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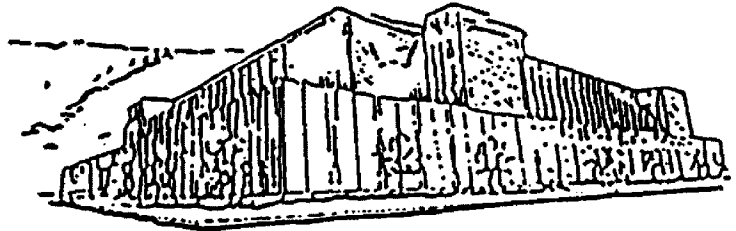
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July 14, 1997

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CONTRASTIVE PHONOLOGICAL ANALYSIS OF FRENCH AND MANDINKA

by

Fallou N'Gom

M.A. The University of Saint-Louis (Sénégal) 1996  
presented in partial fulfillment of the requirements  
for the degree of

Master of Arts

The University of Montana

1997

Approved by:

  
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N'gom, Fallou, M.A., July 1997

French Linguistics

Contrastive Phonological Analysis Of French And Mandinka  
(101 pp.)

Director : O. W. Rolfe 

In this study, my intention is to analyze French and Mandinka phonemic units. The study is inspired by the problems of pronunciation usually encountered by Mandinka native speakers learning French as second language or vice versa. This study is based on Charles Fries' assumption according to which, the most effective material in language learning and language teaching are those based upon a scientific description of the language to be learned carefully compared and contrasted with the parallel description of the language of the learners. This work is founded on the belief that previous knowledge influences present knowledge in language learning and language teaching, hence the notion of transfer which can be positive or negative.

The object of this study is to do a systematic comparison of the French and Mandinka phonological systems in order to ascertain their phonetic and phonological differences, and to predict difficulties or rather interferences that learners may encounter. Ultimately, I will propose phonetic correction methods for the pronunciation of Mandinka students studying French in West Africa and vice versa.

This study is founded on phonetics and phonology which constitute the major linguistic fields of study in the area of pronunciation. The term phonetic will be often used to refer to the articulatory description of sound units, whereas the term phonology is used to refer to the function of the units in both languages. The ability of sound units to differentiate meaning in two words is referred to as a phonemic value. I will use the available phonetic and phonological descriptions of both languages i.e, books, reviews, articles and a cassette of Mandinka as spoken in Sénégal.

Thus, I will analyze and contrast the two systems in order to ascertain similarities and differences which will allow me to predict difficulties to be encountered by students in both languages and suggest phonetic correction methods to be used in French or Mandinka classrooms.

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# LEGEND

/ /                    Phonemic transcription

"                      Onset of stress

/                      Sense-group limit

:

Length

~                      Nasalization

Descending pitch

Rising pitch

I.P.A.                    International Phonetic Alphabet

NB: In this study I have used the I.P.A transcription system for methodological reasons. I have also handwritten the transcription of some sound units, because most of the I.P.A symbols used in the description of French are not available.

## INTRODUCTION

### 0.1. FRENCH LANGUAGE IN AFRICA

Today, the French language is spoken and used as the major means of communication throughout the geographical and political entity known as France and several other countries of the world. The French language which is the 11th most spoken language in the world after Chinese, English, Russian, Spanish, Hindi, Portuguese, German, Japanese, Bengali and Arabic, is widely used in the African continent (Battye and Hintze 1-11). About 80 million people of these Francophone countries use French as a habitual working language, i.e., about 10 per cent of the total population of French speakers of the world. Africa therefore comprises the largest area and largest Francophone population outside Europe.

The presence and the spread of French in Africa date back to the history of French colonization of the West and North African countries at the end of the 19th century. French is mainly spoken in two major geographical locations:

1. North Africa commonly known as the Maghreb comprised of Algeria, Tunisia and Morocco, and 2. West and Central Africa including the 17 countries of Benin, Burundi, Cameroon, Congo, Ivory Coast, Gabon, Guinea Conakry, Burkina Faso, Mali, Mauritania, Niger, The Central African Republic, Rwanda, Sénégal, Chad, Togo and Zaire. Although French is in

competition with Arabic in the Maghreb, most of the countries in West and Central Africa have adopted French as a **LINGUA FRANCA** and their **OFFICIAL LANGUAGE** used in administration, business and education.

## 0.2. MANDINKA LANGUAGE IN AFRICA

Mandinka belongs to the Mande language family which in turn belongs to the Niger-Kordofanian family known more recently as the Niger-Congo phylum spoken in Africa.

The Mande language family accounts for two-thirds of the 1900 known African languages. Mande languages are spoken by about 10 million people in fifteen West African countries. They represent a large population in Mali, Ivory Coast, Guinea Conakry, Sierra Leone and Liberia. They are also well represented in Burkina Faso, Sénégal, The Gambia, and Guinea Bissau, and are found in isolated groups in Mauritania, Benin, Togo, Niger, Nigeria, and Ghana (Dwyer 46-47).

Today, Mandinka exists side by side with French in West Africa. Delafosse in 1901 made the first attempt to classify the Mande languages, seeking common properties beyond lexical similarities; later Greenberg in 1963 revised and reclassified more appropriately the Mande languages (Dwyer 47-49).

Research in the last twenty years has further refined the classification of Mande languages and has brought to light certain aspects which still need to be revised. Despite the

extent of this language family in West Africa, our knowledge about it remains very general and superficial.

### 0.3.THE OBJECT OF THE STUDY

Since French is the official language in most West African countries with an important population of Mandinka native speakers, Mandinka speakers study French as their language of education. In return, in order to have a better understanding of Mandinka culture and civilization, about 20% of French tourists study Mandinka. Consequently, many problems of pronunciation are encountered by Mandinka speakers learning French and French speakers learning Mandinka, due to the very different phonological systems.

It is important to note that the description used in this study is based on Pakawu Mandinka spoken in Sénégal in the present region of Ziguinchor and Kolda whose vocalic system does not include pure nasal vowels.

The object of this study is to analyze French and Pakawu Mandinka phonemic units, i.e., to compare the French and Mandinka phonological systems, and to identify interferences that learners encounter. Ultimately, I will propose corrective techniques and materials to improve the pronunciation of Mandinka people studying French and vice-versa.

## CHAPTER I:

### PHONOLOGY OF FRENCH AND MANDINKA

In this section, I present a descriptive analysis of modern French and Mandinka segmental and suprasegmental units, i.e, existing French and Mandinka vowels and consonants and their prosodic features. My object in this chapter is to describe and classify vowels and consonants with a particular focus on the **PLACES**, **MANNERS** and **TYPES** of phonetic articulations involved in their production, then to examine the basic prosodic features of both languages. This analysis will yield the distinctive features that characterize each sound segment and the nature of the prosodic features of both languages.

I will begin with the analysis of French and Mandinka vocalic systems, then proceed to consonantal systems and ultimately suprasegmentals. For methodological reasons, I will use the I.P.A system to describe both sound systems.

#### **1.1.VOWELS: DEFINITION**

The description, examination and classification of speech sounds constitute the subject matter of phonetic science. Sounds can be identified with reference to their production in the vocal tract, their acoustic transmission, or their auditory reception. This study will be based on the most

widely used articulatory descriptions, because the vocal tract provides convenient and well-understood reference points, and it is by articulatory descriptions that languages are learned and taught. Phonetically, **VOWELS** are distinguished from consonants in terms of how they are articulated in the vocal tract. They constitute sound units that have no stricture: air escapes in a relatively unimpeded way through the mouth or the nose. They are sound units that typically occur at the center of syllables. Vowels are normally described with reference to four criteria (Crystal 152-155):

1. The part of the tongue that is raised (front, center or back).
2. The extent to which the tongue rises in the direction of the soft palate. Generally, three or four degrees are recognized **HIGH**, **MID** (often divided into **MID-HIGH** and **MID-LOW**), and **LOW**. Alternately, tongue height can also be described as **CLOSE**, **MID-CLOSE**, **MID-OPEN**, and **OPEN**.
3. The position of the velum: Raised for oral vowels, and lowered for vowels which have been nasalized.
4. The kind of opening made at the lips: Whether the lips are **ROUNDED** or **SPREAD**.

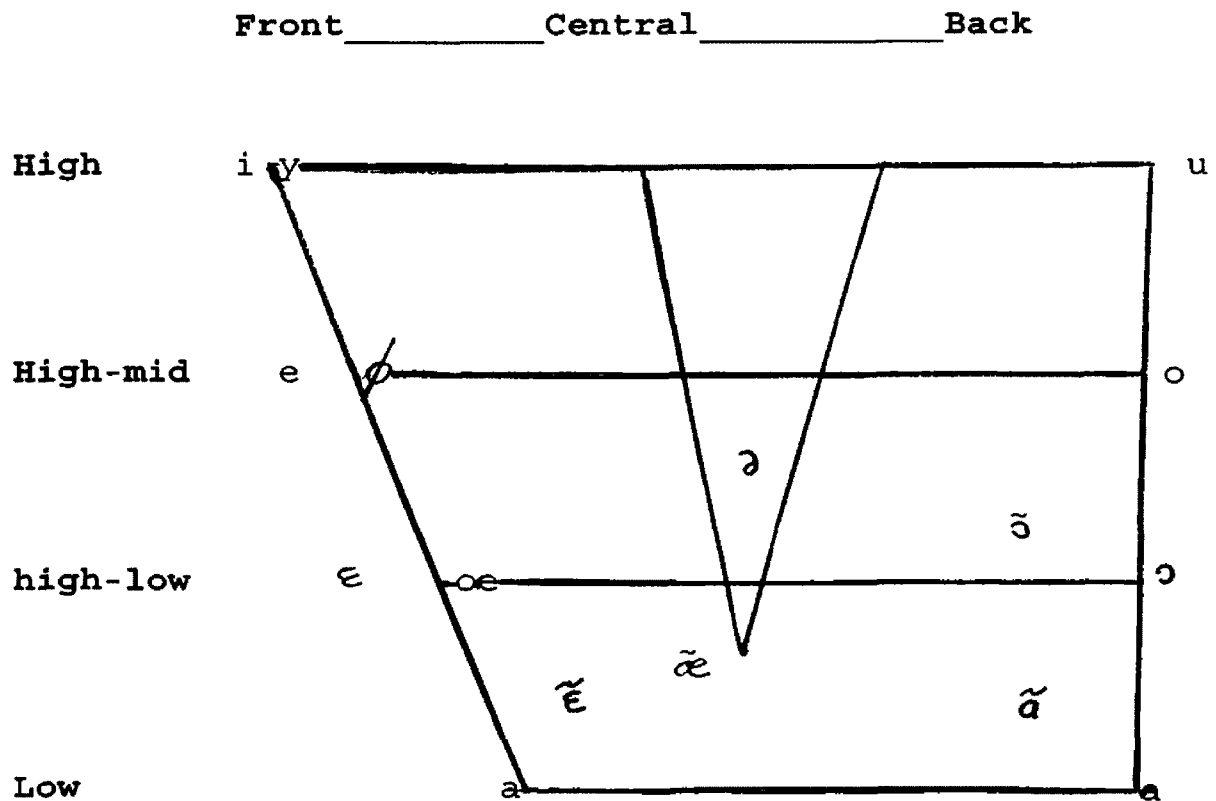
### 1.1.1.DESCRPTION OF FRENCH VOWELS

Today 37 phonemes (smallest units of sound able to differentiate meaning between two words) are found in standard French, of which 18 are consonants, 16 are vowels and three are glides (Battye and Hintze 58-70). French vowels are divided into two groups: **FRONT VOWELS** and **BACK VOWELS**.

Although French orthography corresponded to its phonemic system once, due to changes over time, modern French orthography does not account very well for the phonemic inventory of the language. The **phoneme/grapheme** correlation which existed in the 12th century is no longer valid in modern French.

The French alphabet consists of 26 letters which generally provide clues for the grammatical relationships between parts of the utterance or sentence. French orthography is more concerned with indicating etymologies, grammatical relationships and semantic interpretations than with representing speech directly.

TABLE I: FRENCH VOCALIC SYSTEM



## FRONT VOWELS

French vowels can be described on the basis of the criteria mentioned above. However, there are two series of front vowels in French: spread and rounded. The spread vowels are as follows:

1. /i/ as in /il/ (il), /li/ (lit), /file/ (filet).  
/i/ is front, high, oral, and spread.
2. /e/ as in /ete/ (été), /me/ (met), /le/ (les).  
/e/ is front, high-mid, oral, and spread.



3. /ɛ/ as in /bɛl/ (belle), /mɛtR/ (mettre), /tɛt/ (tête).  
/ɛ/ is front, low-mid, oral and spread.

4. /ẽ/ as in /pẽn/ (pince), /vẽ/ (vin), /ẽvɑ̃t/ (inventer).  
/ẽ/ is front, low-mid, nasal and spread.

5. /a/ as in /ale/ (aller), /rato/ (rateau), /ma/ (ma).  
/a/ is front, low, oral and spread.

The rounded front vowels are as follows:

6. /y/ as in /yn/ (une), /sykR/ (sucre), /dy/ (du).  
/y/ is front, is high, oral and rounded.

7. /ø/ as in /nø/ (noeud), /pø/ (peu), /du.lu.Rø/ (douloureux).  
/ø/ is front, high-mid, oral, and rounded.

8. /œ/ as in /noef/ (neuf), /soel/ (seul), /pœpl/ (peuple).  
/œ/ is front, low-mid, oral and rounded.

9. /œ̃/ as in /œ̃/ (un), /brõ/ (brun), /k ɛ l k œ̃/ (quelqu'un).  
/œ̃/ is front, low-mid, nasal and rounded

#### BACK VOWELS

1. /u/ as in /tu/ (tout), /dulœR/ (douleur), /u/ (ou).  
/u/ is back, high, oral and rounded.
2. /o/ as in /oto/ (auto), /rato/ (rateau), /bo/ (beau).  
/o/ is back, high-mid, oral and rounded.
3. /ɔ/ as in /vɔg/ (vogue), /dɔg/ (dogue), /sɔl/ (sol),  
/lɔR/ (lors).

/ɔ/ is back, low-mid, oral and rounded.

4. /ɔ̃/ as in /pɛRdisjɔ̃/ (perdition), /frɔ̃/ (front), /fɔ̃/ (fond), /bɔ̃/ (bon).

/ɔ̃/ is back, low-mid, nasal and rounded.

5. /a/ as in /pal/ (pal), /pa/ (pas), /ta/ (tas).

/a/ is back, low, oral unrounded.

6. /ɑ̃/ as in /gRɑ̃/ (grand), /talɑ̃/ (talent), /bɑ̃/ (banc).

/ɑ̃/ is back, low-mid, nasal and unrounded.

7. /ə/ as in /pəti/ (petit), /paRskə/ (parce que),

/dəkwa/ (de quoi).

This vowel is known as **SCHWA**; it is generally described as a weak neutral sound. It is neither front nor back, neither low nor high, uttered in a position requiring minimum articulatory effort: hence its central position in the vowel configuration. It is also known as e-muet and has a special status in French. It is pronounced either as a full vowel or it disappears entirely from the pronunciation. It is also important to note that it cannot bear stress, except in very a limited environment. The modern French language exhibits a set of sixteen vowels. Although all vowels are generally voiced, they can be classified according to other distinctive features. Thus the nasality, degree of aperture and lip rounding or spreading distinguish French vowels.

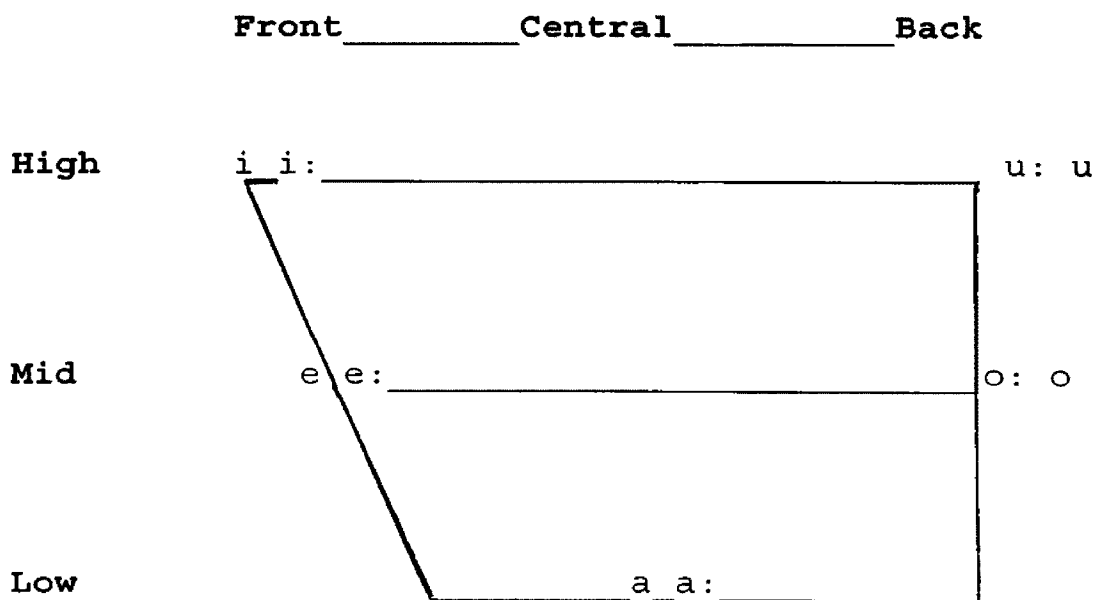
There are four nasal vowels /ɛ̃, œ̃/ which are front and /ɔ̃, ɑ̃/ which are back vowels and twelve oral vowels consisting of seven front vowels, four back and the neutral

vowel schwa /ə/. The front oral vowels consist of the spread series /i, e, ε, a/ and the rounded series /y, φ, œ/. The back oral vowels include /u, o, ɔ/ which are rounded and /ɑ/ which is the only spread French back vowel. The four major degrees of aperture also represent major distinctive features for the identification of each vowel. Thus /i, y, and u/ are all high vowels while /e, φ, o, ɔ/ are high-mid /ε, œ, ɔ, ɔ̃, œ̃, ě, ǣ/ are low-mid while /a and ɑ/ are low.

### 1.1.2. DESCRIPTION OF MANDINKA VOWELS

Mandinka has five short and five long vowels represented as follows:

TABLE II: MANDINKA VOCALIC SYSTEM



This is a classical five vocalic system that differentiates vowels in three heights (high, mid, low), and three horizontal positions (front, central, back).

#### FRONT VOWELS

Mandinka front vowels consist of /i/, /i:/, /e/, and /e:/. Each of these vowels represents an independent phoneme in the language. The language readily provides examples of minimal pairs, and I will use them as much as possible to demonstrate phonemic contrasts and describe their articulatory characteristics.

1. /i/ as in /silo/ (way) vs /selo/ (to climb), /kilo/ (egg) vs /kalo/ (stick).

These minimal pairs display the phonemic value of the vowel /i/ in Mandinka.

/i/ is oral, high, spread and short.

2. /i:/ as in /kati:/ (to fly) vs /kati/ (to cut), /si:bo/ (to dream) vs /sibo:/ (proper name for girls).

/i:/ is a front vowel, oral, high, spread and long.

(It is clear from these examples that length is phonemic in Mandinka.)

3. /e/ as in /selo/ (to climb) vs /salo/ (prayer), /bero/ (stone) vs /boro/ (run).

/e/ is front, oral, mid, spread and short.

4. /e:/ as in /se:lo/ (field) vs /selo/ (to climb), /ke:so/ (to stab someone) vs /keso/ (new).

/e:/ is front, oral, mid, spread and long.

### CENTRAL VOWELS

Mandinka central vowels consist of short /a/ and /a:/.

1. /a/ as in /dalo/ (river) vs /dolo/ (wine), /balo/ (body) vs /bulo/ (hand).

/a/ is central, oral, low, spread and short.

2. /a:/ as in /ka:no/ (red pepper) vs /kano/ (love), /fa:no/ (loincloth) vs /fano/ (breadth).

/a:/ is central, oral, low, spread and long.

### BACK VOWELS

They consist of /u/, /u:/, /o/ and /o:/.

1. /u/ as in /furo/ (carp) vs /foro/ (to say), /sulo/ (root) vs /salo/ (prayer).

/u/ is oral, high, rounded and short.

2. /u:/ as in /ku:ro/ (to wash) vs /kuro/ (group), /bu:ro/ (early weaning) vs /buro/ (duck).

/u:/ is back, oral, high, rounded and long.

3. /o/ as in /foro/ (to say) vs /furo/ (carp), /kono/ (stomach) vs /kuno/ (bird).

/o/ is back, oral, mid, rounded and short.

4. /o:/ as in /bo:ro:/ (remedy) vs /boro:/ (to run), /tulo:/ (oil) vs /tulo/ (ear).

/o:/ is back, oral, mid, rounded and long.

In sum, Mandinka exhibits a vocalic system of five vowels, of which two are front vowels ( /i/, /e/ ), one central (/a/) and two back vowels (/u/, /o/ ). Each of these vowels has a long counterpart which exists as a distinct phoneme. /i/, /i:/, /u/ and /u:/ are high while /e/, /e:/, /o/ and /o:/ are mid, and the central vowels /a/ and /a:/ are low.

### 1.2. CONSONANTS: DEFINITION

**CONSONANTS** are defined as sound units made either by a restriction in the vocal tract, or by a narrowing which is so marked that air cannot escape without producing audible friction. It is therefore relatively easy to recognize the articulation of consonants in comparison to vowels whose articulations involve the free flow of air accompanied by slight movements of the tongue and lips. Consonants are defined as the units that typically occur at the margins of syllables. They are generally described with reference to six major criteria (Crystal 155):

1. The source of the air stream - whether from the lungs (pulmonic) or from some other source (non-pulmonic).
2. The direction of the air stream - whether moving outward (**EGRESSIVE**) or inward (**INGRESSIVE**).
3. The state of vibration of the vocal folds - whether vibrating (**VOICED**) or not (**VOICELESS**).

4. The position of the velum - whether raised (ORAL) or lowered (NASAL) .
5. The place of articulation in the vocal tract: bilabial, labio-dental, dental, alveolar, post-alveolar, palatal, velar, uvular or glottal.
6. The manner of articulation: stop, fricative, nasal or liquids.

### 1.2.1. DESCRIPTION OF FRENCH CONSONANTS

TABLE III: FRENCH CONSONANT SYSTEM

<u>Manner of articulation</u>					
	Stops	Fricatives	Nasals	Liquids	Glides
<u>Place of articulation</u>					
<u>bilabial</u>	p/b		m		
<u>labiodental</u>		f/v			
<u>dental</u>	t/d	s/z	n	l	
<u>palatal</u>		ʃ/ʒ	ɲ		ɥ j
<u>velar</u>	k/g				w
<u>uvular</u>				R	

N.B: This chart is based upon Sylvie Carduner and M.Peter Hagiwara's classification of modern French consonantal system (5) .

### FRENCH STOPS

The stop consonants consist of two sets: the voiceless and voiced consonants. The voiceless stops are as follows:

1. /p/ as in /patat/ (patate), /apRɛ/ (après), /tRɔ̃p/ (tromper), /tap/ (taper).  
/p/ is pulmonic, egressive, voiceless, oral, bilabial and stop.
2. /t/ as in /titR/ (titre), /tabu/ (tabou), /batR/ (battre), /soRtiR/ (sortir), /fɔ̃t/ (fonte), /kɔ̃t/ (conte).  
/t/ is pulmonic egressive, voiceless, oral, dental, and stop.
3. /k/ as in /kaRo/ (carreau), /sakoʃ/ (sacoche), /bak/ (bac), /sak/ (sac), /mɑ̃k/ (manque).  
/k/ is pulmonic, egressive, voiceless, oral, velar and stop.

The French voiced oral stops are as follows:

4. /b/ as in /batR/ (battre), /byro/ (bureau), /taba/ (tabac), /tabu/ (tabou), /kRab/ (crabe).  
/b/ is pulmonic, egressive, voiced, oral, bilabial and stop.
5. /d/ as in /doRmiR/, /defõ/ (défunt), /Pedal/ (pédale), /Pɔ̃dR/ (pondre), /PɛRdR/ (perdre), /ɔ̃d/ (onde), /fekɔ̃d/ (féconde).



/d/ is pulmonic, egressive, voiced, oral, dental and stop.

6. /g/ as in /gaRsɔ̃/ (garçon), /gaRd/ (garde), /baɡɛt/ (baguette), /bugR/ (bougre), /mɑ̃ɡ/ (mange).  
/g/ is pulmonic, egressive, voiced, oral, velar and stop.

#### FRENCH FRICATIVE CONSONANTS

Fricatives can also be classified according to the voiceless/voiced distinctive feature. Thereby French voiceless fricative consonants can be described as follows:

1. /f/ as in /filɛ/ (filet), /fi:j/ (fille), /afRɔ̃te/ (affronter), /kɔ̃fɔ̃dR/ (confondre), /kɔ̃fR/ (coffre), /ɔ̃fR/ (offre).

/f/ is pulmonic, egressive, voiceless, oral, labio-dental and fricative.

2. /s/ as in /savɑ̃/ (savant), /seRemoni/ (cérémonie), /kase/ (casser), /bese/ (baisser), /tas/ (tasse), /fɛs/ (fesse).

/s/ is pulmonic, egressive, voiceless, oral, dental and fricative.

3. /ʃ/ as in /ʃaRʒ/ (charge), /ʃɛRʃe/ (chercher), /deʃaRʒ/ (décharge), /Rɔ̃ʃɛRʃ/ (recherche).

/ʃ/ is pulmonic, egressive, voiceless, oral, palatal and fricative.

French voiced fricative consonants are described as follows:

1. /v/ as in /v<sup>~</sup>adR/ (vendre), /vibRe/ (vibrer), /tav Rn/ (taverne), /bavaR/ (bavard), /bRav/ (brave), /gRav/ (grave).

/v/ is pulmonic, egressive, voiced, oral, labio-dental and fricative.

2. /z/ as in /zebR/ (zèbre), /zigzag/ (zigzag), /leze/ (léser), /ez/ (aise), /lez<sup>~</sup>af<sup>~</sup>/ (les enfants).

/z/ is pulmonic, egressive, voiced, oral, dental, and fricative.

3. /ʒ/ as in /ʒ<sup>~</sup>āR/ (genre), /ʒyRe/ (jurer), /ʒyʒ/ (juge), /kuRʒ/ (courage).

/ʒ/ is pulmonic, egressive, voiced, oral, palatal and fricative.

#### FRENCH NASAL CONSONANTS

1. /m/ as in /mɛR/ (mer), /mat<sup>~</sup>ɛ/ (matin), /m<sup>~</sup>ɛ/ (main), /demaR<sup>~</sup>/ (démarche), /lim/ (lime).

/m/ is pulmonic, egressive, voiced, nasal, bilabial and stop.

2. /n/ as in /nɔbl/ (noble), /netwaje/ (nettoyer), /tuRnwa/ (tournoi), /ʃɛ:n/ (chaîne), /pɛn/ (peine).

/n/ is pulmonic, egressive, voiced, nasal, dental and stop.

3. /ɲ/ as in /gaɲe/ (gagner), /beɲɛ/ (beignet), /peɲe/ (peigner), /seɲe/ (saigner), /peɲ/ (peigne).

/p/ is pulmonic, egressive, voiced, nasal, palatal and stop.

### FRENCH LIQUIDS AND GLIDES

From a phonological point of view, since liquids and glides occur at the margins of syllables, they must be considered as consonants. But from a phonetic point of view, they are articulated without audible friction, and acoustically they display a similar energy pattern to that displayed by vowels. Thus the terms SEMI-VOWELS OR SEMI-CONSONANTS have been often used to describe /w, j, ɥ/. French liquids consist of the LATERAL /l/ which involves a partial closure of the mouth and the air stream escapes around the sides of the tongue, and the two major allophones of the phoneme /R/, the voiced uvular vibrant, and the voiceless velar fricative.

1. /l/ as in /la/ (la), /livR/ (livre), /deliR/ (délire), /balɛ/ (balet), /bɛl/ (belle), /kɛl/ (quel).  
/l/ is pulmonic, egressive, voiced, oral, lateral and dental.

2. Voiced /R/ as in /Rim/ (rime), /Ra/ (rat), /Ram/ (rame), /Ri/ (rit), /Rut/ (route), /Raze/ (raser), /paRi/ (Paris), /vɑ̃dR/ (vendre).  
/R/ is pulmonic, egressive, voiced, oral, vibrant and uvular.

Voiceless /R/ as in /mɛtR/ (mettre), /batR/ (battre), /tRɛ/ (très), /fRwa/ (froid), /sykR/ (sucre).

/R/ is pulmonic, egressive, voiceless, oral, velar and fricative.

3. /w/ as in /wiski/ (whisky), /w kman/ (walkman), /wal~/ (wallon), /netwaje/ (nettoyer).

/w/ is pulmonic, egressive, voiced, oral, rounded and velar.

4. /ɥ/ as in /lɥi/ (lui), /ɥit/ (huit), /ɥil/ (huile), /sɥi/ (suit).

/ɥ/ is pulmonic, egressive, voiced, oral, rounded, and palatal.

5. /j/ as in /yɛn/ (yen), /joga/ (yoga), /jœ/ (yeux), /œj/ (oeil), /bjɛ̃/ (bien).

/j/ is pulmonic, egressive, voiced, oral, spread and palatal.

In sum, French comprises eighteen consonants classified according to their manner of articulation. The French consonant system exhibits a set of six oral stops of which three are voiced /b,d,g/ and three are voiceless /p,t,k/. Beside the stops, there are six fricatives of which three are voiceless /f,s,ʃ/ and three are voiced /v,z,ʒ/. There are three nasal stops in French (/m,n,ɲ/). /ŋ/ exists in French in many words borrowed from English such as in /riŋ/ (ring) and /swiŋ/ (swing). There are two liquids /l,R/. French also comprises three glides /w,ɥ,j/ which share both consonantal and vocalic articulatory characteristics. Unlike vowels, glides occur in consonantal positions in words. However,

they do not have identical distribution. /j/ can occur in French in word-initial, medial and final position whereas /w,ɥ/ cannot. Thus, /w/ can occur in word-initial and medial position but never in word-final position. Similarly, /ɥ/ can occur in word-initial and medial but not in syllable final position.

### 1.2.2. DESCRIPTION OF MANDINKA CONSONANTS

TABLE IV: MANDINKA CONSONANT SYSTEM

#### Manner of Articulation

	Stops	Affricates	Fricatives	Nasals	Liquids	Glides
<u>Place of articulation</u>						
<u>Bilabial</u>	p/b			m		
<u>Labiodental</u>			f			
<u>Alveolar</u>	t/d		s	n	, l	
					r	
<u>Palatal</u>		c/J		ɲ		j
<u>Velar</u>	k			ŋ		w
<u>Glottal</u>			h			

#### MANDINKA STOPS AND AFFRICATES

Mandinka as spoken in Sénégal comprises two sets of stop consonants: voiceless and voiced stops. The voiceless oral stops are as follows:

1. /p/ as in /pata:to/ (potatoes), /pura/ (pigeon),  
/pa:pija:/ (papaya), /kumpo/ (a type of dance).  
/p/ is pulmonic, egressive, voiceless, oral, bilabial and stop.

It is important to note that this consonant does not exist in the neighboring variety spoken in Guinea Bissau.

2. /t/ as in /tulo/ (ear), /tuno/ (termitarium), /su:to/ (night), /kuto/ (new), /kati:/ (to fly).  
/t/ is pulmonic, egressive, voiceless, oral, alveolar and stop.

3. /k/ as in /kuno/ (head), /kakali/ (to swear), /tiko/ (scarf), /hako/ (guilt), /Jiko/ (habit).  
/k/ is a pulmonic consonant, egressive, voiceless, oral, velar and stop.

The voiced oral stops are as follows:

4. /b/ as /bulo/ (hand), /bino/ (horn), /kabo/ (bottle), /Jabo/ (onion), /subo/ (meat), /saba/ (three).  
/b/ is pulmonic, egressive, voiced, oral, bilabial and stop.
5. /d/ as in /da:/ mouth, /dafato/ (heel), /dada:/ (to fix), /ka:di/ (to give to somebody), /kadi:/ (girl's name).  
/d/ is pulmonic, egressive, voiced, oral, alveolar and stop.

The affricates are realized as follows in the language:

6. /c/ as in /ca:bo/ (key), /ca:lo/ (sardine), /kaca:/ (to discuss), /kuca:/ (sorrel), /na<sub>ɲ</sub>co/ (noble or aristocrat).

/c/ is pulmonic, egressive, voiceless, oral, palatal and affricate (involving a little stop and a little friction).

7. /J/ as in /Jabo/ (onion), /Julo/ (rope), /ka:Jele/ (to laugh at somebody), /Ja:/ (dry), /ka:Jani/ (to burn).

/J/ is pulmonic, egressive, voiced, oral, palatal and affricate.

#### MANDINKA FRICATIVES AND NASALS

Mandinka has only two fricatives of its own (/f/, /s/). However, the borrowed consonant /h/ which occurs in the language, comes from Arabic. The language has four nasal consonants: /m/, /n/, /ɲ/ and /ŋ/. The fricatives are realized as follows in the language:

1. /f/ as in /falo/ (stick or donkey), /fa:ta/ (dead), /ka:fa:/ (to kill somebody), /kafo/ (crowd), /nafa:/ (importance).

/f/ is pulmonic, egressive, voiceless, oral, labio-dental and fricative.

2. /s/ as in /sa:/ (snake), /sa:sa:/ (sickness), /kasi:/ (to sit down), /keso/ (new), /kaso/ (jail), /muso/ (woman).

/s/ is pulmonic, egressive, voiceless, oral, alveolar and fricative.

3. /h/ as in /harafo/ (letter), /harJo/ (luck), /hormo/ (respect), /ta:he:/ (mongoose), /daha:/ (to rest).

/h/ is pulmonic, egressive, voiceless, oral, glottal and fricative.

Mandinka nasal vowels are realized as follows:

4. /m/ as in /ma:no/ (rice), /malo/ (shame), /kumo/ (word), /Jumo/ (mosque), /sama:/ (rain), /ba:ma:/ (mother).

/m/ is pulmonic, egressive, voiced, nasal, bilabial and stop.

5. /n/ as in /na:fo/ (hat), /ninso/ (cow), /kino/ (meal), /kuno/ (bird), /ka:no/ (red pepper), /keno/ (peak).

/n/ is pulmonic, egressive, voiced, nasal, alveolar and stop.

6. /ɲ/ as in /ɲa:mo/ (grass), /ɲa:to/ (before), /ka:ɲa/ (enough), /tiɲa:/ (destroy), /keɲo/ (sand).

/ɲ/ is pulmonic, egressive, voiced, nasal, palatal and stop.

7. /ŋ/ as in /ŋapa:/ (to show off), /ŋararo:/ (to rake), /ŋo:riŋo/ (nail), /dindiŋo/ (the child), /tuŋo/ (termitarium).

/ŋ/ is pulmonic, egressive, voiced, nasal, velar and stop.

#### MANDINKA LIQUIDS AND GLIDES

Mandinka liquids are as follows:

1. /l/ as in /lijo/ (honey), /luŋo/ (day), /salo/ (prayer), /kalo/ (stick), /malo/ (shame), /folo/ (first).



/l/ is pulmonic, egressive, voiced, oral, lateral and alveolar.

2. /r/ as in /rako/ (movement in a prayer), /ruko/ (corner), /raso/ (zigzag), /karo/ (moon), /kuro/ (group).  
/r/ is pulmonic, egressive, voiced, oral, vibrant and alveolar.

Mandinka glides (semi-vowels) are as follows:

3. /w/ as in /waro/ (breadth), /wulo/ (dog), /kewo/ (man), /sewo/ (pig), /jiwo/ (water), /buwa:ja:/ (witchcraft).  
/w/ is pulmonic, egressive, voiced, oral, rounded and velar.
4. /j/ as in /jelo/ (blood), /ja:ja/ (name of a man), /kaya/ (hernia), /sa:ja:/ (death or mourning).  
/j/ is pulmonic, egressive, voiced, oral, spread and palatal.

In sum, Mandinka as spoken in Sénégal comprises eighteen consonant sounds which are classified according to their point and manner of articulation. Mandinka exhibits a consonantal system of five oral stops of which two are voiced /b,d/ and three are voiceless /p,t,k/. There are three voiceless fricatives (/f/, /s/, /h/) and two affricates /c/ voiceless and /J/ voiced. The language includes four nasal stops /m,n,ɲ,ŋ/ and two liquids /l,r/. Mandinka also comprises two glides /w,j/ which share both consonantal and vocalic distinctive features. However, unlike vowels, Mandinka glides occur only as syllable onset. It is important to note that no other

consonant but the voiced nasal stop /ŋ/ is accepted in word-final position in Mandinka. In other words, all other consonants have a **DEFECTIVE DISTRIBUTION** in word-final position.

### 1.3. SUPRASEGMENTAL PHONOLOGY OF FRENCH AND MANDINKA

It is given that an utterance consists not only of sound segments such as vowels, consonants and glides, but also of other speech characteristics that participate in conveying a message. The variations in loudness or melody superimposed on the sequence of sounds play a prominent function in human languages in general. In this study, the umbrella term suprasegmentals (prosodic features) refers to two basic elements: **STRESS** and **PITCH**.

Stress can be defined as the articulatory energy put on a syllable. In other words stress can be perceived as the extra prominence of a particular syllable as a result of more breath force to produce a louder sound (Battye and Hintze 141).

As to pitch, it can be defined as the frequency of vibration of the vocal cords which varies according to their tension and the force of the air stream, and determines the pitch of the voice which is in constant fluctuation as one speaks (143). Both stress and pitch are as much a part of language as individual sound segments.

### 1.3.1. FRENCH GRAMMATICAL STRESS

French exhibits two types of stress. **GRAMMATICAL STRESS** and **EMPHATIC OR LEXICAL STRESS**.

Grammatical stress is used to mark the boundaries of words or sense-groups (breaks or pauses in an utterance) and the speaker has no choice about which syllable to stress. This stress will fall on the final syllable if the utterance consists of a single sense-group. If the utterance consists of several sense-groups, the stress will fall on the final syllable of the final group displaying a break in syntax. Thus each syntactic boundary is marked by a stress. Hence this type of stress is predictable in French and it automatically occurs on the last syllable of the sense-group or phonemic phrase (Valdman 82). Subsequently, word-stress is fixed according to an invariable rule, no matter how many syllables make up the word. This can be illustrated by the following examples:

Example 1: stress in monosyllabic words

/"mãʒ/	(mange)
/"pã/	(pend)
/"do/	(dos)
/"sak/	(sac)

Example 2: Stress in polysyllabic words

/me."z <sup>3</sup> /	(maison)
/de."p <sup>3</sup> /	(dépend)
/de.p <sup>3</sup> ."d <sup>3</sup> /	(dépendant)

Example 3: Stress in a single sense-group

/i.le."fu/	(Il est fou)
/se.ty.no."to/	(C'est une auto)
/se.tœ.n <sup>3</sup> .be."sil/	(C'est un imbécile)
/ <sup>3</sup> .de.p <sup>3</sup> .da.m <sup>3</sup> .d <sup>3</sup> ."mwa/	(indépendamment de moi)

Example 4: Stress in an utterance with several sense-groups

/sɛt.me.z <sup>3</sup> ."nwa:R / e.tRe."bɛl/	(Cette maison noire est très belle.)
/su."v <sup>3</sup> / l <sup>3</sup> ."f <sup>3</sup> / va."Ri/	(Souvent l'enfant varie)
/sɛt."ɔm/ d <sup>3</sup> .ty."paRl / "m <sup>3</sup> ʒ /	(Cet homme dont tu parles mange.)

### 1.3.2. FRENCH EMPHATIC STRESS

The basic function of emphatic stress is to underscore a word. It can be viewed as a phonetic underlining of a word (Battye and Hintze 142). This stress will generally fall on syllables that would not normally bear stress so as to highlight the item in question. This type of stress depends

on the attitude of the speaker, in opposition to the invariable grammatical stress. It is more perceptible in French than grammatical stress, both because it is stronger and because of its different placement.

Example:

/ "ka.Re.m <sup>q̃</sup> .fu/	(carrément fou!)
/se."ti.nak.sɛp.tabl/	(C'est inacceptable!)
/kɛ."l <sup>ẽ</sup> .b:e.sil/	(Quel imbécile!)
/se.ne.pa."yn.fij/se."la.fij/	
(Ce n'est une fille, c'est la fille.)	
/fɛRm.la."fə.netR/	(Ferme la fenêtre!)

### 1.3.3. MANDINKA GRAMMATICAL STRESS

Similarly to French, Mandinka distinguishes two types of stress: grammatical and emphatic. Grammatical stress is predictable in the language as it always falls on the first syllable of both monosyllabic and polysyllabic words. It also falls on the first syllable of a sense-group, and thus its occurrence displays the beginning of a new sense-group.

### Example 1: Stress in monosyllabic and polysyllabic words

/"si:/	(to sit down)
/"Je:/	(there)
/"sa:/	(snake)
/"lo/	(to stand)
/"ku:/	(something)
/"i.ta:/	(yours)
/"ke.lo/	(fight)
/"a.te/	(him or her)
/"ko.no/	(stomach)
/"ku.no/	(bird)
/"kam.ba:.no/	(boy)
/"su.mu.na:/	(urinate)
/"fam.fe.lan.da.ŋo/	(mirror)
/"dun.tu.ma.la.ŋo/	(ant)

### Example 2: Stress in single sense-groups

/"a.fa.ma:.le.ja:.ki.li/
(He is called by his father.)
/"sa:.ma.mu.ta.la:.to.le.ti/
(Tomorrow is Tuesday.)
/"ŋiŋ.din.di.ŋo.ŋi:.ŋa:.ta.ba:.ke/
(This kid is pretty.)
/"a.do:.ma:.fa:.ta/
(His or her brother is dead.)

Example 3: Stress in several sense-groups

/"ku.nuŋ / "ŋa.mu.sa.Je.le:/

(Yesterday, I saw Musa.)

/"se.ruŋ / "sa.ma:.si.ja:.ta.nuŋ/

(Last year, there was lot of rain.)

/"Jan.di.ja:.ta. / "ba.ri.Je:.man.di.ja:/

(This place is pleasant **BUT** the other is not.)

/"ma:.Je / "ka.bi.riŋ / "ku.nuŋ/

(I have not seen him or her since yesterday.)

#### 1.3.4. MANDINKA EMPHATIC STRESS

Similarly to the function of French emphatic stress, this type of stress is used to insist on a word. Its use is variable not fixed, and depends solely on the intention of the speaker.

Example 1:

/ma:.fo.i.te.ŋko."A.te/

(I am not talking to you, I am talking to **HIM**.)

/ŋiŋ.man.di.ja:."wo.do:.le.ja:.ba.ji./

(This is not tasty, the **OTHER** is better.)

/i.man.ŋiŋ.loŋ.a.te."FAŋ.le.ja:.ke/

(You don't know this man, he **HIMSELF** did it.)

/pi.mu.bu.wa:."BA:le.ti/

(This man is **BIG** sorcery.)

### 1.3.5. FRENCH PITCH PATTERNS

Modern standard French has two basic pitch patterns: a descending and a rising pitch.

The descending pitch pattern is generally used to suggest that a speaker's utterance is clear and complete. It is used in direct statements of facts and in orders or commands. It is also used in French questions beginning with interrogative words such as: **COMMENT, QUAND, OÙ, QUI, QUE, POURQUOI** (Battye and Hintze 144).

In a statement, the last syllable of the sense-group will be on low pitch, falling below the normal speaking range, showing that the message is complete. The following examples illustrate the explanation above.

Example: **statement of fact**

Musa est gravement malade. (Musa is seriously sick.)

Cette maison est très belle. (This house is very pretty.)

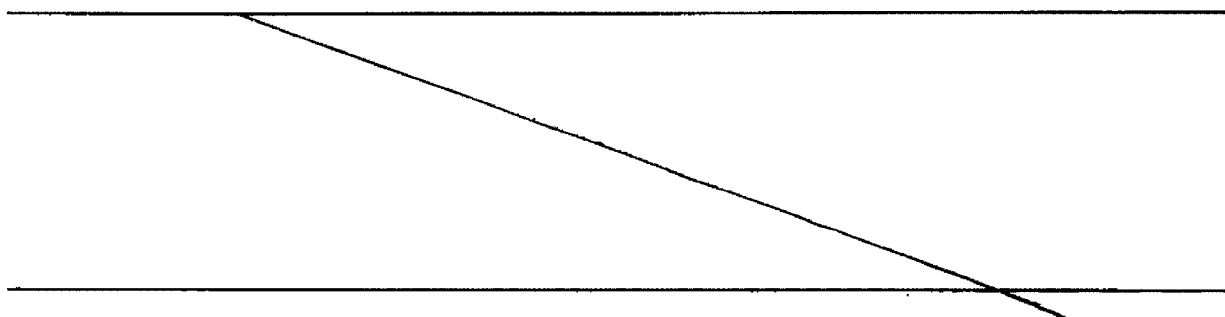
Ma voiture est en panne depuis hier.

(My car has been broken down since yesterday)

Cette fille n'est pas Anna. (This girl is not Anna.)

The following descending line represents French pitch pattern in statements of fact.





As for questions, orders and exclamatory sentences, the first syllable will start on a note which is slightly above the normal speaking range (144).

For example:

### **Questions**

OÙ est-ce que tu habites? (Where do you live?)

COMMENT vas-tu? (How are you?)

QUAND est-ce que tu iras en France?

(When will you go to France?)

POURQUOI pleure-t-il? (Why is he crying?)

### **Orders**

Tais-toi! (Shut up!)

Ferme-la! (Close it!)

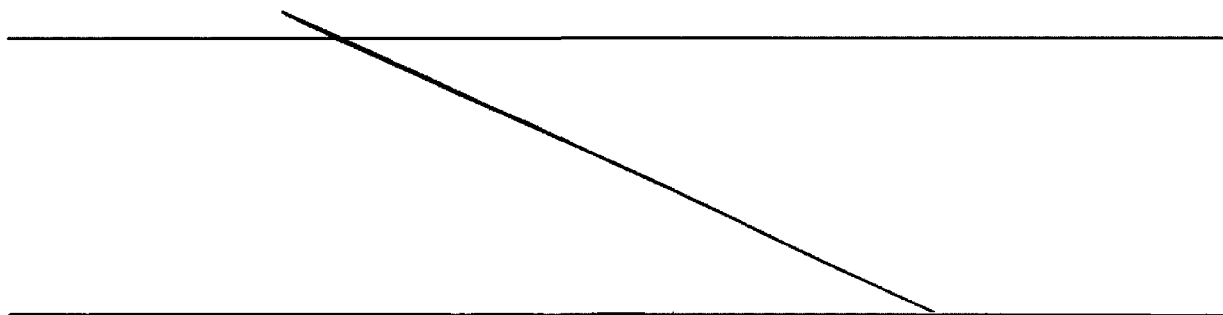
Ouvre la porte! (Open it!)

Sort de ma chambre! (Leave my room!)

**Exclamation sentences**

Quelle belle voiture!	(What a nice car!)
Que cette fille est belle!	(What a pretty girl!)
Quelle belle journée!	(What a nice day!)
Que cet enfant est intelligent!	(What an intelligent kid!)

The following pattern represents the French descending pitch used in the questions above, in orders and in exclamatory sentences.

**FRENCH RISING PITCH**

In modern French, the rising pitch pattern may suggest that an utterance is incomplete i.e, the speaker may hesitate or wait for some response from the listener. Thus, it may display the enunciator's doubt or incredulity. It is also used for questions whose normal answer would be **yes** or **no** and those which grammatically are in the form of statements.

For Example:

**Incomplete utterance**

Je voudrais dire que... (I would like to say that...)

Je ne mange pas de... (I do not eat ...)

Il est vraiment... (He is really...)

Vous avez beaucoup... (You have lot of ...)

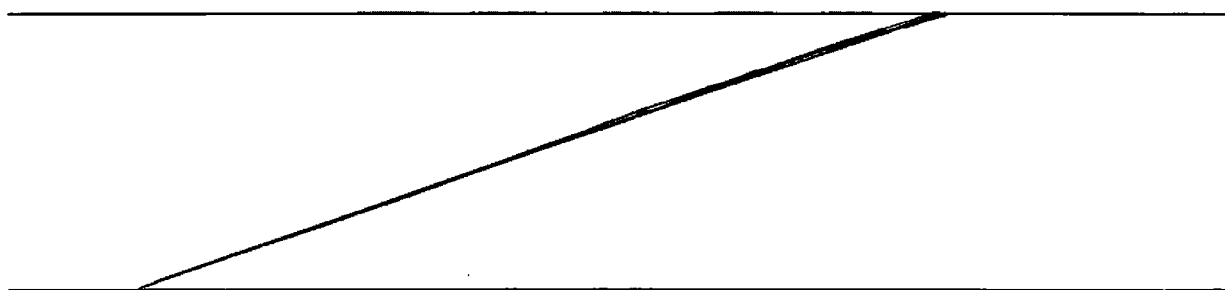
**Questions requiring yes or no answers**

Est-ce que John est bien portant? (Is John healthy?)

Est-ce que tu aimes le foot-ball? (Do you like foot-ball?)

Est-ce que tu manges du porc? (Do you eat pork?)

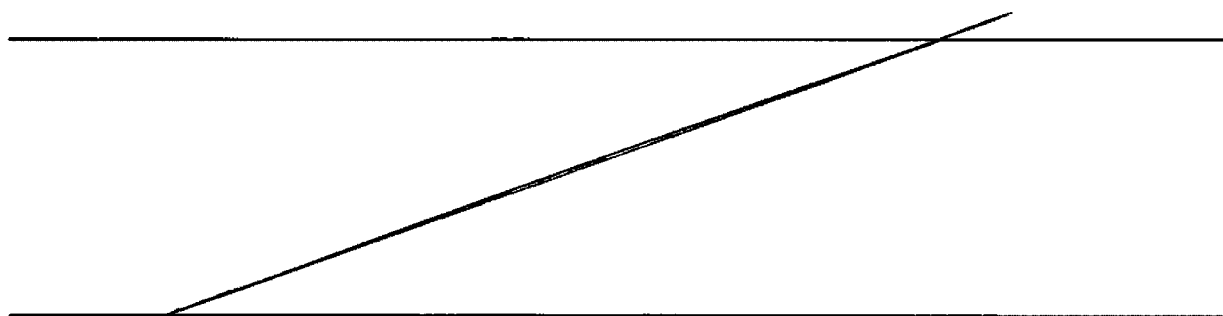
The following pattern represents the rising pitch of incomplete utterances and questions whose answers would be "YES" or "NO".



As for the French questions which are in the form of statements, the last syllable of the sense-group will be on high pitch, slightly above the normal speaking range.

For example:

Tu bois du vin?	(You drink wine?)
Il est Sénégalais?	(He is Senegalese?)
Elle mange du pork?	(She eats pork?)
Il fait du ski?	(He does ski?)



#### FRENCH RISING-FALLING PITCH

This type of pitch is generally used when the utterance consists of several sense-groups (Battye and Hintze 145).

For example:

L'enfant a pleuré / toute la nuit.

(The child has cried / all night long.)

Cet homme qui dort / est mon professeur d'histoire.

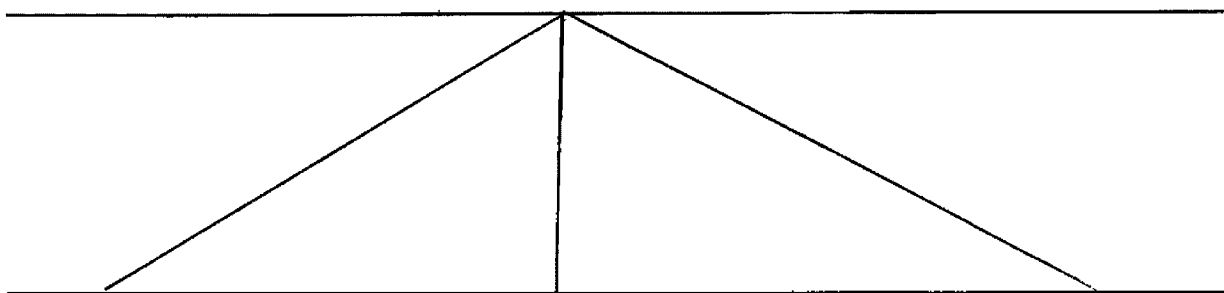
(This man who is sleeping / is my history teacher.)

Demain / j'irai au cinéma.

(Tomorrow / I will go to the movies.)

Ce chien a aboyé / toute la journée.

(The dog has barked / all day long.)



It is important to note that when there is a succession of rising pitch patterns, the first syllable of each group will start on a slightly higher pitch than the previous one until the upper limit on the range is reached (Battye and Hintze 146).

For example:

Le chien de/ Ben Birkley / a encore aboyé / toute la nuit.

(Ben Birkley's dog has again barked all night long.)

Mon ami / l'Américain / est déjà venu/ me rendre visite.

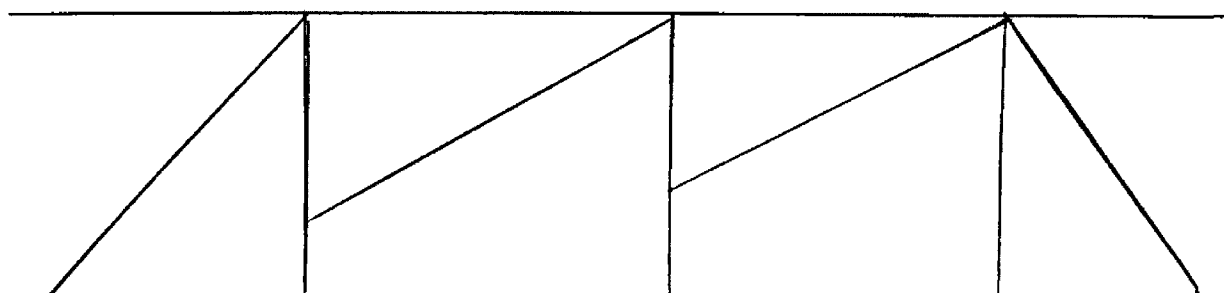
(My friend, the American, has already come to visit me.)

L'enfant de /notre voisin / a encore pleuré / toute la nuit.

(Our neighbor's child has again cried all night long.)

La voiture de / mon cousin / a aussi heurté / un arbre.

(My cousin's car has also hit a tree.)



### FRENCH LEVEL PITCH

This kind of pitch pattern is mainly used in French when an additional piece of information outside the main statement is presented (146).

Example:

L'enfant / dont la mère est morte / pleure toujours.

(The child whose mother is dead, is always crying.)

L'homme / que la voiture a heurté / n'est pas mort.

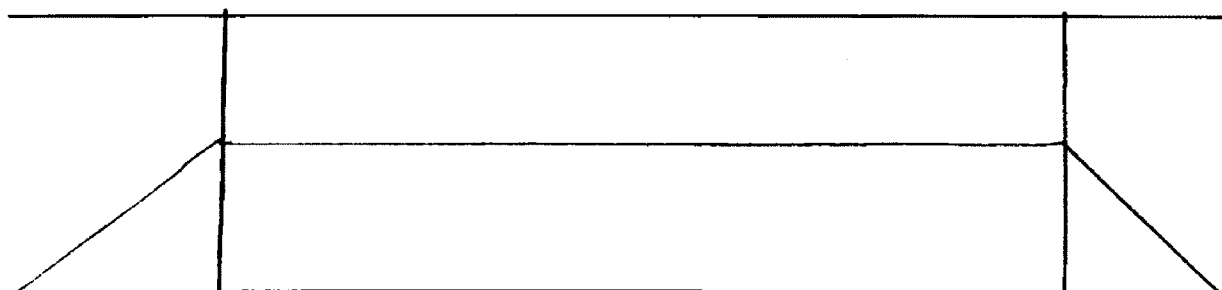
(The man who was hit by the car is not dead.)

La fille / dont je parle / est tout à fait blonde.

(The girl I am talking about is completely blond.)

Le cheval / dont le pied est cassé/ est le mien.

(The horse whose leg is broken is mine.)



### 1.3.6. MANDINKA PITCH PATTERNS

Mandinka exhibits two basic pitch patterns like French: a descending and a rising pitch.

Similarly to French, Mandinka descending pitch pattern suggests that an utterance is complete. It is used in direct statements, in orders and with interrogative questions starting with : Jumaa (who), lunJumaa (when), muneyaatina (why), munto (where).

Example: **Statement of fact**

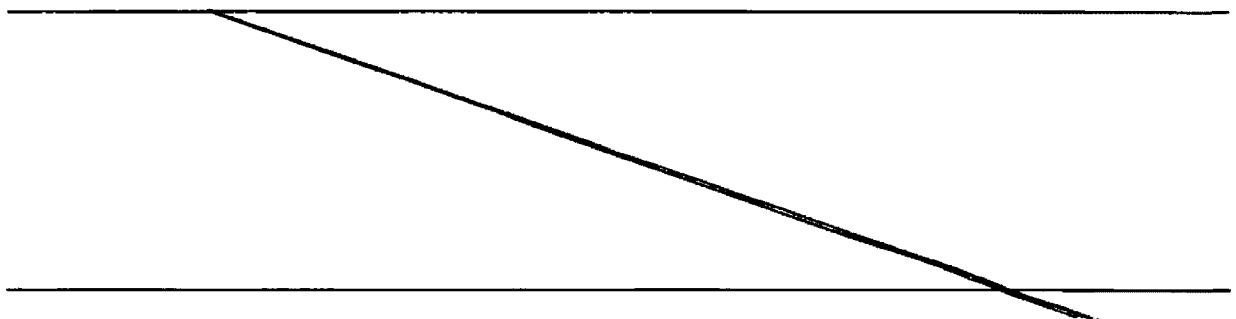
Dindin<sub>o</sub> la faamaa naata. (The child's father has come.)

pin<sub>o</sub> kambaano mu sun<sub>o</sub> leti. (This boy is a robber.)

Falu la bu<sub>o</sub> boyita seru<sub>o</sub>. (Falu's room fell down last year.)

A faamaa mu tubaabooleti. (His or her father is white.)

The following pattern represents the descending pitch of statements of fact in Mandinka.



Questions

- JUMAA leyaa taa nun? (Who took it?)  
 LUN<sup>~</sup>JUMAA le Bala faata? (When did Bala die?)  
 MUNEYAATINA a faamaa yaa buute? (Why did his father beat him?)  
 MUNTO loŋ Bala la bunooti? (Where is Bala's room?)

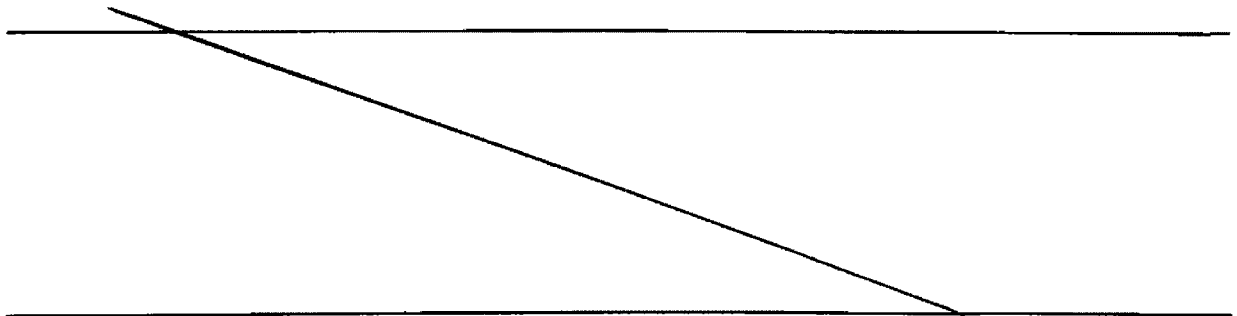
Orders

- Ila moyi! (Listen!)  
 Dindiŋo bula! (Let the kid alone!)  
 Kodoo dina! (Give me the money!)  
 Bundaa yele! (Open the door!)

Exclamation sentences

- BARI Faatu le piipaata! (What a pretty girl is Faatu!)  
 BARI piŋ kewo le Janjaata! (What a tall man is this fellow!)  
 BARI piŋ dindiŋo le kulubaliyaata! (What an impolite kid!)  
 BARI piŋ kewo leye kodoo soto!  
 (What a rich man this fellow is!)

The following pattern represents the descending Mandinka pitch used in some questions, orders and exclamatory sentences.





### MANDINKA RISING PITCH

The Mandinka rising intonation pattern can suggest, like the French one, that an utterance is incomplete; it is also used with **YES** or **NO** questions or with questions whose form is that of a statement.

Example:

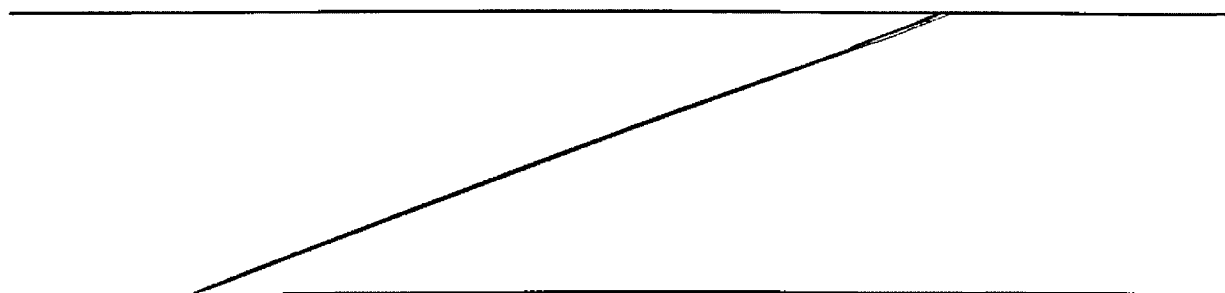
#### Incomplete sentences

Nte lafita ka...	(I want to...)
Musa manj...	(Musa does not...)
A faamaa leyaa...	(His father does...)
Ako peko ite ...	(He said that I...)

#### Questions requiring yes or no

Ye kodo soto lee?	(Do you have some money?)
Ye wo muso Jele?	(Did you see that woman?)
Fo ibe taala saama Dakar?	(Will you go to Dakar tomorrow?)
Yaa Jele?	(Did you see him or her?)

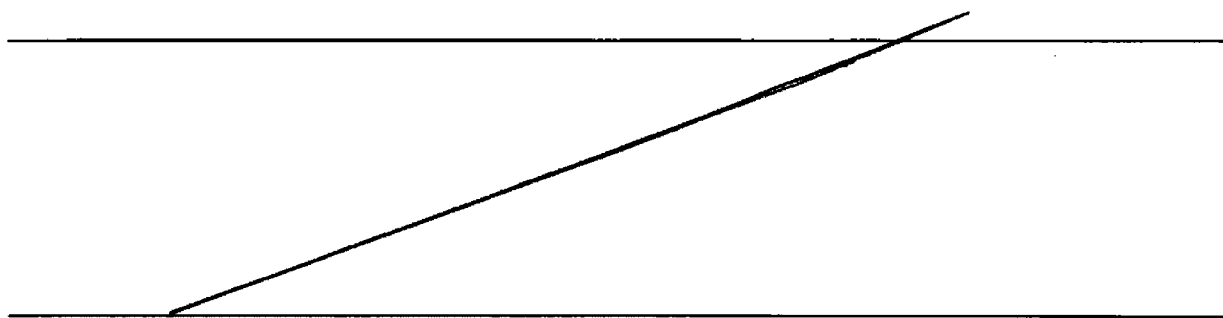
The following pattern represents Mandinka rising pitch used with incomplete sentences and questions requiring **YES** or **NO**.



**Questions in a form of a statement**

A faamaa leyaa faa?	(His father killed him or her?)
Ate leyaa taa nuŋ?	(He took it?)
Musa mu suŋo leti?	(Musa is a robber?)
Galasi be Amerika?	(Galasi is in the United-States?)

For this type of sentence, the last syllable of the sense-group is slightly above the normal speaking range.



**MANDINKA RISING-FALLING PITCH**

Examples:

ŋiŋ dindiŋo kumboota / suutoo beela.

(This child cried all night long.)

A faamaa yaa buutee le / kunuŋ somondaa.

(He or she was beaten by his or father yesterday morning.)

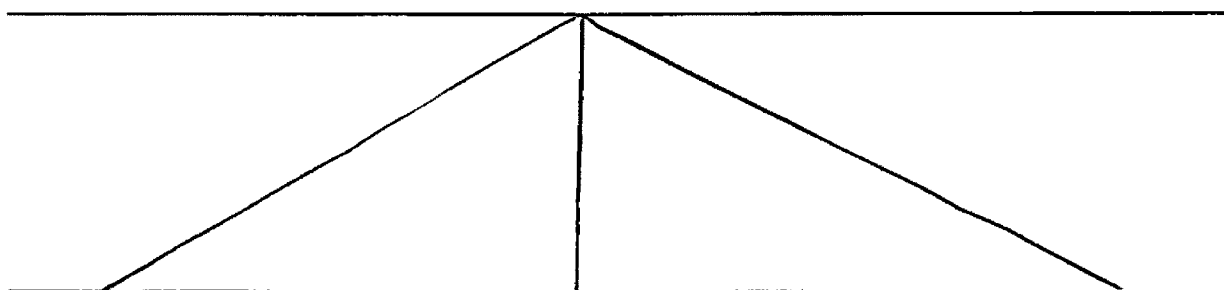
Musa la wulo wurita / suutoo beela.

(Musa's dog has barked all night long.)

A diŋo kumboota / kunuŋ beela.

(His or her child cried all day long.)

These utterances consist of two sense-groups involving a rising and a falling pitch and can be represented as follows:



#### MANDINKA LEVEL PITCH

This pitch pattern suggests in Mandinka that supplementary information is added in the message. It is often presented on a level pitch starting from the end of the previous intonation contour similarly to French.

Example:

A doomaa / mumbe Sikicoor nuŋ / taata Amerika.

(His brother who was in Ziguinchor went to the States.)

Wo wulo / muŋ kawuri luŋooluŋ / faata.

(The dog that used to bark everyday is dead.)

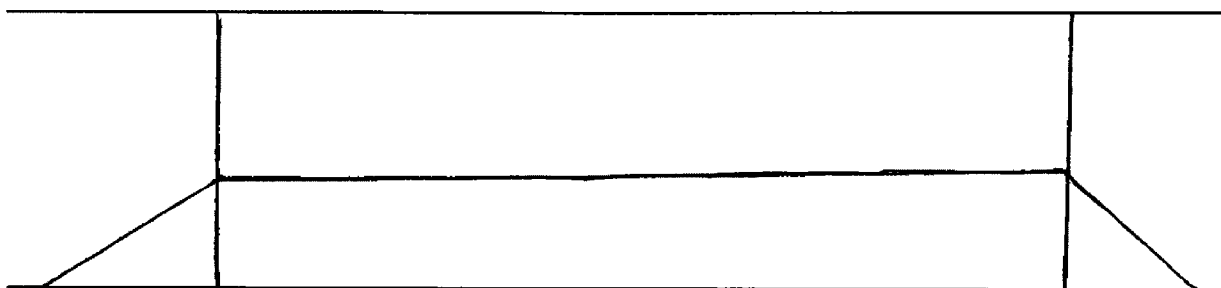
Ntoomaa/ karamoo baa la diŋo / naata Jan.

(My namesake, the son of the big master came here.)

Wo doŋkilo / aka muŋ karaŋ nuŋ / diyaata baake.

(The song he was studying is very good.)

The following pattern represents the realization of the level pitch in Mandinka.



## CHAPTER II

### CONTRASTIVE ANALYSIS OF FRENCH AND MANDINKA

In this chapter, I will compare the sound units of both languages focussing on their different distinctive feature which may cause problems for learners.

#### 2.1. VOCALIC SYSTEMS

For methodological purposes, I use the sign (+) in the following chart to refer to a French vowel and (-) to refer to a Mandinka vowel.

##### INVENTORY OF FRENCH VOWELS:

/+i/, /+y/, /+e/, /+ø/, /+ɛ/, /+œ/, /+oe/, /+ẽ/, /+a/, /+ɑ/, /+ã/,  
/+ẽ/, /+õ/, /+o/, /+u/ and /+ə/.

##### INVENTORY OF MANDINKA VOWELS:

/-i/, /-i:/, /-e/, /-e:/, /-a/, /-a:/, /-o/, /-o:/, /-u/ and /-u:/.



Given that Mandinka has neither **FRONT ROUNDED VOWELS** nor **NASAL VOWELS**, it is obvious that these sound units may constitute problems for Mandinka native speakers studying French.

As for the French front low spread vowel /a/, it may not cause tremendous problems for Mandinka speakers, because it already exists in their vocalic system where it is realized as a central vowel. Similarly, French speakers will not have major problems in articulating the Mandinka central /a/, since they already have it in their vowel inventory as a front vowel.

However, to approximate the standard pronunciation of both languages, learners may be shown the distinctive feature that differentiates both vowels i.e, the French /a/ is front, low and spread while the Mandinka /a/ is central, low and spread.

#### **THE CENTRAL VOWEL /ə/**

This French vowel will cause major problems for Mandinka speakers learning French because of its special status in standard French. As discussed earlier, this vowel also known as **E-MUET** is either pronounced as a full vowel in some contexts or it disappears entirely from the pronunciation, creating some **CONSONANT CLUSTERS** uncommon to Mandinka speakers.

Since this vowel does not exist in Mandinka, Mandinka speakers will substitute for it the neighboring vowel /e/ already present in their language. Also, they will encounter problems of articulating consonant clusters that result from

the ÉLISION of /ə/ in some environment.

### BACK VOWELS

French back vowels that may cause problems for Mandinka learners are the nasals /*ɔ̃*, *ɑ̃*/, the French mid-low rounded vowel /*ɔ*/ and the French back low spread vowel /*a*/.

Mandinka speakers studying French should be shown the distinctive features of both nasals and oral back vowels. The French /*ɔ̃* and *ɑ̃*/ should be discussed by the teacher with particular attention to their distinctive features in comparison to Mandinka vowels: the short back mid-high vowel /*o*/ and the short central low vowel /*a*/.

The short back vowels such as /*u*/ and /*o*/ will not cause problems for learners of either language as they occur as such in both languages.

## 2.2. CONSONANTAL SYSTEMS

In this section, I will also use the same signs (+, -) used with vowels in the preceding section to distinguish French consonants from those of Mandinka.

### INVENTORY OF FRENCH CONSONANTS AND GLIDES:

/+p/, /+b/, /+t/, /+d/, /+k/, /+g/, /+f/, /+v/, /+s/, /+z/,  
 /+ʃ/, /+ʒ/, /+m/, /+n/, /+ɲ/, /+ŋ/, /+l/, /+R/, /+ɥ/, /+j/, /+w/.

### INVENTORY OF MANDINKA CONSONANTS AND GLIDES:

/-p/, /-b/, /-t/, /-d/, /-k/, /-c/, /-J/, /-f/, /-s/, /-h/, /-m/, /-n/,  
 /-ɲ/, /-ŋ/, /-l/, /-r/, /-j/, /-w/.



TABLE VI: CHART OF FRENCH AND MANDINKA CONSONANTSManner of ArticulationStops Affricates Fricatives Nasals Liquids GlidesPlace of ArticulationBilabial

+p/b	+m
-p/b	-m

Labio-dental

+f/v

-f

Dental

+t/d	+s/z	+n	+l
------	------	----	----

Alveolar

-t/d	-s	-n	-r
------	----	----	----

Palatal

	+ʃ/ʒ	+ɲ	+j
-C/J		-ɲ	-j

Velar

+k/g	(+ŋ)	+ɥ +w
-k	-ŋ	-w

Uvular

+R

Glottal

-h

### STOPS

As shown by the chart of French and Mandinka consonants, both languages have two bilabial stop consonants /p/ and /b/. Both consonants are realized similarly in French and Mandinka.

However, within the stops category, the major difference between the languages is that Mandinka /t,d/ are produced at the alveolar point of articulation whereas the French /t,d/ are dental. Both Mandinka and French comprise in their consonant system the voiceless velar fricative /k/, but the French voiced velar consonant /g/ has no counterpart in the Mandinka consonantal inventory.

### AFFRICATES

French does not have any sound unit whose articulation is identical to that of Mandinka affricates. The Mandinka consonantal system contains two affricates /c/ (voiceless) and /J/ (voiced) whereas the French system has none. Both affricates are currently used as frequent phonemes in Mandinka.

### FRICATIVES

Mandinka contains three voiceless consonants /f,s,h/ whereas French includes three voiceless /f,s,ʃ/ and three voiced consonants /v,z,ʒ/. Although these consonants are all fricatives, the French voiceless palatal fricatives /ʃ/, the voiced palatal fricative /ʒ/, the labio-dental /v/, the dental /z/, have no counterparts in Mandinka. In return the Mandinka consonant /h/ does not exist in French.

As for the voiceless labio-dental /f/, it is similarly realized in both languages whereas the voiceless fricative /s/ is dental in French and alveolar in Mandinka.

#### NASALS

The common existing nasal vowels in French and Mandinka are the following: /m/, /n/, /ɲ/, /ŋ/. Although both languages contain the same nasal consonants, the French nasal consonant /n/ is dental where as that of Mandinka is alveolar.

As for the bilabial /m/, the palatal /ɲ/ and the velar /ŋ/, they are realized similarly in both languages. As mentioned earlier, the velar nasal consonant /ŋ/ in French exists in borrowed words only.

#### LIQUIDS AND GLIDES

Liquids are articulated differently in both languages. Mandinka liquids /l/ and /r/ are alveolar sounds whereas French /l/ is dental and its /R/ is uvular.

French has three glides /ɥ, j, w/ and Mandinka has only two /j, w/. Though French and Mandinka have in common the spread palatal glide /j/ and the rounded velar /w/, the French rounded palatal glide /ɥ/ has no Mandinka counterpart.

### 2.3. SUPRASEGMENTAL SYSTEMS

Prosodics are as much part of language as are segmental units; pitch plays both linguistic and non-linguistic roles and can thus convey the enunciators' emotions, mood and attitudes. Therefore it is clear that both French and Mandinka consist not only of a succession of different segmental units (vowels, consonants and glides) but also of other units added or superimposed on the sequence of sounds, such as stress and pitch.

It is important to note that although grammatical stress is predictable in both languages, its placement differs. As we have seen earlier French grammatical stress generally falls on the last syllable of a polysyllabic word or on the final syllable of a sense-group, whereas Mandinka grammatical stress regularly falls on the first syllable of monosyllabic, polysyllabic or on the first syllable of a sense-group. However, it is important to note that both French and Mandinka can be said to be syllable-timed languages since the basic rhythm is imposed by the syllable. As for the emphatic stress, its occurrence is unpredictable in both languages and depends on the speaker's intention and purpose.

Although both languages share the same basic descending pitch pattern, it still remains that Mandinka generally uses the conjunction **BARI** (but) at the beginning of exclamation utterances to express the idea of surprise. In this respect,

Mandinka exclamation utterances differ from French in that the latter does not use the equivalent (**MAIS**) to convey an idea of surprise, instead it uses (**QUE, QUEL, QUELLE**).

Yet, similarly to French, Mandinka questions starting with Jumaa (who), luñjuma (when), muneyaatina (why), munto (where), orders and exclamation sentences require that the first syllable start on a note which is slightly above the normal speaking range.

## **CHAPTER III**

### **PEDAGOGICAL IMPLICATIONS**

In this chapter, I will suggest phonetic correction methods to be used by teachers of both French and Mandinka in their classrooms in order to correct the pronunciation of their students: first, for vowels, then, for consonants. I will use examples of words involving articulatory difficulties of segmental units in word initial position, then in word medial and final position in order to lead learners to produce them in any possible context.

#### **3.1.VOCALIC SYSTEMS**

##### **FRENCH FRONT VOWELS FOR MANDINKA LEARNERS**

As discussed earlier, French front vowels consist of spreads /i,e,ɛ,a,ẽ/ and rounded vowels /y,ø,œ/. Nasal vowels cause major problems to Mandinka learners. First the teacher should know that Mandinka does not have front rounded vowels. Thus he should contrast each of the front rounded vowels with the Mandinka vowels that share some features in common, in order to display to learners the articulatory distinctive features which do not occur in Mandinka. Furthermore, French spread vowels /ɛ/ and /ẽ/ which do not exist in Mandinka must be granted special treatment.

## 1. /y/ vs /i/ and /u/

First, the French vowel /y/ will be opposed to /i/ and then to /u/ since both vowels will generally be used by Mandinka speakers studying French at the place of the French vowel /y/.

## /y/ vs /i/

/ys/	(us)	vs	/isi/	(ici)
/yzyR/	(usure)	vs	/ism/	(isthme)
/yze/	(user)	vs	/ise/	(hisser)
/yzin/	(usine)	vs	/ikon/	(icône)
/inytil/	(inutile)	vs	/inik/	(inique)
/RyptyR/	(rupture)	vs	/Raplike/	(appliquer)
/kuzy/	(cousu)	vs	/asi/	(assis)
/isy/	(issue)	vs	/isi/	(ici)
/tisy/	(tissu)	vs	/mERsi/	(merci)

## /y/ vs /u/

/yn/	(une)	vs	/utR/	(outré)
/ytil/	(utile)	vs	/utij/	(outil)
/yni/	(uni)	vs	/uRs/	(ours)
/byRo/	(bureau)	vs	/buRo/	(bureau)
/pys/	(puce)	vs	/puse/	(pousser)
/dyRe/	(durée)	vs	/kuR/	(court)
/pERdy/	(perdu)	vs	/du/	(doux)
/dy/	(du)	vs	/ku/	(cou)
/fy/	(fut)	vs	/fu/	(fou)
/dy/	(du)	vs	/du/	(doux)

## 2. French /ø/ vs /e/

The French vowels /ø/ will be contrasted with the vowel /e/ which occurs as such in both languages. Since /e/ is the only Mandinka front vowel whose degree of aperture is the same as that of /ø/, Mandinka students learning French will tend to substitute it for /ø/. Thus it is important for teachers to contrast both vowels in order to display to learners the specific articulatory features of /ø/ in comparison to /e/.

### /ø/ vs /e/

/ø/	(eux)	vs	/e/	(et)
/øʁø:z/	(heureuse)	vs	/emeʃe/	(éméché)
/øfemism/	(euphémisme)	vs	/efemine/	(éféminé)
/mentø:z/	(menteuse)	vs	/mɔ̃te/	(monter)
/føtʁ/	(feutre)	vs	/fetu/	(fétu)
/møgle/	(meugler)	vs	/medite/	(méditer)
/pøʁø/	(peureux)	vs	/pepit/	(pépité)
/fø/	(feux)	vs	/fe/	(fée)
/kø/	(queue)	vs	/de/	(des)

It is important for instructors to teach the meaning of these words by means of visual images or explanations since their beginning students might not know the meaning of the words they are asked to pronounce.

## 3. French /oe/ vs /e/

Since the vowel /oe/ is also missing in the Mandinka vowel inventory, it will regularly be substituted for /e/.



This vowel is the only Mandinka vowel which shares more features with the French /œ/ than others, because it is a front, short, mid-high and spread while /œ/ is front, short, mid-low and rounded. Thus the contrast should be made in the classroom environment as follows:

/œ/ vs /e/

/œR/	(heure)	vs	/ele/	(ailé)
/œRte/	(heurter)	vs	/fetaR/	(fétard)
/avoegl/	(aveugle)	vs	/eto/	(étau)
/kœR/	(coeur)	vs	/kaje/	(cailler)
/boe:R/	(beurre)	vs	/bekij/	(béquille)
/ploe:R/	(pleure)	vs	/mefije/	(méfier)
/poepl/	(peuple)	vs	/seRyR/	(serrure)
/soeR/	(soeur)	vs	/sese/	(cesser)

It is important to recall that while the French vowel /œ/ occurs in closed syllables particularly before /R/, its counterpart /ø/ generally occurs in open syllables.

#### 4. French /œ̃/ vs /œ/

As discussed earlier, French nasal vowels will cause major problems to Mandinka speakers learning French, since **NASALIZATION** is not a distinctive feature, nor does it occur as a redundant feature in Mandinka as spoken in Sénégal. French instructors should use examples where the contrast of nasal vowels and oral ones will display the **PHONEMIC STATUS** of

nasalization in French. The French front rounded nasal vowel /œ̃/ contrasts with the oral /œ/ as follows:

/œ̃/ vs /œ/

/œ̃/	(un)	vs	/œ/	(eux)
/bRœ̃/	(brun)	vs	/bRœvaz/	(breuvage)
/okœ̃/	(aucun)	vs	/okœR/	(au coeur)
/paRfœ̃/	(parfum)	vs	/œR/	(heure)
/defœ̃/	(défunt)	vs	/boœR/	(beurre)
/azœ̃/	(à jeûn)	vs	/zœRt/	(j'heurte)
/ãpRœ̃ete/	(emprunter)	vs	/pRœv/	(preuve)
/opɔ̃Rtœ̃/	(opportun)	vs	/apoœRe/	(apeurer)

5. French /ɛ/ vs /e/

Similarly to /œ̃/, /ɛ/ does not occur as such in Mandinka and is realized usually in closed syllables in modern French. As for the vowel /e/, it generally occurs in open syllables like /ø/. It is also the responsibility of teachers to display these characteristics to students through examples before starting to correct their pronunciation. Since /ɛ/ does not occur in Mandinka, Mandinka speakers studying French do not differentiate /ɛ/ and /e/.

## /ɛ/ vs /e/

/bɛl/	(belle)	vs	/pRɛ/	(près)
/dɛt/	(dette)	vs	/tɛ/	(thé)
/tRɛ:z/	(treize)	vs	/alɛ/	(aller)
/sɛt/	(sept)	vs	/sɛ/	(ses)
/fɛ/	(fait)	vs	/fɛ/	(fée)
/dɛRnjɛ:R/	(dernière)	vs	/dɛRnje/	(dernier)
/leʒɛ:R/	(légère)	vs	/leʒɛ/	(léger)
/abRɛ:ʒ/	(abrège)	vs	/abReʒɛ/	(abréger)

It is important to note that, the phonemic distinction between /ɛ/ and /e/ is **NEUTRALIZED** today in some parts of France resulting in the articulation of one sound unit which is at times an allophone and at other times a phoneme, called an **ARCHIPHONEME** (Martinet 76-77).

## 6. French /ẽ/ vs /e/

The nasal vowel /ẽ/ is the only French front nasal vowel which is spread. Similarly to other nasal vowels, it will create problems for Mandinka learners whose language has only oral vowels. Teachers needs to find words they can use to contrast the nasal vowel /ẽ/ with the Mandinka /e/ so that students will realize and internalize the fact that nasalization is phonemic in French. This will help Mandinka students studying French succeed in producing correctly the French /ẽ/.

## /ẽ/ vs /e/

/ẽvãte/	(inventer)	vs	/evãtRe/	(éventrer)
/ẽfiRm/	(infirme)	vs	/efile/	(éffiler)
/vẽ/	(vin)	vs	/ve/	(vais)
/dẽ/	(daim)	vs	/de/	(des)
/pẽ/	(pain)	vs	/le/	(les)
/bẽ/	(bain)	vs	/be/	(bée)
/mẽ/	(main)	vs	/me/	(mes)
/pẽdR/	(peindre)	vs	/pẽRdR/	(perdre)
/pẽse/	(pincer)	vs	/pezo/	(pezo)
/kẽz/	(quinze)	vs	/kesjẽ/	(caissier)

## 7. French front /a/ vs back /ɑ/.

It should be pointed out at the onset that 95% of French /a/'s are front vowels and that productive and significant contrasts between the two vowels, indicating distinctions in meaning, are relatively few (Battye and Hintze 121).

While French comprises a front /a/ and a back /ɑ/, Mandinka has one short /a/ and one long /a:/ which are both central, low and spread. Although this does not affect the pronunciation of Mandinka learners that much, it still remains that for a good production of both French vowels, Mandinka speakers must be shown their distinctive features through examples such as the following ones where the front /a/ contrasts with the back /ɑ/.

## /a/ vs /ɑ/

/mat <sup>ẽ</sup> /	(matin)	vs	/mat <sup>ẽ̃</sup> /	(mâtin)
/bat <sup>õ</sup> /	(battons)	vs	/bat <sup>õ̃</sup> /	(bâton)
/lase/	(lacer)	vs	/lase/	(lasser)
/mal/	(malle)	vs	/mal/	(mâle)
/pat/	(patte)	vs	/pat/	(pâte)
/ta <sup>ɥ</sup> /	(tache)	vs	/ta <sup>ɥ̃</sup> /	(tâche)
/la/	(la)	vs	/ilelɑ/	(il est las)
/fas/	(face)	vs	/fɑ:z/	(phase)
/Ra/	(rat)	vs	/Rwɑ/	(roi)
/sa/	(sa)	vs	/swɑ/	(soie)

Phonetically, French back /ɑ/ occurs in general in monosyllables which are under stress. It always occurs before the voiced dental fricative /z/ with lengthening. In other contexts, it occurs after the cluster /Rw/ in some monosyllabic words. Both the front and back French vowels /a/ and /ɑ/ are maintained by Parisians and their distribution from word to word may be different from one speaker to another (Battye and Hintze 122).

Various observers of contemporary French foresee the eventual disappearance of the back vowel /ɑ/ in the vocalic system of modern French resulting in a single central open vowel closer to the front /a/ like the Mandinka short vowel /a/. However, while production of the back vowel is not essential for Mandinka speakers studying French, its

acknowledgement is useful and can offer some interesting insights into styles.

#### MANDINKA FRONT VOWELS FOR FRENCH LEARNERS

Mandinka long vowels will create confusion for French learners since they are phonemes in Mandinka whereas they do not have the same phonemic value in French.

The major problems of French speakers studying Mandinka is more phonemic than phonetic in that they will tend to ignore the distinctive value of length in Mandinka which does not have the same status in modern French. Consequently, the students need to be taught the phonemic value of vocalic length in Mandinka by means of exercises based on minimal pairs which display the phonemic contrast that exist between Mandinka short and long vowels.

French native speakers studying Mandinka may tend to consider Mandinka long vowels as **ALLOPHONES** of the short ones instead of distinct **PHONEMES**. Thus the phonemic value of the vowel /i/ in opposition to /i:/ may be ignored by French learners. Similarly, the same students may not know that the front vowels /e/ and /e:/ are distinct phonemes in Mandinka no matter in which environment they occur.

1. /i/ contrast with /i:/ as follows:

/bi/	(today)	vs	/bi:/	(to fetch water)
/sibo:/	(name of a girl)	vs	/si:bo:/	(to dream)
/kati/	(cut)	vs	/kati:/	(to fly)
/kasi/	(nothing)	vs	/kasi:/	(to sit down)

2. /e/ contrasts with /e:/ as follows:

/Je/	(see)	vs	/Je:/	(there)
/selo:/	(to climb)	vs	/se:lo:/	(the field)
/keso:/	(the new)	vs	/ke:so:/	(to stab somebody)
/si:se/	(a last name)	vs	/si:se:/	(hen)

3. /a/ contrasts with /a:/ as follows:

/kano/	(love)	vs	/ka:no/	(red pepper)
/fano/	(breath)	vs	/fa:no/	(loincloth)
/kata/	(separate)	vs	/kata:/	(to go)
/kana/	(escape)	vs	/kana:/	(to come)

The examples above are designed to display the relevance of length in Mandinka for French learners. French speakers will notice that vowel length is very important in Mandinka and does not necessarily depend on the consonant that immediately follows a vowel or the environment in which vowels occur as in modern French.

Moreover, they will also notice that the Mandinka short and long vowels share the same distinctive features except length, and will pay more attention to vocalic length when speaking Mandinka. This should be one of the top priorities of a good Mandinka teacher for French students. When students succeed in internalizing the phonemic relevance of vowel length in Mandinka, an important step forward in their learning process is made.

As for the Mandinka vowels /a/ and /a:/, it is also up to the teacher to instruct his students that although both Mandinka vowels share many common distinctive features with the French ones, they are different in that both Mandinka vowels are central whereas French has one front /a/ and one back /ɑ/.

#### THE FRENCH /ə/ FOR MANDINKA LEARNERS

This French vowel needs to be granted special attention by French teachers for Mandinka students. /ə/ has a particular status in modern French and is pronounced in some contexts and deleted in others (cf. The central vowel /ə/). It is important that the teacher display to his students the basic contexts in which /ə/ is fully pronounced and where it is not. In showing to students contexts in which it is deleted, the teacher may also explain and focus on the resulting consonant clusters that might not be known by Mandinka native speakers. In contexts where it is normally articulated, Mandinka speakers learning French will tend to substitute /e/ for it since it exists in both languages and is the only vowel with which it shares several features. First, the teacher should design exercises where the contrast between the two vowels is displayed before selecting contexts where its elision creates new consonant clusters unfamiliar to Mandinka students.



The vowel /ə/ is generally articulated in various contexts, as demonstrated in the examples I will provide.

/ə/ is generally articulated in the following contexts (Battye and Hintze 106):

1-When the items **le**, **ce**, **que** are in a stressed position which demands the realization of the vowel which may be realized as /ø/ or even /œ/.

2-In some polysyllabic words /ə/ is stabilized.

3-The initial /ə/ is never deleted either from interrogative proforms (**que**), nor from the prefixes (**de-**, **re-**).

4-/ə/ will be fully articulated between two stops, because its deletion would bring together two stop consonants or groups of identical consonants.

5-It is pronounced when it is preceded by two consonants. This is traditionally known as **la loi des trois consonnes** which supports that /ə/ is always pronounced in French when three consonants would otherwise be brought together. It is important to note that this rule is not entirely satisfactory since /ə/ may be deleted in some contexts where easily pronounced consonant clusters occur as illustrated by the two following examples: /ilsRə/ (il sera), /elfRə/ (elle fera).

6-/ə/ will not be deleted when it is followed by a liquid: /l/ or /R/ + the glide /j/ and a vowel even though it is preceded by only one consonant. This is also an exception to the rule above.

7-In compound words where the second items are monosyllabic words, /ə/ is generally pronounced, in opposition to those whose second items consist of polysyllabic words.

### Contexts where /ə/ is articulated in modern French

#### **/ə/ vs /e/ in phrase-initial syllables**

/pRəmj ɛRmɑ̃/	(premièrement)	vs	/pRezidɑ̃/	(président)
/bRəbi/	(brebis)	vs	/bReʃ/	(bréchet)
/bRətɔ̃/	(breton)	vs	/betaj/	(bétail)
/kəditu/	(que dis-tu?)	vs	/kesk/	(qu'est-ce que)
/Rəbel/	(rebelle)	vs	/Realism/	(réalisme)
/dəpyi/	(depuis)	vs	/depaR/	(départ)
/dəkwa/	(de quoi)	vs	/deka/	(des cas)
/ʒəʒu/	(je joue)	vs	/ʒete/	(j'étais)
/səsi/	(ceci)	vs	/sesa/	(c'est sa)

#### **/ə/ vs /e/ in medial syllables**

/atəljɛ/	(atelier)	vs	/oteljɛ/	(hôtelier)
/ɛdəRjɔ̃/	(aiderions)	vs	/ede/	(aider)
/pɔRtəkɛl/	(porte-clef)	vs	/pɔRkepik/	(porc-épic)
/gaRdəbu/	(garde-boue)	vs	/gaRdevu/	(gardez-vous)

#### **/ə/ vs /e/ in phrase final syllables**

/dilə/	(dis-le!)	vs	/dile/	(dis-les)
/suRsə/	(sur ce)	vs	/suRse/	(sur ses)
/paRskə/	(parce que!)	vs	/paRskɛleleɛd/	(parce qu'elle est laide)

**Contexts where /ə/ is deleted in modern French**

**/ə/ in phrase-initial syllables**

/œptigaRs <sup>~</sup> /	(un petit garçon)
/adm <sup>~</sup> ɛ/	(à demain)
/padpRɔblɛm/	(pas de problème)
/oRwaR/	(au revoir)
/patdelef <sup>~</sup> /	(patte d'éléphant)
/madmwaz <sup>~</sup> ɛl/	(mademoiselle)

**/ə/ in Medial syllables**

/ilsR <sup>~</sup> a/	(il sera)
/ilfR <sup>~</sup> a/	(il fera)
/ɛlsR <sup>~</sup> /	(elles seront)
/ɛlfR <sup>~</sup> /	(elles feront)

**/ə/ in phrase-final**

/uvRlap <sup>~</sup> ɔRt/	(ouvre la porte)
/donmwale <sup>~</sup> ʃosɛt/	(donne moi les chaussettes)
/ilemalad/	(il est malade)
/elevid/	(elle est vide)
/ynbɛlpl <sup>~</sup> ɑt/	(une belle plante)

It is essential that teachers present an articulatory treatment of the French /ə/ by means of various examples involving contexts in which it is pronounced or deleted.

Once Mandinka students succeed in identifying contexts in which /e/ is used or deleted, then they will progressively learn to articulate the consonant clusters that emerge from its deletion and thus approximate a good French pronunciation.

#### FRENCH BACK VOWELS FOR MANDINKA LEARNERS

French back vowels that will cause problems to Mandinka learners are: the short /ɔ/ and the two nasal vowels /ɔ̃/ and /ɑ̃/. Since these vowels are realized only in French and not in Mandinka, they are likely to cause articulatory difficulties for Mandinka learners. The French teacher should therefore contrast these vowels with other vowels with which they share some features in order to display their basic characteristics to Mandinka students, and thus give learners the opportunity to articulate them correctly.

##### 1. French /ɔ/ vs /ɔ:/

/pɔRt/	(porte)	vs	/pɔ:R/	(porc)
/fɔRt/	(forte)	vs	/fɔ:R/	(fort)
/bɔRde/	(border)	vs	/bɔ:R/	(bord)
/dɔRmiR/	(dormir)	vs	/dɔ:R/	(dort!)
/kɔRpylɑ̃/	(corpulent)	vs	/kɔ:R/	(corps)

## 2. French /ɔ/ vs /o/

/ɔgR/	(ogre)	vs	/oto/	(auto)
/mɔtoeR/	(moteur)	vs	/moto/	(moto)
/ɔpeRe/	(opérer)	vs	/opRE/	(auprès)
/ɔsmoz/	(osmoze)	vs	/osi/	(aussi)
/bɔs/	(bosse)	vs	/bos/	(Beauce)
/bɔt/	(botte)	vs	/bo/	(beau)
/kɔp/	(cogne)	vs	/koko/	(coco)
/dɔt/	(dot)	vs	/do/	(dos)
/gRɔp/	(grogne)	vs	/gRo/	(gros)

## 3. French /ɔ/ vs /o:/

/sɔl/	(sol)	vs	/so:l/	(saule)
/fɔs/	(fosse)	vs	/fo:s/	(fausse)
/pɔm/	(pomme)	vs	/po:me/	(paume)
/nɔtR/	(notre)	vs	/no:tR/	(Notre)
/tɔp/	(top)	vs	/to:p/	(taupe)

It is important to note that in French the mid open vowel /ɔ/ occurs in closed syllables similarly to /ɛ/. As for the back rounded vowels; final syllables closed by the consonants /g, p/ will contain the vowel /ɔ/. /ɔ/ is generally lengthened when it occurs before /R/. There is a distinctive contrast between mid-vowels that occur in final syllables. For the back vowels, the contrast between /o/ and /ɔ/ plays a distinctive role when the final syllable is closed by

consonants other than /R,g,p/ as illustrated by the examples above.

In non-final syllables, especially in rapid speech, the quality of the mid-vowel /ɔ/ may be affected by a vowel which occurs in the final syllable through the phenomenon of **vowel harmony** (Battye and Hintze 115). Thus the French open mid-vowel /ɔ/ may close to /o/ under the influence of the close vowel which occurs in the final syllable as in /dɔRmiR/ vs /dodo/, /ɔtɔmobil/ vs /oto/ and /mɔtoeR/ vs /moto/.

Although Mandinka has two back mid rounded vowels /o,o:/, it is important to note that none of them is realized as the French /ɔ/. Both Mandinka vowels are mid-high rounded vowels whereas French /ɔ/ is a mid-low rounded vowel. Subsequently, it is essential that teachers display to Mandinka learners the articulatory features of the French vowel /ɔ/ and the contexts in which it occurs with examples that easily show the contrast.

#### 4. French /ɔ̃/ vs /ɔ/

/ɔ̃d/	(onde)	vs	/ɔd/	(ode)
/ɔ̃t/	(honte)	vs	/ɔtaʒ/	(otage)
/ɔ̃bR/	(ombre)	vs	/ɔblik/	(oblique)
/fɔ̃de/	(fonder)	vs	/fɔs/	(fosse)
/kɔ̃fɔ̃dR/	(confondre)	vs	/kɔfR/	(coffre)
/dɔ̃/	(don)	vs	/dɔt/	(dot)
/bɔ̃/	(bon)	vs	/bɔt/	(botte)
/pɔ̃s/	(ponce)	vs	/pɔsede/	(posséder)

5. French /*ɑ̃*/ vs /*a*/

/ <i>ɑ̃</i> /	(en)	vs	/ <i>a</i> /	(a)
/ <i>ɑ̃fɑ̃t</i> /	(enfant)	vs	/ <i>afɑ̃</i> /	(à fond)
/ <i>ɑ̃tRe</i> /	(entrer)	vs	/ <i>atRe</i> /	(à trait)
/ <i>fɑ̃dR</i> /	(fendre)	vs	/ <i>fabRike</i> /	(fabriquer)
/ <i>dɑ̃</i> /	(dans)	vs	/ <i>dada</i> /	(dada)
/ <i>lɑ̃</i> /	(lent)	vs	/ <i>la</i> /	(las)
/ <i>pɑ̃dɑ̃</i> /	(pendant)	vs	/ <i>pɑ̃da</i> /	(penda)

/*ɑ̃*/ can occur at word initial, medial and final position in French. /*a*/ generally appears in monosyllables under stress and before /*z*/ with lengthening as in /*fa:z*/, /*ka:z*/ and /*va:z*/. It can also occur after the cluster, /*Rw,sw,fw*/ as in /*Rwa*/, /*swa*/ and /*fwɑ*/ (cf. French front /*a*/ vs back /*ɑ*/).

The focus of French instructors should be to use similar exercises in order to raise students' awareness of the phonemic status and the articulatory features of the two modern French back nasal vowels /*ɑ̃*/ and /*ɑ̃*/.

## MANDINKA BACK VOWELS FOR FRENCH LEARNERS

Similarly to front long vowels, the **length** or **duration** of some back vowels will be a major problem for French speakers studying Mandinka. Thus the teacher must use contrastive exercises that will display to his students the phonemic value of length in Mandinka as compared to French. The following contrasts represent possible exercises that can be used by Mandinka teachers whose students are French native speakers in

order to display the phonemic value of length in Mandinka.

It is important to note that Mandinka long vowels /u:/ and /o:/ may require a special phonemic treatment by the teacher so that French speakers studying Mandinka will acknowledge them as separate phonemes distinct from their short counterparts.

In sum, it is important that teachers of both languages be able to explain the distinctive features of each vowel of the language they are teaching to their students. Otherwise, regular **INTERFERENCE** problems will jeopardize the students' efforts to learn the foreign language as the result of the influence of their previous knowledge in their present learning process.

1. /u/ contrasts with /u:/ as follows:

/suto:/	(bush)	vs	/su:to:/	(the night)
/kuro:/	(the group)	vs	/ku:ro:/	(to wash)
/buro/	(duck)	vs	/bu:ro/	(brisk weaning)
/ka:tu/	(because)	vs	/ka:tu:/	(to let alone)

2. /o/ contrasts with /o:/ as follows:

/boro:/	(to run)	vs	/bo:ro:/	(remedy)
/tulo/	(ear)	vs	/tulo:/	(oil)
/lo/	(to stand)	vs	/lo:/	(wood)
/ka:so/	(to give)	vs	/ka:so:/	(to pierce)



It is important that Mandinka teachers mention to their students that Mandinka does not have the French short, mid-low rounded back vowel /ɔ/; instead the language has a short, mid-high and rounded back vowel /o/. This vowel becomes a distinct phoneme when lengthened in Mandinka.

The examples provided in this chapter are designed to highlight difficulties that may be encountered at the level of vowels by Mandinka speakers studying French and French native speakers studying Mandinka. The examples also give some phonetic correction methods to teachers of either language.

On the basis of the examples given in this chapter, teachers of either language will be able to predict difficulties that students might encounter and lead them to an approximative good pronunciation of the language through REPETITION, VOCABULARY or DICTATION exercises.

### 3.2. CONSONANTAL SYSTEMS

In this section, I will focus on areas of contrast between French and Mandinka consonants.

#### FRENCH STOPS FOR MANDINKA LEARNERS

The minor difference in stop consonants between both languages is that Mandinka /t,d/ are alveolar consonants whereas the French ones are dental, and the French voiced velar consonant /g/ has no Mandinka counterpart. Mandinka speakers learning French will tend to articulate /t/ and /d/ as alveolar consonants, and in return French natives studying

Mandinka may articulate both Mandinka alveolar stop consonants as dental. This articulatory difference of both consonants /t,d/ in the two languages does not have important pedagogical implications, because it does not affect communication and its effect on the pronunciation is relatively small in comparison to articulatory problems caused by the French /g/.

Since Mandinka speakers do not have the French voiced velar sound /g/ in their consonant system, they regularly articulate their only voiceless velar stop consonant /k/ in words where /g/ should normally be produced. This phenomenon is widespread in Sénégal, The Gambia and Guinea Bissau where Mandinka people constantly substitute the consonant /k/ for /g/. As a result, their accent is marked by this feature in contrast to other ethnic groups such as Wolof, whose consonantal system includes /g/. French teachers should design exercises where the contrast between the voiced velar stop /g/ and its voiceless counterpart is well displayed.

The following contrast represents possible exercises that could be useful for French teachers to help Mandinka students succeed in articulating /g/ correctly.

/g/ contrasts with /k/ in modern French as follows:

/gã/	(gant)	vs	/kã/	(camp)
/gu/	(goût)	vs	/ku/	(cou)
/gaR/	(gare)	vs	/kaRe/	(carré)
/gaRãs/	(garance)	vs	/kaRãs/	(carance)
/egute/	(égoutter)	vs	/ekute/	(écouter)

/dega/	(dégât)	vs	/deka/	(des cas)
/k <sup>h</sup> gR /	(congrès)	vs	/k <sup>h</sup> kRɛ/	(concret)
/m <sup>h</sup> g/	(mangue)	vs	/m <sup>h</sup> k/	(manque)
/l <sup>h</sup> g/	(longue)	vs	/l <sup>h</sup> kl/	(l'oncle)
/l <sup>h</sup> g/	(langue)	vs	/l <sup>h</sup> kR/	(l'ancre)
/tag/	(tag)	vs	/tak/	(tac)

French and Mandinka speakers will not encounter any problems in producing the voiceless velar stop consonant /k/ since it occurs as such in their daily language.

#### MANDINKA AFFRICATES FOR FRENCH LEARNERS

Since both Mandinka consonants /c,J/ do not exist in French, they will cause problems to French speakers studying Mandinka. The French learners will tend to articulate the French palatal fricative sound units /ç,ʒ/ available in their consonantal system in place of /c,J/, i.e., French learners will regularly substitute the voiceless palatal /ç/ for the Mandinka voiceless palatal affricate /c/ and the voiced palatal fricative /ʒ/ for the Mandinka voiced palatal affricate /J/. This phenomenon is noticeable when one hears French natives speaking Mandinka and using words that contain affricates.

Subsequently, those students need to be shown the articulatory distinctive features that characterize both affricates in contrast with French palatal fricatives, in order to succeed in properly articulating Mandinka affricates.

Mandinka teachers should use examples which contrast affricates with the French palatal fricatives /ʃ, ʒ/. This contrast will display to learners the articulatory differences between Mandinka affricates and French palatal fricatives.

/c/ contrast with /ʃ/ as follows:

/ca:lo:/	(sardine)	vs	/ʃaR/	(charre)
/ca:bo:/	(the key)	vs	/ʃato/	(château)
/cu:bo:/	(to dye)	vs	/ʃu/	(choux)
/cu:ti/	(dilute)	vs	/ʃapo/	(chapeau)
/kaca:/	(to discuss)	vs	/deʃe/	(déchet)
/kuca:/	(sorrel)	vs	/kuʃe/	(coucher)
/kaco/	(pie)	vs	/kaʃo/	(cachot)

/J/ contrast with /ʒ/ as follows:

/Jalo/	(griot)	vs	/ʒa/	(Jean)
/Julo/	(rope)	vs	/ʒwa/	(joie)
/Jato/	(lion)	vs	/ʒɔʒ/	(juge)
/Jiwo/	(water)	vs	/ʒɛtij/	(gentil)
/ka:Jo/	(to pay)	vs	/deʒa/	(déjà)
/saJa:/	(proper name)	vs	/sɔʒe/	(songer)
/supJo/	(breast)	vs	/buRʒwa/	(bourgeois)
/sapJo/	(rain)	vs	/foRʒe/	(forger)

It is important that Mandinka teachers mention to their students that not only does the language not have the palatal fricative consonants, but also that their distribution is different. /c/ and /J/ like all Mandinka consonants, except

the velar nasal /ŋ/, do not occur in word final position, whereas both French palatal fricatives do as in the following examples: /kaʃkaʃ/ (cache-cache), /kuʃ/ (couche), /duʃ/ (douche), /buʒ/ (bouge), /sɔ̃ʒ/ (songe), /loʒ/ (loge).

#### FRICATIVES FOR MANDINKA LEARNERS

Mandinka native speakers generally encounter several problems when articulating French words that contain the following consonants: /v, z, ʒ, ʃ/.

The labio-dental fricative /v/ is commonly pronounced as /w/ or /f/ in rare cases by Mandinka speakers. Mandinka students learning French need to be shown the articulatory features of the French voiced labio-dental consonant /v/ in contrast with /w/ and /f/ in order to be able to produce it correctly.

Similarly, the French voiced dental fricative /z/ must be granted particular attention so that Mandinka students can succeed in identifying its distinctive features and thus avoid substituting it for its voiceless consonant /s/, the only alveolar fricative consonant that exists in Mandinka.

As for the French palatal fricative consonants /ʃ, ʒ/, they will definitely constitute major articulatory difficulties for Mandinka students since they do not exist in Mandinka. Both consonants are generally rendered as /s/ by Mandinka students, because their place of articulation is close to their only voiceless alveolar fricative consonant /s/.

/v/ contrasts with /w/ as follows:

/vaR <sup>q̃</sup> /	(varang)	vs	/wara/	(large)
/vwatyR/	(voiture)	vs	/wati:ro/	(car)
/vil/	(ville)	vs	/wilo/	(get up)
/v <sup>q̃</sup> dR/	(vendre)	vs	/wandi/	(somebody's)
/tyva/	(tu vas!)	vs	/buwa:/	(witch)
/suv <sup>q̃</sup> /	(souvent)	vs	/suruwa:/	(wolof)
/kuv <sup>q̃</sup> /	(couvent)	vs	/duwa:/	(prayer)

/v/ contrasts with /f/ as follows:

/v <sup>q̃</sup> /	(vent)	vs	/fa:/	(killed)
/v <sup>q̃</sup> dR/	(vendre)	vs	/faro/	(faro)
/vwatyR/	(voiture)	vs	/fatiiro/	(car)
/vil/	(ville)	vs	/filo/	(lost)
/suv <sup>q̃</sup> /	(souvent)	vs	/safe:/	(talisman)
/sav <sup>q̃</sup> /	(savent)	vs	/nafo/	(importance)
/vivR/	(vivre)	vs	/na:fo/	(hat)
/av <sup>q̃</sup> /	(avant)	vs	/afo/	(tell it)

/z/ contrasts with /s/ as follows:

/zeby/	(zébu)	vs	/sebil/	(sébile)
/ze <sub>l</sub> /	(zèle)	vs	/s <sub>l</sub> /	(sel)
/zo/	(zoo)	vs	/so/	(saut)
/z <sub>l</sub> bR/	(zèbre)	vs	/sabR/	(sabre)
/duz/	(douze)	vs	/dus/	(douce)
/biz/	(bise)	vs	/bis/	(bis)
/diz/	(dise)	vs	/dis/	(dis)

/ʃ/ contrast with /s/ as follows:

/ʃe/	(chez)	vs	/se/	(ses)
/ʃa/	(chat)	vs	/sa/	(sa)
/ʃjɛ/	(chien)	vs	/sjɛ/	(sien)
/ʃo/	(chaud)	vs	/so/	(saut)
/duʃ/	(douche)	vs	/dus/	(douce)
/kaʃe/	(cacher)	vs	/kase/	(casser)
/biʃ/	(biche)	vs	/bis/	(bis)
/laʃe/	(lacher)	vs	/lase/	(lacer)

/ʒ/ contrasts with /s/ as follows:

/ʒɑ̃/	(Jean)	vs	/sɑ̃/	(sans)
/ʒe/	(j'ai)	vs	/se/	(ses)
/ʒwa/	(joie)	vs	/swa/	(soit)
/ʒɑ̃dʁ/	(gendre)	vs	/sɑ̃dʁ/	(cendre)
/bɛʒ/	(beige)	vs	/bɛs/	(baisse)
/kɛʒ/	(qu'ai-je?)	vs	/kɛs/	(caisse)
/lɑ̃ʒ/	(l'ange)	vs	/lɑ̃s/	(lance)
/kuʁʒ/	(courage)	vs	/kuʁs/	(course)

# THE MANDINKA /h/ FOR FRENCH LEARNERS

/h/ contrasts with other Mandinka consonants as follows:

/hormo/	(respect)	vs	/sormo/	(fieldwork)
/hani/	(no)	vs	/Jani/	(to burn)
/harJe:/	(luck)	vs	/darJe:/	(fame)
/harafo/	(letter)	vs	/karafo/	(to keep)
/ha:na/	(to dare)	vs	/ɲa:na/	(to show off)
/daha:/	(rest)	vs	/dafa:/	(proper noun)
/la:ho/	(a type of meal)	vs	/la:to/	(lying)
/la:hido/	(contract)	vs	/la:kido/	(lying weapon)

This type of contrast could help Mandinka teachers to explain to their French students the value of the phoneme /h/ in Mandinka and thus lead them to articulate it properly.

However, /h/ has a special status in French; although the /h/ phoneme does not occur in modern French, the grapheme **h** does exist and is categorized as **h-aspiré** and **h-muet**.

**h-aspiré** words are generally words adopted into French from languages (mainly German) other than Latin and Greek (Battye and Hintze 134). There is no liaison preceding **h-aspiré** initial words. French speakers would tend not to articulate /h/ in Mandinka where it is an independent phoneme and fully pronounced. In return Mandinka speakers should understand the status of **h-aspiré** and **h-muet** in modern French so that they can avoid articulating it no matter in which



context it occurs. The object of the teacher should be to show to Mandinka students that although /h/ is regularly used in the orthographic system of modern French, it is never pronounced.

#### H-ASPIRÉ AND H-MUET FOR MANDINKA LEARNERS

Examples of h-aspiré and h-muet are as follows:

##### **h-aspiré** words

/aRp/	(harpe)
/eRis <sup>h</sup> /	(hérisson)
/āgaR/	(hangar)
/azaR/	(hazard)
/ā <sup>h</sup> /	(hanche)
/ōt/	(honte)
/ul/	(houle)
/amo/	(hameau)

##### **h-muet** words

/om/	(homme)
/abi/	(habit)
/omaz/	(hommage)
/abityd/	(habitude)
/istwaR/	(histoire)
/abilite/	(habiliter)
/abita/	(habitat)
/abite/	(habiter)

It is important to show to Mandinka students that the implications of French h-aspiré and muet are at the level of the linking phenomenon known as **liaison** and **élision**. Phonetically, when words are taken in isolation, there is nothing to distinguish the h-aspiré from the h-muet.

Their only difference is that, while h-aspiré words are resistant to linking in modern French phrases or sentences, h-muet words are not.

#### **NASAL CONSONANTS**

Since both languages have almost the same nasal consonants, these sound units will not cause major articulatory problems for learners of either language. However, it is important to note that the only difference is that the French /n/ is dental whereas that of Mandinka is alveolar. This articulatory difference will not cause major problems to the learner of either language since its affect on the pronunciation of either language is not that important. However, teachers of either language need to draw the attention of their students on the fact that the French /n/ is dental while that of Mandinka is alveolar.

The bilabial /m/, the palatal /ɲ/ and the velar /ŋ/, although articulated similarly in both languages, have different distributional patterns. For instance, the only consonant in word final position in Mandinka is /ŋ/. Although /ɲ/ appears in words borrowed from English, it generally appears in word-final position in French and in Mandinka.

/m/ and /n/ can occur in word initial, medial and final position in French and only in word initial and medial position in Mandinka. Although the velar nasal consonant /ŋ/ is now used in modern French, it does not appear in word initial and medial position. Thus it is important that Mandinka teachers devise exercises where /ŋ/ will be used in word initial and medial position in order to make them familiar with its occurrence in those environments in the language.

/ŋ/ in word initial and medial position in Mandinka

/ŋalo/	(let us stand up)	/faŋo/	(knife)
/ŋa:pa/	(to show off)	/tuŋo/	(termitarium)
/ŋararo:/	(to rake)	/buŋo/	(room)
/ŋa:fo/	(let us tell it)	/feŋo/	(something)
/ŋama:no/	(circumcizer)	/kaŋkaŋ/	(dust)

In return, it is also important that French teachers use exercises where /m,n,ŋ/ are used in word-final position. This will help Mandinka students avoid adding a vowel after the articulation of the French final consonants, since all Mandinka words end with open syllables except those ending with /ŋ/.

/m/ in word final in French

/mɛm/	(même)
/sɔm/	(somme)
/kɔm/	(comme)
/ɔm/	(homme)
/dom/	(dôme)
/mom/	(môme)

/n/ in word final in French

/sɛn/	(saine)
/pɛn/	(peine)
/an/	(âne)
/pan/	(panne)
/dwan/	(douane)
/bɔn/	(bonne)

/n/ at word final in French

/pɛ̃n/	(peigne)
/bãn/	(baigne)
/pãn/	(pagne)
/sɛ̃n/	(saigne)
/gĩn/	(gigne)
/dĩn/	(digne)

It should be noted that all French consonants can be used in word-final position. Thus all French consonants should be emphasized when they occur in closed syllables and in word-

final position in opposition to Mandinka whose basic syllabic structure is **C.V** or **C.V.C.V.** except words that end with the velar nasal consonant /ŋ/.

#### LIQUIDS AND GLIDES

The major difficulty that Mandinka learners are likely to encounter with the production of liquids is uvular articulation of /R/ which does not occur as such in their language. Consequently, Mandinka learners will regularly substitute their voiced alveolar /r/. Likewise, French students studying Mandinka will tend to articulate the Mandinka /r/ with a uvular articulation.

Similarly, the French /l/ will tend to be articulated by Mandinka students as an alveolar sound rather than a dental one, and French learners are likely to articulate the Mandinka alveolar lateral as a dental sound.

As for the glides, the only one that will create articulatory difficulties for Mandinka speakers studying French is /ɥ/ which does not exist in their consonantal system. Mandinka students will generally substitute /ɥ/ with /w/ since the latter already exists in their consonantal inventory and shares some articulatory features with the former, such as lip rounding. It is important to show Mandinka learners that although both glides share lip rounding, they are different in relation to other features: /ɥ/ is palatal while /w/ is velar. The glide /j/ will not create problems for learners of either language, because it

occurs in French and Mandinka similarly.

The following examples will help display to Mandinka learners the articulatory characteristics of the French /R/ in different contexts: when described as voiced uvular vibrant or voiceless velar fricative.

/R/ as voiced uvular vibrant in French

/R <sup>~</sup> /	(rang)
/Ri/	(riz)
/R <sup>~</sup> ʒe/	(ranger)
/gR <sup>~</sup> /	(grand)
/bR <sup>~</sup> œ/	(brun)
/boe:R/	(beurre)
/koe:R/	(coeur)

/R/ as voiceless velar fricative in French

/fR <sup>h</sup> wa/	(froid)
/KR <sup>h</sup> wa/	(croit)
/tR <sup>h</sup> wa/	(trois)
/mɛtR/	(mettre)
/batR/	(battre)
/tR <sup>h</sup> e/	(très)
/tR <sup>h</sup> akil/	(tranquille)

The following examples will help teachers display the articulatory characteristics of Mandinka /r/ to students so that they can avoid articulating their French uvular /R/ in Mandinka.

/r/ as voiced alveolar in Mandinka

/raso/	(zigzag)
/rako/	(movement in prayers)
/rumba/	(a type of dance)
/mara/	(right side)
/maro/	(to hide)
/karo/	(moon)
/saro/	(melon)

The following examples represent basic samples useful for French teachers to display the articulatory features of the two glides /ɥ/ and /w/ in order to help Mandinka learners avoid substituting /w/ for /ɥ/.

/ɥ/ contrasts with /w/ in French

/lɥi/	(lui)	vs	/lwi/	(Louis)
/sɥi/	(suit)	vs	/swa/	(soit)
/kɥi/	(cuit)	vs	/kwa/	(quoi)
/tɥil/	(tuile)	vs	/twal/	(toile)
/ɥit/	(huit)	vs	/wat/	(watt)
/fɥi/	(fuit)	vs	/fwaR/	(foire)

### 3.3. SUPRASEGMENTAL SYSTEMS

Segmental units (vowels and consonants) will likely cause more difficulties to learners than suprasegmentals. However, it is also important that teachers of either language display to learners where the grammatical and the emphatic stress fall in both languages in order to avoid the minor suprasegmental interferences where students may be inclined to put either the grammatical or emphatic stress at the wrong place as the result of the influence of their mother tongue.

The following exercises can be used by teachers of either language to correct the grammatical and emphatic stress of their students.

#### French Grammatical stress for Mandinka learners

French	vs	Mandinka
/me."z <sup>3</sup> / (maison)	vs	/"me.z <sup>3</sup> /
/de."p <sup>q̃</sup> / (dépend)	vs	/"de.p <sup>q̃</sup> /
/de.p <sup>q̃</sup> ."d <sup>q̃</sup> / (dépendant)	vs	/"de.p <sup>q̃</sup> .d <sup>q̃</sup> /
/i.le."fu/ (Il est fou)	vs	/"i.le.fu/
/se.ty.no."to/ (C'est une auto)	vs	/"se.ty.no.to/
/sɛt.me.z <sup>3</sup> ."nwa:R/e.tRe."bɛl/ vs		
/"sɛt.me.z <sup>3</sup> .nwa:R/"e.tRe.bɛl/ (Cette maison noire est très belle)		



### Mandinka Grammatical stress for French learners

<b>Mandinka</b>	<b>vs</b>	<b>French</b>
/i.ta:/ (Yours)	vs	/i."ta:/"
/a.te/ (Him or her)	vs	/a."te/"
/fam.fe.lan.da.ŋo/ (Mirror)	vs	/fam.fe.lan.da."ŋo/"
/a.fa:.ma:.le.ja:.ki.li/ (He is called by his father)	vs	/a.fa:.ma:.le.ja:.ki."li/"
/ku.nuŋ/"ŋa:.Je.le:/ (I saw him yesterday)	vs	/ku."nuŋ/.ŋa:.Je."le:/"

### Emphatic stress

Since this type of stress is variable in both languages, i.e., it depends entirely on the intention of the speaker, I will give some examples of its usage in French and Mandinka that teachers of either language can use in their classrooms.

### Examples of Emphatic stress in French

/ka.Re.m <sup>˜</sup> fu/	(Carrément fou)
/se."t <sup>˜</sup> po.si.bl/	(C'est impossible)
/k <sup>˜</sup> l <sup>˜</sup> be.sil/	(Quel imbécile)
/s <sup>˜</sup> ne.pa."œ.n m/se."tyn.fij/	
(Ce n'est pas un homme, c'est une fille)	

### Examples of Emphatic stress in Mandinka

/ŋko."bun.da:.ta.wu/ (Close the door!)

/fa:.tu."ko.no.ma:.ta/ (Faatu is pregnant)

/a."ba:.ma:.teŋ/a.la."mu.so:.lon/

(That's not his mother, that's his wife)

/na.fa.ma:."ban.ta/ba.ri.na.ba:.ma:.be."ba.lu.wo:.la/

(My father died but my mother is alive)

Pitch patterns will not cause major problems for learners of either language, because although French and Mandinka are different in respect to the placement of their grammatical and emphatic stress, both languages share the same basic pitch patterns.

## CONCLUSION

In conclusion, the initial hypothesis according to which present knowledge is always influenced by previous knowledge is proven in the field of **LANGUAGE LEARNING AND LANGUAGE TEACHING**. Charles Fries' assumption I have been using as an empirical basis is valid in applied linguistics and is efficient in identifying and designing exercises to overcome problems generally encountered by students learning a foreign language. This linguistic theory provides methods and techniques for the comparison of the native language with the target language.

The aim of the comparison is to yield similarities and differences of both languages in order to discover the linguistic nature of students' mistakes. This theory was born in the 1950's when foreign language teachers noticed that most of the pronunciation mistakes made by students generally resulted from the negative transfer of their native linguistic system into the target language.

Thus, the advent of Contrastive Analysis can be credited with the provision of linguistic methods and techniques to foreign language teachers which help students approximate a native-like pronunciation in the target language. This theory supports the notion that foreign language teachers should not only be native speakers (who know the language) but in addition, they should be trained in linguistics (they should know something about both the language they are teaching and that of their students).

Consequently, this study provides the necessary tools to help French and Mandinka teachers overcome first language interference problems. Linguistic differences between the two languages with respect to vowels, consonants, glides and suprasegmental features have been established and the nature and the source of negative phonological transfers have been demonstrated. The information presented provides both a theoretical and practical basis for teachers of either language to use to devise REPETITION, DICTATION or ARTICULATORY PHONETIC TRANSCRIPTION exercises which will be useful for their students.

# BIBLIOGRAPHY

- Battye, A. and M.A.Hintze. The French Language Today. London: Routledge, 1992.
- Craduner, S. and M.P. Hagiwara. La Prononciation du Francais International: Acquisition et Perfectionnement. New York: John Willey and Sons, 1982.
- Crystal, David. Cambridge Encyclopedia of Language. 3rd ed. U.K: Cambridge University Press, 1991.
- De Saussure, Ferdinand. Course in General Linguistics. New York: Charles Bally and Albert Sechehaye, 1959.
- Dwyer, David James. African Languages: A Resource Handbook. United States: African Studies Center, 1995.
- Ewert, Alfred. The French Language. London: Faber and Faber, 1983.
- Greenberg, Joseph H. Universals of Human Languages. California: Stanford University Press, 1978.
- Hass, Marcia J. History of French: An added Dimension for Language Teaching. The University of Montana: Department of Foreign Languages and Literatures, 1990.
- Hollerbach, Wolf. The Syntax of Contemporary French. Lanham MD: University Press of America Inc, 1994.
- Juilland, Alfonse, et.al., editors. Linguistic Studies Presented to André Martinet: Non-Indo-European Linguistics. New York: Linguistic Circle of New York, 1969.
- Mallafé, D. and A.Baldé. Systeme Orthographique du Mandinka. Dakar: C.L.A.D, 1983.
- Martinet, André. Elément de Linguistique Générale. Paris: Armand Colin, 1980.
- Platiel, Suzanne. "Les Langues Mande" in Inventaire des études linguistiques sur les pays d'Afrique noire d'expression française et sur le Madagascar. Paris: Conseil International de la langue Française, 1978.
- Robert, L and C.Fries. Language Across Cultures. Ann Arbor: University of Michigan Press, 1957.
- Samuel, John. Niger-Congo Languages. Lanham MD: University Press of America Inc, 1989.

Valdman, Albert. Introduction To French Phonology and Morphology. Rowlee MA: Newbury House Publishers Inc, 1976.