

## **Remarks on language play**

William J. Idsardi, University of Delaware

Eric Raimy, Swarthmore College

### **ABSTRACT**

This remark argues for the utility of the precedence model of phonological representations as proposed for reduplication by Raimy (2000) in the analysis of language play and poetry. We provide analyses of the English word games Pig Latin and Ibenglibish and also of rhyme and alliteration. In our analysis of Pig Latin we discuss data from variation in the game form presented in Barlow (2001) and the conclusions that Barlow draws. We argue that the analysis proposed here provides a better understanding of the basis of variation in Pig Latin and across other English language games, e.g. Ibenglibish. Following Churma (1985), we argue that it is better to analyze the variation found in Pig Latin to be based on variation in how the game is played and not as variation in the basic English grammar of the players as proposed by Barlow (2001). Following from this we provide analyses of English rhyme and alliteration to further illustrate how language play can be analyzed using proposals in Raimy (2000). We also conclude that language play does not directly manipulate phonological constituents (e.g. syllables, feet, etc.) per se and that Raimy (2000) provides the mechanisms that are required to explain this characteristic of language games.

**KEYWORDS:** rhyme, alliteration, language games, ludlings, syllable structure, phonology

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### **1.0 Introduction**

In this remark we argue for the utility of the precedence structures proposed in Raimy (2000) for reduplication in analyzing language play in general. Section 2 discusses interpretations of variation in Pig Latin proposed by Barlow (2001). We disagree with Barlow's conclusions about phonological constituents based on data from Pig Latin. To support our point we provide data from Pig Latin and Ibenglish from a single speaker and provide analyses based on proposals from Raimy (2000). Our conclusion from this data is that language games do not provide reliable evidence for phonological constituents as assumed by Barlow (2001). Sections 3 and 4 provide analyses of rhyme and alliteration respectively which further support the claim that language play does not provide reliable evidence for phonological constituents. Section 5 summarizes the points in this remark.

### **2.0 Variation in English language games**

Barlow (2001) examines the variation in Pig Latin game forms for English words with the goal of resolving various controversies about the structure of English pre-vocalic consonant sequences. She considers the status of /s-/ clusters with regard to the possibility of an appendix constituent, and the status of /-j-/ clusters as to whether the glide is syllabified in the onset or in the nucleus. The structure of her argument is that the usual internal phonological evidence for these questions is ambiguous, and therefore we

should use external evidence to resolve the questions. Specifically, Barlow assumes that Pig Latin provides reliable evidence that can be used to settle the phonological question of how /j/ is syllabified in a word initial cluster. We differ with Barlow's view of these affairs and will reiterate a point made by Churma (1985: 89) that attributing the variation to different versions of the game yields a more perspicuous analysis.

Barlow (2001) admits that Pig Latin can have at least two "dialects", one which moves only the first consonant, as in [lube] for blue (her dialect A), and another which moves an initial consonant cluster, yielding [uble] for blue (her dialect B). The data she collected shows additional types of behaviors, which Barlow attributes to differing phonological representations for the speakers, or to nothing in particular in cases such as [pjuspe] for spew. That is, in Barlow's analysis there are two main sources of variation: the game dialect, and the speaker's phonological grammar. We suggest, as does Churma (1985), that the same effects can be achieved more simply by allowing for more variations on the game while keeping the regular phonological grammar constant. Once additional different games are considered, this becomes the only plausible explanation.

Consider the Pig Latin forms for one of the authors (author #1):

- (1) a. flew [ufle]
- b. spew [uspe] \*[juspe], \*[uspje]

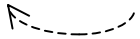
Under Barlow's analysis, author #1 would be a member of her Dialect B, which moves the entire onset. The absence of [j] in the output is then attributed to a phonological grammar that syllabifies [spju] with [spj] as the onset. After the whole onset is shifted,

the [j] is deleted for phonotactic reasons before [e]. Now, however, consider the forms also produced by the same speaker for a different game, Ibenglish, in which [ajb] is inserted into each syllable:

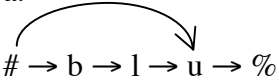
- (2) a. flew [flajbu]  
b. spew [spajbju] \*[spjajbu], \*[spajbu]

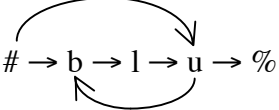
If this game is defined similarly to the Pig Latin game and provides evidence for author #1's onsets, then from (2a) we conclude that [ajb] is inserted after the entire onset [flajbu] and not \*[fajblu]. However, [spju] now behaves oppositely to the Pig Latin form, in that the output [spajbju] is generated by assuming that the onset is [sp] and not [spj]. If the onset were [spj], then the form would be either \*[spjajbu] (without phonotactic repair) or \*[spajbu] (with the phonotactic repair). Thus under Barlow's analysis, the two games offer conflicting evidence for the syllabification of [spju] in the base grammar of the speaker. Since it is not very plausible that author #1's phonological grammar changes with the game played, the only likely analysis is that the two games are defined slightly differently for author #1. We will now offer a brief analysis of these games and their variations using the theory developed in Raimy (2000).

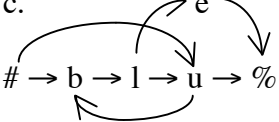
Raimy's theory offers a novel characterization of reduplication and other non-concatenative morphological patterns using graph structures for phonological precedence relations. For example, total reduplication is represented by a "backwards" link (dotted) from the last segment to the first one, as in (3).

(3) # → k → æ → t → % >> 'cat-cat'  


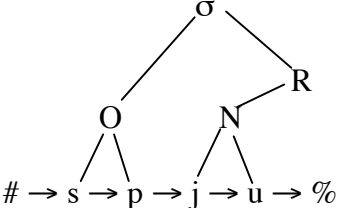
So, for a Pig Latin form such as [blu] < [uble] we need to specify the following additional links to the form [blu]. These additions are as follows: a link that jumps to the [u], (4a), a loop back to the first segment, (4b) and the addition of the suffix [e], (4c), which produces the complete graph.

(4) a.  


b.  


c.  


The very fact that speakers vary on the /-Cj-/ forms indicates that these clusters are phonologically different from the others, but we will assume that they are analyzed uniformly in the speech community, with /j/ as part of the nucleus. That is, we posit the structure in (5). The variation in behavior is then due to how such unusual structures are accommodated within the different games.

(5)  


These are the only cases of on-gliding diphthongs in English, and we agree with findings such as Shattuck-Hufnagel (1986) that they are not represented as onsets. When certain game players treat them parallel to true onset clusters, this is due to different possible statements of anchoring locations which define how additional precedence links are concatenated to a form.

We are now in a position to offer a typology of the various Pig Latin dialects as parameterized choices for the anchoring points of the links. It is invariably part of the game to include a loop back from the last segment to the first segment, the same link that is used for total reduplication, as in (3). Thus, under this analysis Pig Latin is essentially a complex form of reduplication with additional truncations (see Nevins and Vaux 2003). The possible targets of the initial jump link are: (a) after the initial consonant, i.e. #C\_ or (b) to the first vowel or (c) to the first nuclear segment. The possible anchoring points for the /-e/ suffix are: (a) the initial consonant or (b) the segment before the first vowel or (c) the end of the initial onset. Normally, the game is played so as to synchronize the choices for both of these parameters, as shown along the main diagonal in (6). This has the effect of neither repeating nor dropping material. However, it is possible to play the game in other ways, as documented by Nevins and Vaux (2003).

(6) Forms of blue spew

Anchoring points for suffix /-e/	Anchoring points for jump link		
	A. after initial C	B. first V	C. first nucleus
a. initial C	[lube pjuse]	[ube use]	[ube juse]
b. C before first V	[luble pjuspje]	[uble uspje]	[uble juspje]
c. end of initial onset	[luble pjuspe]	[uble uspe]	[uble juspe]

The shaded cells are the cases considered by Barlow. The cell (Aa) represents her dialect A, the cells (Bb) and (Bc) are her dialect B with non-nuclear /j/ (with and without the phonotactic repair), and cell (Cc) is her dialect B with nuclear /j/. Nevins and Vaux (2003) have collected examples with repetition, such as those in cells (Ab) and (Ac), for example some speakers respond with [ritre] for the word tree, and Barlow (2001: 693) recorded [pjuspe] for spew.

Given the phonotactic restriction against \*[Cje] sequences, we would expect speakers to migrate toward versions of the game that do not produce such sequences. Thus, all of the cells in row (b) will be disfavored as solutions to the game, although they are attested for some speakers.

Finally, cells (Ba) and (Ca), while predicted by the typology, result in poor examples of speech play for pragmatic reasons. In these versions of the game, segments are skipped in the output, rendering various forms homophonous in the game. We do not see this as a grammatical condition on recoverability, as there certainly are morphological processes that truncate material (such as hypocoristic formation), but rather as a language-external condition on what constitutes a reasonable form of speech play. It

should be noted that one game form of Cuna (Sherzer 1976) replaces all vowels of a word with /i/'s. This is a similarly destructive game form, and therefore we must allow such forms as a technical matter, while understanding that they may be less useful as forms of language play because of their potential to distort the underlying linguistic message even to speakers fluent in the game.

We can now turn to describing how Ibenglish is played by author #1. We do not have data about possible variants of this game culled from multiple speakers so we will only give a single definition of the anchor points that are used to indicate where the [ajb] affix is inserted. For this we need to specify the anchor point that [ajb] will precede and the anchor point that describes what [ajb] follows. The [ajb] affix precedes the first segment of each nucleus and follows whatever precedes this segment. This arrangement of anchor points when treated as an iterative process (which is an inherent part of this particular language game) will insert [ajb] before every nucleus regardless of whether there is an onset for that particular syllable. Consider the forms in (7).

- (7) a. 
$$\begin{array}{c} a \rightarrow j \rightarrow b \\ \uparrow \quad \downarrow \\ \# \rightarrow f \rightarrow l \rightarrow u \rightarrow \% \end{array} \quad \underline{\text{flew}} > \underline{\text{flibew}}$$
- b. 
$$\begin{array}{c} a \rightarrow j \rightarrow b \\ \uparrow \quad \downarrow \\ \# \rightarrow s \rightarrow p \rightarrow j \rightarrow u \rightarrow \% \end{array} \quad \underline{\text{spew}} > \underline{\text{spibew}}$$
- c. 
$$\begin{array}{c} a \rightarrow j \rightarrow b \qquad a \rightarrow j \rightarrow b \\ \uparrow \quad \downarrow \qquad \uparrow \quad \downarrow \\ \# \rightarrow i \rightarrow \eta \rightarrow g \rightarrow l \rightarrow i \rightarrow f \rightarrow \% \end{array} \quad \underline{\text{English}} > \underline{\text{Ibenglish}}$$

The important things to note about Ibenglibish are what similarities and differences it has with Pig Latin specifically with how author #1 plays both games. One fundamental difference between the games is that Ibenglibish is an iterative game in that it inserts the [abj] affix before every nucleus (this is similar to the Cuna game described by Sherzer which replaces every vowel with /i/). Pig Latin on the other hand only adds links to manipulate and rearrange the first syllable of every word. The other important way that Ibenglibish is different from Pig Latin is in the anchor points that are used by author #1 for each game. This point is where the paradoxical behavior of the /j/ according to Barlow's analysis of Pig Latin mentioned in (1) and (2) is explained. Author #1's dialect of Pig Latin is a (6Bc) with phonotactic repair or (6Bb) with omission of the /j/ due to a mis-synchronization of the links type of Pig Latin. Importantly, he uses the first vowel as the anchoring point for the jump link. This anchoring point differs with the one that is used in Ibenglibish for author #1 which makes reference to the first nuclear segment. As mentioned earlier, this analysis explains the variation in game forms through different rules for each game and does not require the claim that author #1's grammar of English with respect to the syllabification of on-glides varies according to which game is being played. In other words, language games like Pig Latin and Ibenglibish do not provide reliable evidence for phonological constituents because they only make reference to these constituents and do not manipulate them. Following suggestions by Churma (1985) we believe that contradictory information about phonological constituents from language games indicates that there is variation in the language games themselves and not the grammar.

### 3.0 Rhyme

Other forms of speech play are also best defined in terms of anchor points instead of phonological constituents. One prominent example is English rhyme. Rhyme itself is often used to motivate sub-syllabic constituency, as in (8).

- (8) “Words like *bat, cat, rat, flat, spat,* and *sprat,* are said to rhyme. This is because they have identical pronunciations after the first consonant or consonant cluster. We can divide a syllable therefore into two halves, the **Rhyme** (or **Rime**) and the **Onset.**” (Radford et al 1999:88)

However, in order for two lines to rhyme in poetry, a slightly different condition must be met. Trask explains the difference (1996: 311):

- (9) rhyme /raɪm/ *n.* 1. Either of two or more words which have identical nuclei in their stressed syllables and identical sequences of segments after these nuclei:  
*bear/care; plate/berate; utter/butter; vision/collision; heinous/Coriolanus.*

Under no theory of metrical phonology will [ɪʒən] (as in the rhyming pair *vision/collision*) be a constituent to the exclusion of the onset. Therefore, in poetic practice, rhyme is not the matching of two phonological constituents. Rather, it is the matching of a string of segments defined by specific anchor points, as in the games above, or in reduplication (Raimy 2000). In the present case, the anchor points are the last stressed vowel and the end of the word. In Raimy’s notation, we have a truncation of

the vast majority of the line – a jump link from the beginning of the line to the last stressed element (i.e. the last element with a line 1 or line 2 grid mark in the terms of Halle & Vergnaud 1987). The comparison then proceeds between the remaining portions of the lines, which must then match. Various degrees and kinds of rhyme (near, half, masculine and feminine rhymes) are defined on these remainders.

(10) ...

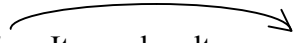
It may be altogether

From one day's perfect weather


...

(Frost, "Happiness Makes Up in Height for What it Lacks in Length")

# → It may be altog → ether → %



# → From one day's perfect w → eather → %

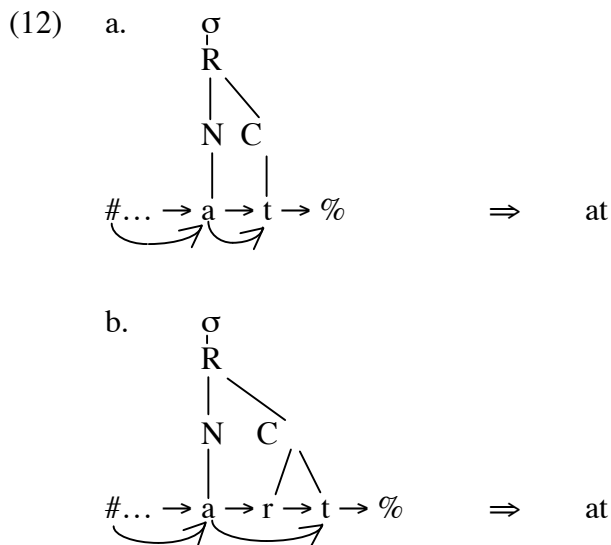


Notice that the potential alternative rhyming scheme, which would match only the rime of the stressed syllable would be formally more complex under this theory, as it would require an additional jump link from end of the stressed syllable to the end of the line. Theories which place a premium on constituency matching would make the opposite predictions of complexity in this case.

Poetic traditions requiring two jump links are attested, however. Tuareg (North African Berber, Greenberg 1960: 946) compares a potentially discontinuous portion of the lines, as explained by Fabb:

- (11) The rule for rhyme is complex in its reference to syllable structure: the syllable nucleus must be identical and the final consonant in the coda must be equivalent. (Other consonants are apparently ignored: thus in one poem *-at* rhymes with *-art*, and also with *-ayt* and *-ant* and *-alt*.) (Fabb 1997: 129)

In Raimy's theory we would add two jump links: one from the beginning of the line to the last vowel, and one from the last vowel to the final segment. This is shown below in (12) where the links described above produce a non-constituent sequence from *-at* (12a) and *-art* (12b) that rhymes.



Although the rhyme calculation in Tuareg is similar to the potential “stressed rime” rhyme case discussed earlier, the matched portion is not a phonological constituent here.

A final issue in the analysis of English rhyme that must be mentioned is the observation that words are generally not rhymed with themselves (Espy 2001).

Questioning whether repetition of a word should be counted as a rhyme or not in a formal

analysis of rhyme is where we must begin. Consider the following couplets from Chaucer's *Canterbury Tales* in (13-18) which present different types of rhyming the same word.

(13) *Same word*

They been so trew and therewithal so wise--  
For which, if thou wolt werken as the wise,  
Do alway so as women wol thee rede.  
Lo how that Jacob, as thise clerkes rede,

(The Merchant's Tale ll 115-8)

*and 4 additional cases*

(14) *Homophones/Polysemy*

So that I have my lady in mine armes!  
For though so be that Mars is god of armes,

(The Knight's Tale ll 1389f)

*and 15 additional cases*

(15) *Homophones by Open Syllable Lengthening*

The holy blissful martyr for to seeke  
That hem hath holpen whan that they were seke

(General Prologue ll 17f)

And caught the cultour by the colde steele.

Full soft out at the door he gan to stele,

(The Miller's Tale ll 599f)

(16) *Prefix cases (cove/overcome type)*

That he you had an hundred frankes paid

By redy toekn. And held him yvel apaid.

(The Shipman's Tale ll 389f)

*and 9 other cases*

(17) *Homophones + prefix (las/alas type)*

Whan Vulcanes had caught thee in his las

And foond thee ligging by his wife, alas!

(The Knight's Tale (ll 1531f)

(18) *Following unstressed word cases (clerkes/clerk is type)*

After th'opinion of certain clerkes:

Witness on him that any parfit clerk is

(The Nun's Priest's Tale ll 415f)

*and 2 additional cases*

All of the examples in (13-18) show cases of rhyming where the segments that occur before the material that is compared for rhyming is phonologically identical. (13)

presents cases where Chaucer uses the same word in the rhyme scheme. Presumably, this would be the strongest violation of a restriction on using repetition of words to satisfy a rhyme scheme if such a restriction were part of the rule of rhyme. (14) presents cases where the rhyming words are homophonous or polysemous. In other words, the identicalness of these words is only at the phonological level and the rhymed words differ in semantic content. (15) shows cases where the two rhymed words are different semantically and at the underlying representation level but are made phonologically equivalent through the application of the phonological rule of open syllable lengthening. /seeke/ and /seke/ are different words but end up pronounced the same way, [seeke], because /seke/ undergoes open syllable lengthening. The rhymed words in (16) are ones where the only difference is that one of the words has a prefix attached. Consequently, the segments immediately before the rhymed region are identical but one of the words has additional material due to affixation. (17) is a combination of the types found in (14) and (16) in that two homophonous words are rhymed but they differ in that one of them contains a prefix (as in the examples from (17)). Finally, (18) presents the situation where the final syllable of the line is unstressed which causes the rhymed region to be stretched farther back into the line. In these particular cases, the words that actually contain the stressed vowel of the rhyme are identical and the rhymed sequence only differs in the origin of the following unstressed syllable in the rhyme. One of the rhymed words contains the unstressed syllable as part of the word while the other rhymed word has a following unstressed word.

We conclude from the examples of identical rhymes in Chaucer in (13-18) is that there is no part of rhyme calculation *per se* which requires the 'non-identicalness' of

segments preceding the rhyme. The general avoidance of repeating words to satisfy rhyme is similar to the external factors discussed earlier with respect to Pig Latin. In the Pig Latin case we suggested that there are external considerations about how language games should be played that favor some instances of forms in a language game over others; as a pragmatic matter. A different external factor ranges over the art form of rhyming which encourages the poet to be creative and avoid triteness. Repeating a word to make a rhyme is trite. It is too easy. There is no game or art involved in rhyming in this way. Consequently, ‘good’ rhymes avoid this triteness and strive to create rhymes that are creative and playful. Once the artist knows how to rhyme, the art form is the pursuit of combining non-trivial rhymes with the message of the poem.

To conclude this section, rhyming in English and other poetic traditions operates on strings of segments that do not necessarily match to a phonological constituent. The representations and mechanisms proposed in Raimy (2000) to account for reduplication and all types of affixation provide the necessary resources to provide analyses of how the strings that are matched in rhyme are calculated.

#### **4.0 Alliteration**

Expanding our coverage of language play based on proposals in Raimy (2000), it is especially instructive to consider the Old English (and generally Germanic) poetic alliteration patterns, summarized by Russom, quoted in (19):

- (19) The concept of equivalence for alliteration derives from native speaker intuitions about syllable structure, and corresponds to the concept of equivalence for early

Germanic reduplication. In most cases, stressed syllables alliterate if they have the same initial consonant, regardless of other consonants in the onset. Thus the *-r-* of ON *brim* ‘sea’ plays no role in alliterative matching and this word may be used to alliterate with *blindr* ‘blind’ or *bekkr* ‘bench’. However, when the onset begins with the group *sp-*, *st-*, or *sk-* (usually spelled *sc-* in the Codex Regius), both elements of the group must be matched. Thus *steinn* ‘stone’ alliterates with *strangr* ‘strong’, but not with *sonr* ‘son’ or *spakr* ‘wise’. Only consonants participate in alliterative matching. When a stressed syllable begins with a vowel, the quality of the vowel is ignored and the empty onset is treated as a “zero consonant” equivalent to any other empty onset. Thus *áss* ‘god’ (*Øáss*) alliterates with *eldr* ‘fire’ (*Øeldr*) and *iorD* ‘earth’ (*ØiorD*). (Russom 1998: 64)

While it is certainly possible that Old English (and Germanic) had different syllable structures than Modern English, most of the syllable patterns have remained constant during the diachronic changes. That is, the syllable canon of Old English is remarkably close to that of Modern English, and therefore it is more perspicuous to assume that the structures are in fact continued to this day. If so, the pattern of alliteration described in (19) sheds additional light on Barlow’s argument. Notice that onsets consisting of an obstruent and a sonorant are treated in the same way regardless of whether the sonorant is a liquid or a glide. That is *g-*, *gl-*, *gr-*, *gw-* and *gj-* would all alliterate regardless of whether the glide is syllabified in the nucleus or not. The *sC-* cases show that only a portion of the onset is considered for alliteration (disregarding any following segment in the onset), and if the /s/ is an appendix, then we again have a non-constituent matching

procedure. A similar patterning is employed by Birney in his modern adaptation of Germanic alliterative verse:

(19) Anglosaxon Street

<u>Dawndrizzle</u> ended	<u>dampness</u> steams from
<u>blotching brick</u> and	<u>blank</u> plasterwaste
<u>Faded housepatterns</u>	<u>hoary</u> and <u>finicky</u>
<u>unfold stuttering</u>	<u>stick</u> like a <u>phonograph</u>
Here is a <u>ghetto</u>	<u>gotten</u> for <u>goyim</u>
O with <u>care denuded</u>	of <u>nigger</u> and <u>kike</u>
No coonsmell <u>ranks</u>	<u>reeks</u> only cellarrot
attar of <u>carexhaust</u>	<u>catcorpse</u> and <u>cookinggrease</u>
Imperial <u>hearts</u>	<u>heave</u> in this <u>haven</u>
Cracks across <u>windows</u>	are <u>welded</u> with slogans
There'll Always Be An <u>England</u>	<u>enhances</u> geraniums
and <u>V's</u> for <u>Victory</u>	<u>vanquish</u> the housefly
Ho! with climbing sun	march the bleached beldames (no alliteration)
<u>festooned</u> with shopping bags	<u>farded flatarched</u>
<u>bigthewed Saxonwives</u>	<u>stepping</u> over <u>buttrivers</u>
waddling back wienerladen	to suckle smallfry (no alliteration)

<u>Hoy!</u> with <u>sunslope</u>	<u>shrieking</u> over <u>hydrants</u>
<u>flood</u> from <u>learninghall</u>	the <u>lean</u> <u>fingerlings</u>
<u>Nordic</u> <u>nobblecheeked</u>	<u>not</u> all clean of <u>nose</u>
<u>leaping</u> <u>Commandowise</u>	into <u>leprous</u> <u>lanes</u>
<u>What!</u> after <u>whistleblow!</u>	spewed from <u>wheelboat</u>
after <u>daylong</u> <u>doughtiness</u>	<u>dire</u> handplay
in <u>sewertrench</u> or <u>sandpit</u>	come <u>Saxonthe</u> <u>gn</u> s
<u>Junebrown</u> <u>Jutekings</u>	<u>jawslack</u> for meat
Sit after <u>supper</u>	on <u>smeared</u> doorsteps
not <u>humbly</u> swearing	<u>hatedeeds</u> on Huns
<u>profiteers</u> <u>politicians</u>	<u>pacifists</u> Jews
Then by twobit <u>magic</u>	to <u>muse</u> in <u>movie</u>
<u>unlock</u> picturehoard	or <u>lope</u> to alehall
<u>soaking</u> <u>bleakly</u>	in <u>beer</u> <u>skittleless</u>
<u>Home</u> again to <u>hotbox</u>	and <u>humid</u> <u>husbandhood</u>
in <u>slumbertrough</u> <u>adding</u>	<u>sleepily</u> to <u>Anglekin</u>
Alongside in <u>lanenooks</u>	carling and <u>leman</u>
<u>caterwaul</u> and <u>clip</u>	<u>careless</u> of Saxonry

with moonglow and haste

and a higher heartbeat

Slumbers now slumtrack

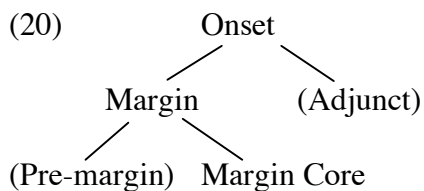
unstinks cooling

waiting brief for milkmaid

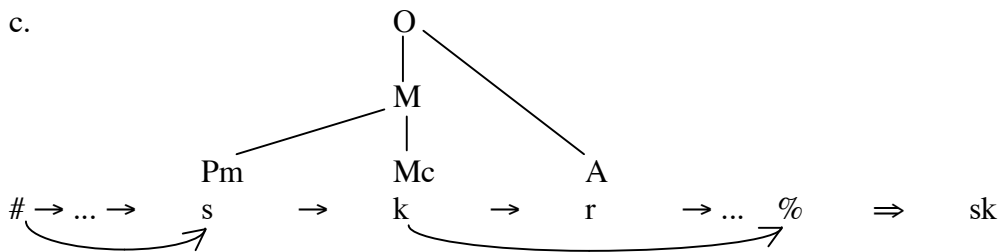
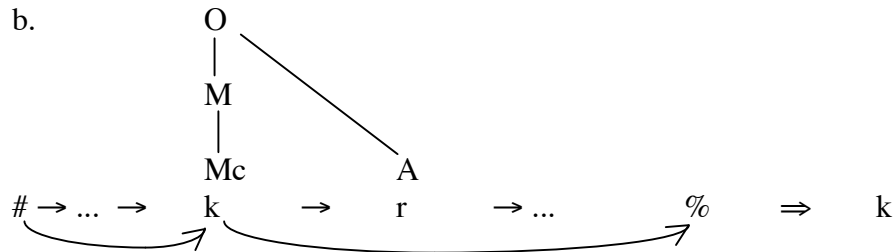
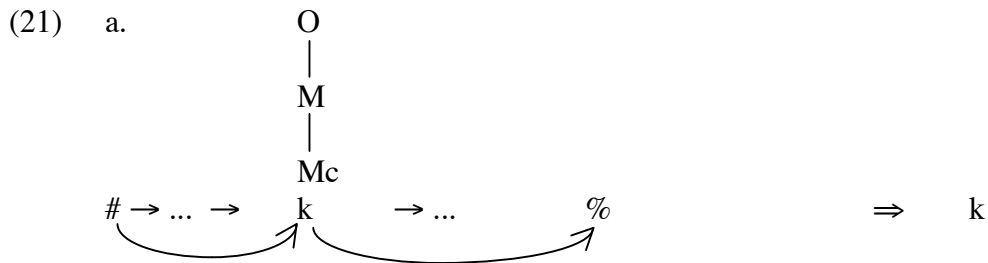
mornstar and worldrise

*Toronto 1942*

The Germanic pattern can be easily handled in Raimy's framework by distinguishing a margin core position in the onset, in the sense of Cairns and Feinstein (1982). The structure of the onset proposed by Cairns and Feinstein (1982) is presented in (20).



Cairns and Feinstein (1982) argue that all simple onsets occupy the margin core which is the unmarked structural position of the onset. The pre-margin and adjunct positions only occur when there is a consonant cluster present in the onset. In consonant sonorant clusters in English, the obstruent will occur in the margin core and the sonorant will occur in the adjunct position. For /sC/ onsets in English, the C will occur in the margin core with the /s/ being parsed as the pre-margin. Given this structure to the onset position, we can now define how Old English alliteration works. Consider (21) which show the onsets of stressed syllables that are considered in an alliteration calculation.



Alliteration is calculated by adding a jump link from the beginning of the half-line to the beginning of the stressed syllable. Another jump link is added from the margin core position (or, for Birney, the first segment) in the stressed syllable to the end of the half-line. The importance of the margin core position is that it excludes the liquid in cases like (20b) so these clusters will alliterate with simple Cs in the onset if the consonant matches (like (20a)). Since the alliteration rule jumps to the beginning of the onset the /s/ in /sC/ sequences (as in (20c)) is not excluded which explains why /sC/ sequences only rhyme with other /sC/ sequences that have the same C. In other words, neither (20a) nor

(20b) alliterates with (20c) because the /s/ is included in the sequence compared for matching in the alliteration calculation.

When alliteration is considered, we see the recurring picture that language play does not directly manipulate phonological constituents. Instead, phonological constituents play a role in providing potential string internal anchor points which can be referred to. Alliteration is another case where string matching occurs but the strings that are compared do not map to any legitimate phonological constituent.

## **5.0 Conclusion**

Our brief examination of a small variety of language games and poetic devices shows that they are not simple diagnostics for phonological constituents such as onset, as Barlow (2001) and others would have it. Rather, the facts are more subtle, and provide only indirect evidence for the syllabic constituency. For Pig Latin and Ibenglibish, we have shown how it is possible to provide accounts of the various games and game dialects assuming that /-j-/ is syllabified within the nucleus for all speakers under consideration. The different behaviors then follow from slightly different ways of playing what is essentially the same game. That is, the variation in behavior belongs to the game and not to the phonology. This echoes points made by Churma (1985) and alleviates the need to invoke multiple grammars dependent on different language games to explain the first author's behavior which would be the case if Barlow's (2001) approach is adopted. We expanded the observations from language games to include analyses of English rhyme and Old English Alliteration which share the similar claim that what is being compared is not necessarily a phonological constituent.

We believe that these findings provide additional support for the claims made in Raimy (2000). It should be no surprise that mechanisms required to account for reduplication also account for language games once we recognize that language games do not directly manipulate phonological constituents. It has been known since at least Marantz (1982) that reduplication is not simply constituent copying. The anchor point approach to affixation proposed in Raimy (2000) appears to have the exact characteristics which allow analysis of all affixation type processes. The non-phonological constituent behavior of reduplication and language games results from the observation that common combinations of anchor points generally do not coincide with a legitimate phonological constituent. It should be noted that there is no reason why a language could not specify a set of anchor points that do coincide with a phonological constituent though. This is apparently the case for Yidin (Dixon 1977) ‘foot reduplication’ as discussed in McCarthy and Prince (1986). The relative rarity of reduplication patterns which coincide with an actual phonological constituent can be understood from the observation that only a small subset of anchor point pairings will produce the surface effect of constituent copying while the rest (and majority) of attested anchor point pairings do not produce this surface effect. Considering the fact that the proposals in Raimy (2000) have provided the mechanisms to achieve the results discussed in this remark, we expect additional favorable results as these proposals are brought to bear on other phonological and morphological phenomena.

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