "THE lioness"

(2) FEMININE PRONOUN

Ex. *je LA regarde* (a) "I'm looking at HER"

(<*je regarde LA FILLE* "I'm looking at THE GIRL")

(b) "I'm looking at IT"

(<*je regarde LA TABLE* "I'm looking at THE TABLE")

C - *les* /le/

(1) PLURAL ARTICLE

Ex. *LES lions* "THE lions"

(2) PLURAL PRONOUN

Ex. *je LES regarde* "I'm looking at THEM"

Note that although I have provided orthographic forms in all of the problems as a point of reference for those who possess a written knowledge of French, it is not recommended that these forms be given to students. They are not necessary and may even be a source of confusion. Also, it should be made very clear to students that they must state precisely WHICH pronouns and/or articles are involved in each of the various morphophonemic processes. Otherwise, they may encounter difficulties when they are asked to deal with their interaction. Finally, although it is imperative that the environment(s) of each process be clearly spelled out, little importance should normally be attached to arriving at any particular formal expression of the processes.

I

ELISION (VOWEL TRUNCATION) AND LIAISON (CONSONANT INSERTION)

| | | | |
|---|---|---|---|
| (1) | lə gʌ́ | *le gars* | the guy |
| (2) | la fĺy | *la fille* | the girl |
| (3) | le rʌ́b | *les robes* | the dresses |
| (4) | lə rɑ̃́wm | *le rendre* | to give it back |
| (5) | la šɑ̃́:té | *la chanter* | to sing it |
| (6) | le resité | *les réciter* | to recite them |
| (7) | l ekʌlyáe | *l'écolière* | the schoolgirl |
| (8) | l ẽbesĺl | *l'imbécile* | the imbecile |
| (9) | lez ɑ̃́:fɑ̃́ | *les enfants* | the children |
| (10) | l arɑ̃́:žé | *l'arranger* | to fix it |
| (11) | l ẽvité | *l'inviter* | to invite him/her |
| (12) | lez imité | *les imiter* | to imitate them |

Given these forms, students are asked to formulate two rules that will account for the changes of /lə/ and /la/ to [l], and of /le/ to [lez]. They should have no trouble in determining that /lə/ and /la/, both as pronouns and articles, undergo vowel deletion in pre-vocalic position:

ELISION

V → Ø / _ # V / ART/PRO *le, la*

The plural article/pronoun /le/, on the other hand, is subject to a rule which inserts [z] whenever a vowel follows:

LIAISON

Ø → z / _ # V / ART/PRO *les*

Note that the synchronic interpretation of LIAISON as an insertion process rather than a rule of pre-consonantal truncation has been the subject of some controversy. For opposing viewpoints, see, for example, Schane (1968) and Klausenburger (1978).

There are a good number of exceptions to these rules, and this fact in itself serves to show that the pre-vocalic deletion of [ə] and [a] and insertion of [z] are no longer PHONETIC constraints of Québécois (and Standard French). Although this information is by no means a necessary condition to solving the problems to come and may easily be skipped over, it can serve as a useful and convenient means of illustrating the way transparent processes become opaque. These exceptions, then, which originate mainly but not exclusively from borrowings at various historical stages, cannot be accounted for by any kind of rule. They must simply be learned by heart. Examples are:

| | | | |
|---|---|---|---|
| (13) | la ɔ̃wt | *la honte* | (the) shame |
| (14) | lə isé | *le hisser* | to raise it |
| (15) | le ʌtdʌ́g | *les hot dogs* | the hot dogs |
| (16) | lə Úd | *le hood* | the hood |
| (17) | la ɔ̃:zyɛ́m | *la onzième* | the eleventh (one) |
| (18) | le eró | *les héros* | the heroes |

Forms like (13) and (14) contain what is commonly known in French as *h aspiré*, as the orthographical forms show. Such forms constitute the majority of the exceptions and are mainly Germanic in origin (cf. Pope 1966). They did not undergo ELISION because initial [h] was still pronounced at the time the rule emerged. The subsequent deletion of this segment is what first made this rule (and LIAISON, e.g. [le isé] "to raise them") opaque.

Borrowings from English like (15) and (16) are not subject to these rules because they were presumably brought into the language by bilinguals who did not initially francisize them to the extent of deleting initial [h]. In other words, they were probably pronounced something like

[le hatdág] and [lə hÚd] originally. When such forms were later nativized with initial vowels, they did not trigger ELISION and LIAISON but were simply added to the list of exceptions. Note that borrowings that are vowel-initial in English usually behave regularly, e.g. [l ʌpɛrkʌ́t] "the uppercut", [l ovɛrtáem] "(the) overtime". As for exceptional native forms like (17) and (18), they are due to various factors which cannot be explained concisely enough to be gone into here.

Finally, it should be noted that ELISION and LIAISON may or may not apply to glide-initial forms, again depending usually on whether a form was borrowed or not. Compare (19)-(20) with (21)-(22):

| | | | |
|---|---|---|---|
| (19) | l wɛ́s | *l'ouest* | the west |
| (20) | lez yö́ | *les yeux* | the eyes |
| (21) | lə yʌ́t | *le yacht* | the yacht |
| (22) | le wʌwʌrṍ | *les ouaouarons* | the bullfrogs |

Historically, forms like those in (19)-(20) were vowel-initial when the rules appeared, whereas the others were borrowed with glides.

II

/l/-DELETION

| | | | |
|---|---|---|---|
| (23) | la táb | *la table* | the table |
| (24) | le bwáet | *les boîtes* | the boxes |
| (25) | lə metsẽ́ | *le médecin* | the doctor |
| (26) | la dʌné | *la donner* | to give it |
| (27) | le fáe | *les faire* | to do them |
| (28) | lə dzIí | *le dire* | to say it |
| (29) | mɛ a táb | *mets la table* | set the table |
| (30) | dã e bwáet | *dans les boîtes* | in the boxes |
| (31) | šə l metsẽ́ | *chez le médecin* | at the doctor's |
| (32) | vu a dʌné | *vous la donnez* | you give it |
| (33) | vʌ́ e fáe | *vas les faire* | go and do them |
| (34) | ozé l dzIí | *oser le dire* | to dare say it |
| (35) | táos la táb | *tasse la table* | move the table |
| (36) | dɛryáer le bwáet | *derrière les boîtes* | behind the boxes |
| (37) | apɛ́l lə metsẽ́ | *appelle le medecin* | call the doctor |

| | | | |
|---|---|---|---|
| (38) | pur la dʌné | *pour la donner* | in order to give it |
| (39) | ã:tãwn le fáe | *entendre les faire* | to intend to do them |
| (40) | vulwáer lə dzIí | *vouloir le dire* | to want to say it |
| (41) | prã lá | *prends-la* | take it |
| (42) | kú lə́ | *couds-le* | sew it |
| (43) | tsú lé | *tue-les* | kill them |

The forms in (29)-(34) should allow students to determine without difficulty that *la* and *les* -- but not *le* --, both as articles and pronouns, undergo /l/-DELETION intervocalically. Moreover, (41)-(43) indicate that the rule will not apply if the following vowel is (relatively) stressed. The rule can be stated as:

/l/-DELETION

$$l \rightarrow \emptyset \; / \; V \; \# \; \_ \begin{bmatrix} V \\ -\text{stress} \end{bmatrix} \; / \; \text{ART/PRO} \quad la, \; les$$

Next, the three following forms are introduced:

| | | | |
|---|---|---|---|
| (44) | a l ekʌlyáe (cf. (7)) | *à l'écolière* | to the schoolgirl |
| (45) | ekuté l ẽbesIl (cf. (8)) | *écoutez l'imbécile* | listen to the imbecile |
| (46) | sã ez ã:fã (cf. (9)) | *sans les enfants* | without the children |

Students are then asked (1) how the rule of /l/-DELETION must be amended to account for the fact that underlying /la/ in (44)-(45) does not lose its consonant whereas underlying /le/ in (46) does, and (2) what these forms reveal about the order of application of ELISION/LIAISON and /l/-DELETION.

A comparison of (44)-(45) with (46), or with (29)-(30), should enable them to determine that it is not sufficient for /l/ to simply be intervocalic in order to be subject to deletion: the following vowel must also not be outside the word boundary. To account for this fact, and also for the possibility of having a consonant-final form as in (46), the rule must be rewritten as:

/l/-DELETION *(revised)*

$$l \rightarrow \emptyset \; / \; V \; \# \; \_ \begin{bmatrix} V \\ -\text{stress} \end{bmatrix} \; (C) \; \# \; / \; \text{ART/PRO} \quad la, \; les$$

This rule states that the /l/ of the articles/pronouns *la, les* will get deleted whenever they are (1) preceded by a vowel, and (2) followed by an unstressed vowel which must be inside the word boundary (cf. Laliberté 1974).

Having revised /l/-DELETION in this manner, the task of determining whether it must apply before or after ELISION/LIAISON is greatly facilitated. It should be fairly obvious that the prior application of ELISION is precisely what blocks /l/-DELETION in (44)-(45). As for the relation between LIAISON and /l/-DELETION, their application in any order will produce the correct output in forms like (46). The derivations of (44)-(46) are thus:

| | | |
|---|---|---|
| (44) | INPUT | #a#la#ekʌlyáe# |
| | ELISION | a l ekʌlyáe |
| | /l/-DELETION | ---------- |
| | OUTPUT | [a l ekʌlyáe] |
| (45) | INPUT | #ekuté#l{ə, ã}#ẽbesíl# |
| | ELISION | ekuté l ẽbesíl |
| | /l/-DELETION | ---------- |
| | OUTPUT | [ekuté l ẽbesíl] |
| (46) | INPUT | #sã#le #ã:fã́# |
| | LIAISON | sã lez ã:fã́ |
| | /l/-DELETION | sã ez ã:fã́ |
| | OUTPUT | [sã ez ã:fã́] |
| | | (or) |
| | INPUT | #sã#le #ã:fã́# |
| | /l/-DELETION | sã e ã:fã́ |
| | LIAISON | sã ez ã:fã́ |
| | OUTPUT | [sã ez ã:fã́] |

III

/l/-GEMINATION

The forms in (44)-(46) served to illustrate what happens to the ARTICLES *le, la* and *les* intervocalically. Consider now what happens to them as PRONOUNS in this same environment:

(47) i vyẽ́ ll arã:žé́ (cf. (10)) *il vient l'arranger* he is coming to fix it

(48) i vö́ ll ẽvité (cf. (11)) *il veut l'inviter* he wants to invite him/her

(49) i vő́ ez imité (cf. (12)) *ils vont les imiter* They are going to imitate them

Given these data, students are asked (1) to formulate the rule of /l/-GEMINATION, and (2) to order it in relation to ELISION/LIAISON and /l/-DELETION. Essentially, the correct solution lies in the realization that whereas nothing more happens to the ARTICLES *le, la* after ELISION has applied, as shown in (44)-(45), a process of gemination applies to the output of ELISION when *le, la* are PRONOUNS (cf. Picard 1974). This rule can be stated as:

/l/-GEMINATION

V # l # V

1 2 3 4 5 ⟹ 1 2 3 3 4 5 / PRO *le, la*

Forms like (49) are obviously not affected by this process since they undergo /l/-DELETION just like forms such as (46). Following, then, are the derivations of (47)-(48):

(47) INPUT #i#vyẽ́#l{ə/a}#arã:žé́#

ELISION i vyẽ́ l arã:žé́

/l/-GEMINATION i vyẽ́ ll arã:žé́

OUTPUT [i vyẽ́ ll arã:žé́]

(48) INPUT #i#vö́#l{ə/a}#ẽvité́#

ELISION i vö́ l ẽvité́

/l/-GEMINATION i vő́ ll ẽvité́

OUTPUT [i vö́ ll ẽvité́]

We have seen that the pre-vocalic schwa of the article/pronoun *le* gets deleted through the operation of ELISION. Pre-consonantal schwa also drops in some instances, as was shown in forms like (31) and (34). These and other examples illustrating the behavior of pre-consonantal *le*, some of which have already been given, are presented below:

SCHWA DELETION

| | | | |
|---|---|---|---|
| (1) | lə gʌ́ | *le gars* | the guy |
| (4) | lə rɑ̃́wn | *le rendre* | to give it back |
| (25) | lə metsɛ̃́ | *le médecin* | the doctor |
| (28) | lə dzIí | *le dire* | to say it |
| (31) | šə l metsɛ̃́ | *chez le médecin* | at the doctor's |
| (34) | ozé l dzIí | *oser le dire* | to dare say it |
| (37) | apɛ́l lə metsɛ̃́ | *appelle le médecin* | call the doctor |
| (40) | vulwáer lə dzIí | *vouloir le dire* | to want to say it |
| (50) | lə frɛ̃́ | *le frein* | the brake |
| (51) | lə blʌ:mé | *le blâmer* | to blame him |
| (52) | sɑ̃ l frɛ̃́ | *sans le frein* | without the brake |
| (53) | pö́ l blʌ:mé | *peut le blâmer* | can blame him (indic.) |
| (54) | avɛk lə frɛ̃́ | *avec le frein* | with the brake |
| (55) | pwís lə blʌ:mé | *puisse le blâmer* | can blame him (subj.) |
| (56) | lə rpʌ́ | *le repas* | the meal |
| (57) | lə nmɑ̃:dé | *le demander* | to ask (for) it |
| (58) | pɛyé lə rpʌ́ | *payer le repas* | to pay for the meal |
| (59) | kɑ̃ lə nmɑ̃:dé | *quand le demander* | when to ask for it |
| (60) | mɑ̃́wž lə rpʌ́ | *mange le repas* | eat the meal |
| (61) | pur lə nmɑ̃:dé | *pour le demander* | to ask for it |

This problem involves (1) formulating the rule of SCHWA DELETION, and (2) ordering it in relation to the other processes. On the basis of forms like (31), (34), (52) and (53), the rule can be stated as:

SCHWA DELETION

$$V \rightarrow \emptyset \;/\; V\ \#\ C\ \_\ \#\ C\ (\{l, r\})\ V \;/\; \text{ART/PRO } le$$

This rule does not interact with any of the others.

In sum, then, *le* can be affected by ELISION, /l/-GEMINATION (as a pronoun only) and SCHWA DELETION, *la* can be subject to ELISION, /l/-DELETION and /l/-GEMINATION (as a pronoun only), and *les* can undergo LIAISON and /l/-DELETION. The only two crucial ordering relations are those involving ELISION and /l/-DELETION, on one hand, and ELISION and /l/-GEMINATION, on the other. In other words, ELISION must apply before both /l/-DELETION and /l/-GEMINATION, bleeding the former and feeding the latter.

V

A good way of testing whether I-IV has been properly assimilated is to ask students to determine which of the morphophonemic processes, viz. ELISION, LIAISON, /l/-DELETION, /l/-GEMINATION and SCHWA DELETION, must apply to each of the six following base forms in order to derive the correct surface sequences:

(62) ž́ã {lə, la, le} {prã́, aprã́} *Jean* {*le*, *la*, *les*} {*prend*, *apprend*} John {is taking, is learning} {it, them}

Following are the six correct derivations:

| | | | |
|---|---|---|---|
| (62a) | INPUT | #ž́ã#lə#prã́# | John is taking it |
| | SCHWA DELETION | ž́ã l prã́ | |
| | OUTPUT | [ž́ã l prã́] | |
| (62b) | INPUT | #ž́ã#la#prã́# | John is taking it |
| | /l/-DELETION | ž́ã a prã́ | |
| | OUTPUT | [ž́ã a prã́] | |

| | | | |
|---|---|---|---|
| (62c) | INPUT | #žã́#le#prã́# | John is taking them |
| | /l/-DELETION | žã́ e prã́ | |
| | OUTPUT | [žã́ e prã́] | |
| (62d) | INPUT | #žã́#lə#aprã́# | John is learning it |
| | ELISION | žã́ l aprã́ | |
| | /l/-GEMINATION | žã́ ll aprã́ | |
| | OUTPUT | [žã́ ll aprã́] | |
| (62e) | INPUT | #žã́#la#aprã́# | John is learning it |
| | ELISION | žã́ l aprã́ | |
| | /l/-GEMINATION | žã́ ll aprã́ | |
| | OUTPUT | [žã́ ll aprã́] | |
| (62f) | INPUT | #žã́#le #aprã́# | John is learning them |
| | LIAISON | žã́ lez aprã́ | |
| | /l/-DELETION | žã́ ez aprã́ | |
| | OUTPUT | [žã́ ez aprã́] | |

## REFERENCES


Hooper, Joan. 1976. *An Introduction to Natural Generative Phonology*. New York: Academic Press.

Klausenburger, Jurgen. 1978. Liaison 1977: The case for epenthesis. *Studies in French Linguistics* 1.2.

Laliberte, Therese. 1974. L'élision du 'l' en français québécois. *Lingua* 33.115-22.

Picard, Marc. 1974. L'effacement du schwa dans les monosyllables en québécois. *Cahiers de Linguistique* 4. Québec: Les Presses de l'Université du Québec.

_____ 1977. Les règles morphophonémiques en diachronie. *Montreal Working Papers in Linguistics* 8.

Picard, Marc. 1980. Vowel harmony and morphophonemic rules. In Robert Vago (ed.), *Issues in Vowel Harmony*. Amsterdam: John Benjamins.

Pope, Mildred. 1966. *From Latin to Modern French*. Cambridge: Cambridge University Press.

Schane, Sanford. 1968. *French Phonology and Morphology*. Cambridge, MA: MIT Press.