

## PHONO-SEMANTIC CORRESPONDENCE IN DEICTICS IN EMAI

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This study<sup>1</sup> seeks to show that deictics in Emai<sup>2</sup> exhibit a peculiar structure in which there is a regular correspondence between a unit of sound and a unit of meaning. They are derived from an underlying  $V_1-CV_2-(V_3)$  structure in which  $-CV_2-$  is a deictic root and  $V_1$  a prefix which determines the class or type of deictic. Within each deictic class various kinds of semantic/morphological information (e.g. number, concord, spatial orientation etc.) are expressed by varying the phonological feature composition of one or the other of the  $-CV-$  slots.

Cette étude a pour but de démontrer que les déictiques en Emai possèdent une structure particulière, dans laquelle on trouve une correspondance régulière entre une unité de son et une unité de sens. Ces correspondances s'obtiennent par une dérivation de la structure suivante,  $V_1-CV_2-(V_3)$  dans laquelle  $-CV_2-$  est une racine déictique. Dans chaque classe déictique, différentes indications d'ordre sémantique-morphologique (nombre, accord, orientation spatiale) sont exprimés par en variant la composition du trait phonétique dans l'une ou l'autre des syllabes  $-CV-$ .

## 1. DEICTIC CATEGORIES IN EMAI

'Deictics are words used to bring attention to things in the actual spatio-temporal context in which language is being used or in some way embedded in ongoing discourse' (Brown, 1985:283). They include such categories as the personal pronouns, demonstratives, definite article, spatial and temporal adverbs etc.

Emai has an exhaustive list of deictic categories which include personal pronouns, demonstrative adjectives (or pronouns), adverbs of place and comparative pronouns. A comparison of these deictics reveals that they express basically three dimensions of existence which are perhaps founded on the locative expressions 'here', 'there', and 'yonder'. This assumption is supported by the localists who believe that spatial expressions are more basic and serve as structural template for other expressions. This follows from the view held by psychologists that spatial organisation is of prime importance in human cognition (Lyons, 1977).

## 1.1 PERSONAL PRONOUNS

The category pronoun is commonly regarded as functioning as a substitute for a noun in discourse, but as Lyons (1977:636-7)

argues, its deictic function is more basic than its anaphoric function. Thus, following Lyons' position, a pronoun expresses basically two inseparable bits of information - deixis and reference. Deixis encompasses three deictic roles; first, second, and third persons, although only the first and second persons participate in discourse. As for reference, it is singular or general, depending on whether an expression refers to an individual or classes of individuals. Besides this, a distinction is drawn between pronominal expressions that refer to some specific individual or groups of individuals (definite) and those that do not (indefinite). Finally, a language may draw a distinction between 'reference to the individual whose speech, thoughts, or feelings are reported in a given context - Logophoric reference, from reference to other individuals' (Clements, 1975:1). An adequate description of the pronominal system of a language entails a specification of the forms which are realised in these environments and where necessary a specification of their relationship. Below is a table of Emai pronouns.

Table 1: Pronouns of Emai<sup>3</sup>

		<u>Subject</u>	<u>Object</u>	<u>Possessive</u>	<u>Emphatic</u>
1st pers.	sg.	I	vẽ/*ivẽ	εvẽ	(i)vẽvẽ
	pl.	vã	vãi	avãi	(i)vãvãi
2nd pers.	sg.	u	(w)/*uwε	ε(w)ε	(u)wεwε
	pl.	a	a	va	(i)vava
3rd pers.	sg.		i	ɔi	(i)j̄ɔi
	pl.	ja	ijai	ijãi	(i)j̄ãi
Logophoric	sg.	j	iji	ij̄ɔ	(i)j̄ɔi
	pl.	ja	ijai	ijãi	(i)j̄ãi
Indefinite		a <sup>5</sup>			

All object, possessive and emphatic pronouns have vowel initial, minimal bisyllabic structure. Although the first and second person object pronouns have consonant initial structures, the reconstruction of forms (in stories) having initial vowels suggests that these pronouns had initial vowels. The subject pronouns have V (for singular subjects) and CV (for plural subjects) structures. It is suspicious to have V and CV pronouns in Emai since all non-verbal categories in Edoid languages have a minimal bisyllabic structure, and the initial syllable must be a vowel which functions as a class or concord (for qualifiers) prefix. Comparative evidence from Edo (Omoruyi, 1986:65-6 tables 8 and 9) shows V and CV forms cooccurring with VCV variants in both subject and object positions without obvious semantic implications.

Table II: Pronouns of Edo

Person	Numb.	Subject Variants	Object Variants
1st	sg.	mèmwè, ìmè, mè, í	mwè, ìmè
	pl.	màmwà, ìmà, mà	mwà, ìmà
2nd	sg.	wè, ù	rúè, ùé
	pl.	wà	rùá, ùá
3rd	sg.	ìrèn, ròrèn, rèn, ọ	ìrèn, ọnrèn
	pl.	-	rèn, érè, ẹn -

All these forms are supposed to have been derived from underlying emphatic forms. The underlying forms are listed below:-

1st person sg. & pl.      ìmèmwè and ìmàmwà  
 2nd person sg. & pl.      ùmè, ùwà  
 3rd person sg. & pl.      ìròrèn, ìrán

We do not accept the postulation of the emphatic forms as the underlying forms in Emai because of the presence of a rule which reduplicates morphemes for emphasis in the language. It is clear from the table that the underlying forms have been split up with the parts still retaining the basic pronominal function. It is interesting that the segmental composition of the V and CV forms corresponds to the VCV structure so reaffirming our claim above.

It is our belief that all pronouns in Emai are derived from a basic V-CV(V) subject/object structure. The multiplicity of pronominal structure which we have today is the result of loss of vowel prefix in consonant initial structures, deletion of CV stems in first and second person singular subject positions, the loss of vowel prefix and deletion of consonant in third person singular (subject, object and possessive) positions, and finally, reduplication in emphatic position which adds an additional syllable to the underlying structure.

The loss of -CV stem in the first and second person singular positions is supported by the fact that these pronouns are indistinct (segmentally) from the vowel prefixes of their object and emphatic counterparts. Thus, /i/ and /u/ are the first and second person singular pronoun and prefixes of their respective object and emphatic counterparts. The existence in Edo of VCV forms as subject pronouns lends credence to our position.

Third person singular subject, object and possessive pronouns are derived by a deletion of the vowel prefix and the following consonant. In other third person forms, the palatal approximant is consistently realised as the consonant.

Emphatic pronouns show traces of reduplication of the basic structure except in the third person position where unreduplicated forms are elicited. But in the speech of kids reduplicated forms can still be elicited. This is probably an indication that reduction has affected the reduplicated forms in

that environment. If one considers the fact that emphasis is generally expressed by reduplication in Emai deriving the emphatic forms would be more appealing than postulating them as the underlying forms as was done by Omoruyi (1986) for Edo. Finally, it would be observed that the initial vowels of possessive pronouns are segmentally identical with their stem vowels albeit in the third person position. This is due to total assimilation of prefix vowels in those positions. 'Ora', a member of the dialect cluster consistently realises /o-/ as the initial vowel of possessive pronouns.

## 1.2 DEMONSTRATIVE ADJECTIVES (OR PRONOUNS), COMPARATIVE PRONOUNS AND PLACE ADVERBS

Demonstrative adjectives, comparative pronouns and Place Adverbs are deictics and they provide us with information in the deictic context. Specifically, demonstrative adjectives locate objects or individuals under reference, while deictic adverbs identify the location under reference. Emai draws a distinction between three demonstrative adjectives, three place adverbs and two comparative pronouns, primarily on account of proximity to the deictic zero point. The demonstrative adjectives are further differentiated by number while place adverbs are cross classified by the dimension of 'definiteness' (See tables III, IV and V below).

Table III: Demonstrative Adjectives

Number	A	B	C
Sing.	ɔ̀lã 'this'	(l)i 'that'	ɔ̀lɔ̀i 'the other'
Plur.	èlã 'these'	e(l)i 'those'	élɔ̀i 'the others'
Emphatic Sing.	ɔ̀lálã 'this very one'	-	-
Plur.	élálã 'these very ones'	-	-

Table IV: Adverbs of Place<sup>6</sup>

	Proximal A	B	Non-Proximal C
definite	à(l)ã 'here'	à(l)ái 'there'	èvò 'yonder'
indefinite	è(l)ã 'here'	-	-
Emphatic definite	á(l)ãlã 'this	-	-
indefinite	-	-	-

Table V: Comparative Process

	A	B	C
Non-emphatic	ilá 'like this'	-	ijó 'like that, the other'
Emphatic	ilíilá 'always like this'	-	ijíijó 'always like that, the other'

Before we set out to examine the morphophonological structure of deictics, it is important to restate that deictics express basically three dimensions of existence founded on the locative dimensions 'here', 'there' and 'yonder' represented as A, B, and C in the tables above. The personal pronoun category, however, differs in subtle ways in its realisation of these locative dimensions. The actual dimensions of existence in the personal pronoun category are 'here' (participation in discourse) and 'yonder' (non-participation in discourse). First and second persons participate in discourse and the distinction is a function of the roles which the participants in a discourse assume - either as speaker or listener. These roles are not static. These role distinctions are realised as 'here' and 'there' locative dimensions. No role distinction is made as regards non-participation in discourse (although a distinction may be drawn between reference to the individual whose speech, thoughts or feelings are reported or reflected in a given context - logophoric, and reference to other individuals). It is very important that we make these points since our intention to match a unit of meaning with a unit of sound cannot be realised without first understanding the semantic dimensions involved in all the categories.

## 2. THE STRUCTURE OF DEICTICS

Our aim in this section is to analyse the relationship between forms across the different subcategories. Following this, we shall postulate a structure for the deictic categories on the basis of which their segmental composition can be investigated. This will enable us bring out certain regularities and substantiate our claim of phono-semantic correspondence.

We postulate the following as the structure of the deictic categories.

$$\mu D \rightarrow V_1 \text{ --- } CV_2 \text{ --- } (V_3)$$

$\mu$  = morpheme symbol; D = deictic

### 2.1 SEGMENTAL COMPOSITION OF DEICTICS

The relationship between the deictics can best be revealed by looking at their segmental composition within the underlying  $V_1 - CV_2 - (V_3)$  structure. Only a highly restricted set of segments

can occur in each of these slots across the categories and each of these segments coincides with one of the semantic dimensions expressed in the deictic categories. Below is a chart showing the segmental composition of deictics.

Table VI: The Segmental Composition of the Deictics

Dimension	Number	Personal Pronouns			
Person		V <sub>1</sub>	C	V <sub>2</sub>	V <sub>3</sub>
First person (A)	Singular	i	ʊ	ẽ	∅
	Plural	i	ʊ	ã	i
Second person (B)	Singular	u	[w]	ε	∅
	Plural	i	ʊ	a	∅
Third person	Singular	i	j	ɔ	i
	Plural	i	j	ã	i
Logophoric (C)	Singular	i	j	õ	i
	Plural	i	j	ã	i

V<sub>1</sub> assimilates to V<sub>2</sub> in first and second person position of possessive pronouns. It is absent in plural subject pronouns and optional in emphatic pronouns.

Demonstrative Adjective (or Pronoun)

Dimension	Number	V <sub>1</sub>	C	V <sub>2</sub>	V <sub>3</sub>
A	Singular	ɔ	l	a	∅
	Plural	e	l	a	∅
B	Singular		l	a	i
	Plural	e	l	a	i
C	Singular	ɔ	l	õ	i
	Plural	e	l	õ	i

Place Adverbs

Dimension	Definiteness	V <sub>1</sub>	C	V <sub>2</sub>	V <sub>3</sub>
A	definite	a	l	ã	Ø
	indefinite	e	l	ã	Ø
B	-	a	l	ã	i
C	-	e	v	ɔ	Ø

Comparative Pronoun

Dimension	V <sub>1</sub>	C	V <sub>2</sub>	V <sub>3</sub>
A	l	l	ã	Ø
B	-	-	-	-
C	l	j	ɔ	Ø

A breakdown of the table shows that only four consonants can fill the C-slot. The consonants are /v/, /w/, /j/ and /l/. /j/ has the widest distribution and is consistently realised as the consonant of the third dimension across all the categories except in the demonstrative adjective category where /l/ is realised. /l/ is restricted to demonstratives, adverbs of place and comparative pronouns and specifically to the first and second dimensions of these categories. /v/ is the consonant of the first and second persons environments of the personal pronouns. Even though [w] is realised in the pronunciation of speakers in the second person singular environment as shown above, we believe that /v/ - [w] as a result of the preceding close rounded vowel prefix.

Table VII: Showing a Breakdown of the Distribution of Consonants in Deictics

Dimension	Personal Pronoun	Demonstrative Adjective	Place Adverb	Comparative Pronoun
A	v	l	l	l
B	v	l	l	-
C	j	l	v	j

Only three pairs of vowels are allowed in V<sub>2</sub>-slot. They are: /ε/, /ẽ/, /a/, /ã/ and /ɔ/, /õ/. /a/ occurs as the indefinite pronoun and the vowel of the second person plural environment.

The nasalised counterpart (/ã/) is realised as the vowel of the first and third person plural environments, first and second dimensions in demonstrative adjectives, place adverbs and comparative pronouns. /ɛ/, /ẽ/ occur as the vowel of the second person singular and first person singular environments respectively. Finally /ɔ/, /õ/ occur as the third dimension vowel in demonstrative adjectives, place adverbs, comparative pronouns and as the vowel of the third person singular environment in personal pronouns. The nasalised counterpart is, however, restricted only to the logophoric and emphatic pronouns, and third dimension of demonstrative adjective.

Table VIII: Showing the Distribution of  $V_2$  in Deictics

Dimensions	Personal Pronoun	Demonstrative Adjective	Place Adverb	Comparative Pronoun
A	Sing. ẽ      Plural ã	ã		ã
B	ɛ      a	ã	ã	-
C	ɔ      ã	õ	ɔ	ɔ

Indefinite Pronoun = a

Only /i/ occurs as the  $V_3$  vowel across all the categories. It is, however, restricted to the second and third dimensions. It also occurs in the first person plural object environment although completely absent from the second person pronoun environment, comparative pronouns and third dimension of demonstratives (see table VI).

In the  $V_1$  position for pronouns we realise /i/ and /u/. The latter occurs only in the second person singular positions. We noted earlier that the exact nature of  $V_1$  in first and second person possessive pronoun environment is veiled by the total assimilation of the vowel by  $V_2$ . We suppose that it is not different from the vowels realised in other environments. Demonstrative adjectives alternate between /ɔ-/ , /e-/ in  $V_1$  position to signify singular and plural numbers, whereas place adverbs alternate between /a-/ and /e-/ to indicate definiteness and fuzziness of location. The comparative pronouns have /i-/ as  $V_1$ .

Comparing the demonstrative adjective, place adverbs and comparative pronouns, they are only differentiated by their  $V_1$ -.  $V_1$  is /ɔ-/ , /e-/ for demonstratives, /a-/ , /e-/ for place adverbs and /i-/ for comparative pronouns. Other elements are the same except in the third dimension where there is a variation in the C-element which is /l/ for demonstrative, /v/ for place adverb and /j/ for comparative pronoun. Also  $V_2$  is /ɔ/, /õ/ for the demonstrative adjective and comparative pronoun but /ã/ for the place adverb.



## 2.2 SEMANTIC COMPOSITION OF THE DEICTICS

After discussing the segmental composition of the deictics, we now turn to their semantic composition in line with our claim that there is a regular correspondence between a unit of sound and a unit of meaning.

Each of the segments in the  $V_1$ - $CV_2V_3$  deictic structure correlates with one or the other of the dimensions of 'person', 'reference', class, concord, comparison etc. Notice that demonstrative pronouns, place adverb and comparative pronouns are differentiated by  $V_1$  (See table V1). /ɔ-/ , /e-/ in demonstrative pronouns mark singular and plural number, /a-/ , /e-/ in place adverb mark definite and indefinite location and /i-/ is the comparative morpheme. The  $V_1$ - of demonstrative pronouns are actually concord prefixes attached to the qualifiers of noun; and like other qualifiers, they lose these vowels when they occur in construction with their head nouns. The possessive pronoun also has its initial vowels functioning as concord prefixes.

The  $-CV_2-$  is a deictic root in which  $-C-$  marks deixis (which in pronouns encompasses three deictic roles - first, second and third persons) and  $-V_2-$  reference. Differences in person and reference are marked by varying the feature composition of the  $-CV_2-$ , that of the  $C$ -slot for the former and  $V_2$ - slot for the latter. The first and second persons are realised as /v/ while third person is realised as /j/. It is no coincidence that these consonants are regularly distributed among these dimensions. The occurrence of /j/ in the third dimension comparative pronoun can be traced to the fact that comparison involves entities (objects, persons etc.).

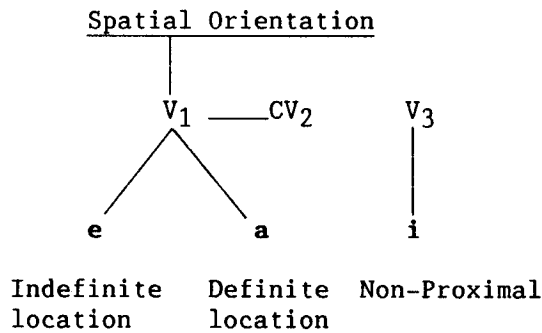
/l/ is the deictic consonant - occurring only in environments where deixis does not involve person (as in personal pronouns). Reference is simply marked by /a-/ , /ã-/ which are the forms realised in the indefinite pronoun, plural pronouns and the forms in the first and second dimensions demonstrative adjective, place adverbs and comparative pronouns. The indefinite pronoun has a plural connotation. In fact, it is seldom understood in a singular sense. Thus, all that seems to be happening here is that /a-/ acquires a plural meaning in personal pronouns where number distinction is crucial. Otherwise we could simply refer to it a marking reference since it is also the form that appears in the environments where it would be inappropriate to talk about number. In the marked singular environment /ɛ/ , /ẽ/ is realised as first and second persons singular morphemes, while /ɔ-/ , /õ-/ simply occur across all deictic categories marking absence from a discourse situation (i.e. marking third dimension reference or 'yonder'). The distinction between first and second persons is conveyed by the presence of nasality on  $V_2$  in the former and its absence in the latter. The nasality has the effect of turning the preceding labio-dental approximant to a bilabial nasal phonetically (i.e. /v/ → [m]).

It would be observed that the final close vowel (-V<sub>3</sub>) noticed in some object pronouns is also present in the second and third locational dimensions in demonstrative adjectives and place adverbs. Our conclusion is that this sound in the scheme marks distance from the deictic zero point. Translated into the personal pronoun category, it marks structural distance. Its absence from the first person sing. and second person singular/plural object positions is probably due to the fact that it is just being extended to personal pronouns. Thus, the language is finding a structural linguistic use for a hitherto locative entity.

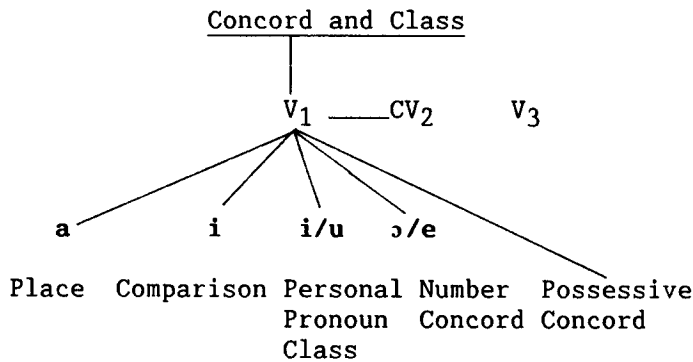
3. CONCLUSION

Our position has been that the deictics in Emai are 'Macro-morphemes' analysable into 'micromorphemes', each of which corresponds to a specific sound unit. Below are representations of these micromorphemes.

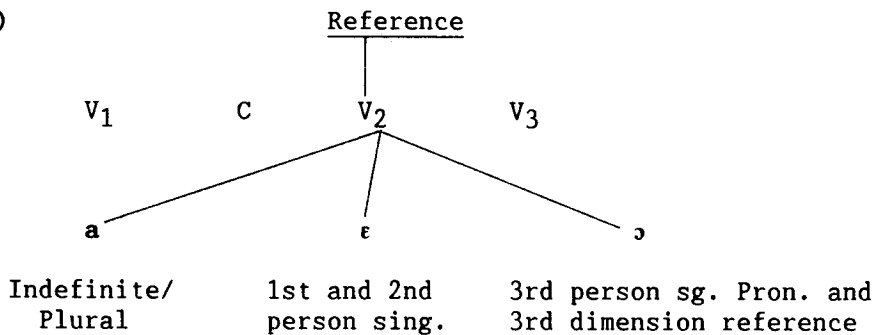
(i)

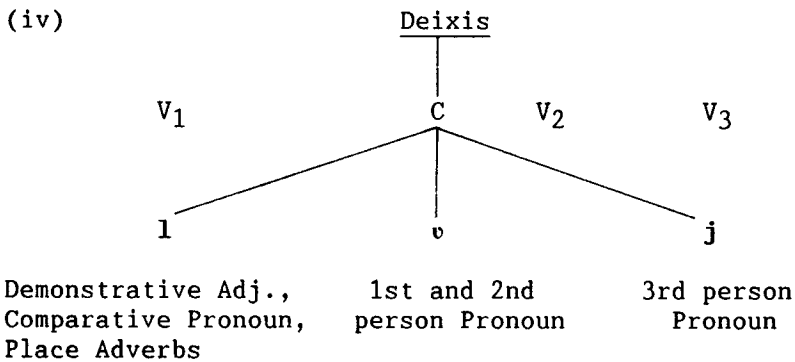


(ii)

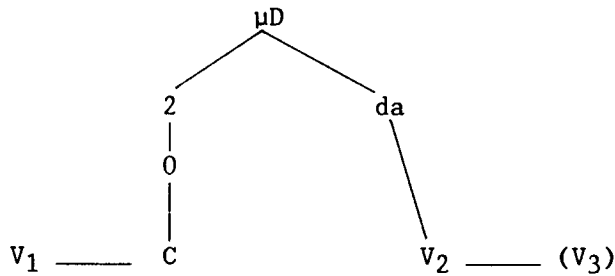


(iii)





We can organise the micro nodes above into the following macro structure:



The deictic is represented as a morpheme symbol branding into a deixis plus reference root represented as /la/. This root will give us information about 'person' by varying the C-element by assigning marked values to C from 0-2, Zero being the neutral value /l/ (1 = /μ/), 2 = /j/. The root will also give us information about reference by assigning the marked + or unmarked - value of α to the V<sub>2</sub>— indicating definite reference or indefinite reference. The indefinite reference translates as plural number in personal pronouns while the definite reference translates as singular number. A choice is made between /ε/ and /ɔ/ definite references depending on whether or not the object of reference exists in the discourse context. Finally, V<sub>1</sub> and V<sub>3</sub> are affixes—the former marking class or concord and the latter marking distance from deictic zero point.

#### NOTES

<sup>1</sup>This paper benefited immensely from suggestions made by Dr. Ron. Schaefer and Dr. Akinlabi. I am very grateful to them. All shortcomings of the paper are, however, mine. The data is presented in phonemic transcription.

<sup>2</sup>Emai is the language spoken by the Emai people who occupy an area of about 30 sq. kilometers in the eastern part of Owan Local Government Area of Bendel State of Nigeria. It is grouped with 'Ora' and 'Iuleha' (languages bordering it to the South and South-West) under the 'Ora-Emai-Iuleha' dialect cluster of the 'North Central Branch' of Edoid by Elugbe (1980). This makes Emai a member of the Kwa Family of 'Niger-Congo'.

<sup>3</sup>Phonemic transcription is utilised since phonetic transcription would introduce some inconsistencies which can potentially defeat our set objectives. Tones are not marked on Personal Pronouns because like verbs (in the language) the tones depend on the construction in which they occur. The asterisked forms are reconstructed in stories and are not currently in use in the language.

<sup>4</sup> a) Emphatic forms with initial vowels can now only be found in stories and in the speech of people considered versed in the language. This accounts for the optional status assigned to the initial vowel in emphatic environment.

b) Although there are no emphatic forms in the third person environment, such forms (/jɔjɔi/ 'him' and /jãjãi/ 'them') are still elicited in the speech of kids. This is perhaps an indication that such forms did exist in that environment.

<sup>5</sup>The indefinite pronoun has a plural connotation. In fact, it is seldom understood in a singular sense.

<sup>6</sup>The alveolar lateral /l/ is almost completely lost in the adverbs of place and demonstrative adjectives. Only a handful of aged speakers still realise it obligatorily in all environments.

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