الجسمه وريسة الجسزائرية الديسمقراطية الشعبية
Democratic and Popular Republic of Algeria
وزارة التعليسم العالي والبحث العلمي
Ministry of Higher Education and Scientific Research

كلية الآداب واللغات

جامعة أبي بكر بلقايد، تلمسان

Faculty of Letters and Languages

Tlemcen University - UABT

قــسم اللغة الإنجليـزية

Department of English



Bilingualism and Language Attitudes in Algerian Higher Education: Arabic and French as Languages of Instruction

Thesis submitted to the Department of English, Tlemcen University, in candidacy for a **Doctorate Degree** in **Sociolinguistics**

Presented by: Supervised by:

Mr. Mohammed El-Amine DENDANE Prof. M. Nassim NEGADI

Board of Examiners

Prof. Ghouti HADJOUI	President	University of Tlemcen
Prof. M. Nassim NEGADI	Supervisor	University of Tlemcen
Dr. Chahrazed HAMZAOUI	External Examiner	University of Temouchent
Dr. Meryem SEKKAL	External Examiner	University of Saida
Dr. Taoufik DJENNANE	Internal Examiner	University of Tlemcen
Dr. Mohamed DIB	External Examiner	University of Mascara

Academic Year 2020 - 2021

الجسمه وريسة الجسزائرية الديسمقراطية الشعبية Democratic and Popular Republic of Algeria وزارة التعليم العالي والبحث العلمي

Ministry of Higher Education and Scientific Research

كلية الآداب واللغات

جامعة أبي بكر بلقايد، تلمسان

Faculty of Letters and Languages

Tlemcen University - UABT

قــسم اللغة الإنجليــزية

Department of English



Bilingualism and Language Attitudes in Algerian Higher Education: Arabic and French as Languages of Instruction

Thesis submitted to the Department of English, Tlemcen University, in candidacy for a **Doctorate Degree** in **Sociolinguistics**

Presented by: Supervised by:

Mr. Mohammed El-Amine DENDANE Prof. M. Nassim NEGADI

Board of Examiners

Prof. Ghouti HADJOUI	President	University of Tlemcen
Prof. M. Nassim NEGADI	Supervisor	University of Tlemcen
Dr. Chahrazed HAMZAOUI	External Examiner	University of Temouchent
Dr. Meryem SEKKAL	External Examiner	University of Saida
Dr. Taoufik DJENNANE	Internal Examiner	University of Tlemcen
Dr. Mohamed DIB	External Examiner	University of Mascara

Academic Year 2020 - 2021

Declaration of Authorship

I, Mr. Mohamed El Amine DENDANE, hereby declare that I am the sole author

of this thesis and that all its content is my own, except where explicitly

mentioned. The sources of quoted material are clearly indicated. I also

confirm that the research findings exposed in this research work are

generated through my own investigation and no part of this thesis has been

submitted in part or as a whole to any other authority for the reward of a

degree or other qualification.

June 3rd 2021

Signed M. A. DENDANE

Dedication

My doctoral research is dedicated first and foremost to my parents who have always encouraged me to work hard, just as they did during my Magister work and before...

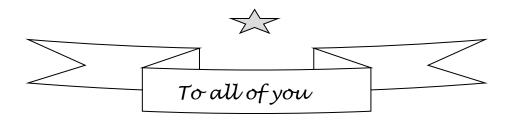
Thanks Mum and Dad for everything you did for me.

The thesis is also dedicated to all my teachers in the Department of English at Tlemcen University, including Prof. S. Benmoussat, Prof. H. Hamzaoui, Prof. I. Serir,

Prof. A. Baiche, Prof. R. Benyelles, Prof. F. Senouci, Prof. A. Belmekki, Prof. N. Mouhadjer, Prof. R. Zidane, and last, but not least, my father Prof. Z. Dendane,

I'd like to include all other teachers and researchers at the department without forgetting Prof. F. Bouhadiba from Oran University and my colleagues at Maghnia University.

I seize this opportunity to send a thought to my aunts and uncles, to all my cousins, Mansour and Mohamed, and all my friends and classmates, Bachir, Riyad, Samir, Abdessamad, Mohamed, Karim and Mohamed.



Acknowledgments

I would first like to express my deep gratefulness to Allah Almighty who has generously made things easy for me in this life. He's Allah the All-Merciful whose bounties and gifts we will never be able to reckon! To You Allah all my thanks go!

My heartfelt thanks go then to my supervisor, Prof. M.N. NEGADI who has always been there to help with his invaluable comments and advice on methodology and general research lines, but at the same time, I'd like to extend my gratitude to Prof. Z. DENDANE who, as a specialist in Sociolinguistics, has never hesitated to help me in understanding concepts for the realisation of this research.

I would also like to offer my sincere thanks to all the members of the board, Prof. Ghouti HADJOUI, Dr. T. DJENNANE, Dr. Ch. HAMZAOUI, Dr. M. DIB and Dr. Meryem SEKKAL, for having accepted to patiently read and evaluate my humble work.

My genuine thanks also extend to all the teachers and students from the Faculty of Medicine, the Faculty of Technology and the Faculty of Sciences at Tlemcen University, for having contributed to the production of this work which could only be made possible on the basis of the valuable data obtained from them.



Bilingualism and Language Attitudes in Algerian Higher Education: Arabic and French as Languages of Instruction

Abstract

Multilingualism is a pervading phenomenon in the world and one of the outstanding features of the Algerian society, due to the various historical events the country has gone through. Such multilingual setting often results in linguistic conflicts. The present doctoral thesis focuses on practices of Arabic/French bilingualism among Algerian students in relation to higher education. It attempts to raise the issue of formal instruction which is offered in the French language in medical and scientific university streams while pre-university education is undertaken in Standard Arabic, French being only taught as a subject. One crucial aim of our investigation is to question this dilemma in the present educational system and the legitimacy of bilingualism in higher education. The objective in this work is to attempt to suggest a valid way out of the problematic issue that university students are faced with when choosing their studies after they obtain the high school degree. A number of research tools, including class observation, questionnaires and interviews, have been used to investigate their linguistic behaviour in these medico-scientific branches and their attitudes towards the two competing languages. The results, analysed quantitatively and qualitatively, reveal a high degree of discrepancy as to students' competencies in French and their attitudinal behaviour towards the two languages. In fact, depending on the students' socio-cultural milieu and their educational background, success or lack of success in their studies is tightly connected with their competence in French, the language of instruction, which requires better language planning and perhaps a real bilingual education.

TABLE of CONTENTS

Declaration of Au	thorship	i
Dedication		ii
Acknowledgemen	its	iii
Abstract		iv
Contents		v
Tables and Figure	S	ix
General Introduct	ion	1
1. Multilingu	alism as a pervading phenomenon	8
1.1 Introdu	ction	8
1.2 Speech	community and verbal repertoire	10
1.2.1	The speech community	10
1.2.2	The verbal repertoire	13
1.3 Monoli	ngualism and bilingualism	14
1.3.1	Monolingualism	15
1.3.2	Multilingualism	17
1.3.3	Bilingualism: Various types	20
1.3.3.1 Ear	ly bilingualism and late bilingualism	21
1.3.3.2 Add	ditive bilingualism and subtractive bilingualism	22
1.3.3.3 Act	ive bilingualism and passive bilingualism	22
1.3.3.4 Bili	ingualism and bilinguality	23
1.4 Digloss	sia: Various definitions	24
1.4.1 C	lassical Diglossia	25
1.4.2 O	ther views on diglossia	28
1.4.2.1 Ext	ended diglossia	28
1.4.2.2 Triş	glossia	29
1.4.2.3 Sty	listic Diglossia	30

1.5 Language	contact phenomena	31
1.5.1 B	orrowing	33
1.5.2 C	odeswitching	35
1.5.2.1 Types	of codeswitching	37
1.5.2.2 Codes	witching vs. Code mixing	42
1.5.4 O	ther linguistic phenomena	43
1.5.4.1 Pidgin	s and Creoles	43
1.5.4.2 Langua	age shift and language death	44
1.6 Conclusion	n	45
2. Historica	l background and the Algerian Linguistic Profile	46
2.1 Introduction	on	46
2.2 Historical	overview	47
2.2.1 Pre-Ara	ab conquests in North Africa	48
2.2.2 The Ar	ab conquest of the Maghreb	48
2.2.3 The Sp	anish conquests	50
2.2.4 The Ot	toman occupation in Algeria	50
2.2.5 The Fre	ench colonisation	51
2.2.6 The col	lonial education strategy	53
2.3 The Alger	ian linguistic setting	54
2.3.1	The Berber language issue	55
2.3.2	Γhe phenomenon of Diglossia in Algeria	58
2.3.3	Γhe H-L continuum	64
2.4 Bilingualis	sm in Algeria	71
2.4.1	Borrowing into Algerian dialects	75
2.4.2	AA/French codeswitching	75
2.5 Conclusion	n	77

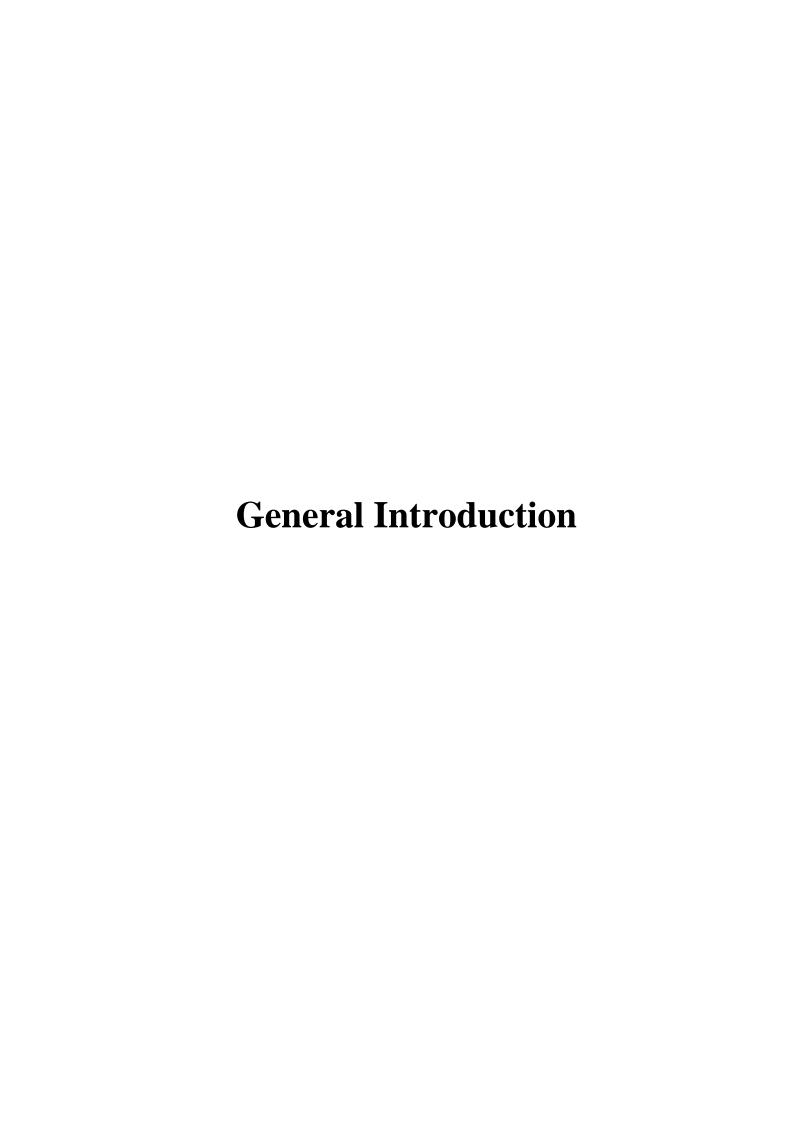
3.	Langi	uage P	lanning and Education: Acquisition and Attit	udes78
	3.1	Introd	duction	78
	3.2	Lang	uage acquisition and cognitive development in	multilingual
		settin	gs	79
		3.2.1	Mother tongue education	79
		3.2.2	Bilingual education	84
		3.2.3	Bilingual acquisition and bilingual education	87
		3.2.4	Types of bilingual education	89
		3.2.5	Benefits and challenges of bilingual education.	94
		3.2.6	Bilingual education in Algeria?	96
	3.3	Lang	uage attitudes and language learning	99
		3.3.1	The concept of attitude	100
		3.3.2	Social psychology of language	101
		3.3.3	Language attitudes	103
		3.3.4	Attitudes, motivation and language learning	106
		3.3.5	Language attitudes in multilingual settings	109
	3.4.	Langu	age Planning and Language Policy (LPLP)	111
		3.4.1	Language planning and education in multilingual s	ettings115
		3.4.2	Language planning and Diglossia	116
	3.5	Concl	lusion	118
4. N	Method	ology a	and Data analysis	121
	4.1 In	ntroduct	ion	121
	$4.2\mathrm{M}$	Iethodo	logy	122
		4.2.1	Research instruments	124
			4.2.1.1The Questionnaire	124
			4.2.1.2 The Interview	125
			4.2.1.3 Classroom observation	127
			4.2.1.4 Audio-recording and note-taking	127

4.3 Participa	nts and settings	128
4.4 Data col	llection and analyses	129
4.4.1	Structure of the questionnaire	129
4.4.2	Data Analysis	130
	4.4.2.1Primary Analysis	130
	4.4.2.2 Language attitudes and sociocultural factors	135
	4.4.2.3 Online questionnaire on Google Forms	147
	4.4.2.4 Online matched-guise technique	153
4.4.3	Focused Interviews	162
4.4.4	Classroom observation	161
4.5 Conclusi	on	171
General	conclusion	173
Bibliography		180
Appendices		190
List of Tables		
	s of pseudo-differences CA vs. MSA	63
	s of semantic shift: AA vs. MSA	
	lifferences: AA vs. MSA	
Table 2.4 Morphole	ogical differences: AA vs. MSA	67
Table 2.5 Phonolog	gical differences: AA vs. MSA	67
Table 2.6 Phonolog	gical differences along the Maghreb dialect continuum	68
Table 2.7 Lexical d	lifferences: Various Algerian dialects	68
Table 2.8 Morphole	ogical differences in two Algerian dialects vs. MSA	68
Table 2.9 Phonolog	gical differences in some Algerian dialects vs. MSA	69
Table 3.1 Weak for	rms of bilingual education	93
Table 3.2 Strong for	orms of bilingual education	93
Table 4 1 Code-su	vitching among students' speech	107

viii

List of Figures

Fig. 2.1 Badawi's diagram (1973): 'Levels of Egyptian Arabic'	61
Fig. 2.2 Diglossia continuum in the Arabic language	65
Fig. 2.3 Complexity of Arabic dialects in the Arab world	70
Fig. 2.4 Language relations in the Algerian society	74
Fig. 3.1 The multi-component model of attitude	100
Fig. 4.1 Speaking skill in MSA vs. French	131
Fig. 4.2 Language comprehension in MSA vs. French	133
Fig. 4.3 Students' language preferences in reading	136
Fig. 4.4 Language preferences in watching TV Programmes	135
Fig. 4.5 Language use on the web and social networks	137
Fig. 4.6 Higher education studies in MSA	138
Fig. 4.7 Parents' use of French	141
Fig. 4.8 Difficulties in the language of instruction	143
Fig. 4.9 Perception of competence in MSA, English and French	143
Fig. 4.10 Use of MSA and French expressions in AA	145
Fig. 4.11 Perception of a student who masters French	146
Fig. 4.12 Students' degree of comprehension of lectures in French	148
Fig. 4.13 Students' difficulties in understanding lectures in French	149
Fig. 4.14 Students' mastering languages	150
Fig. 4.15 Language use in everyday conversation	151
Fig. 4.16 Preferred medium of instruction	152
Fig. 4.17a Comprehension of Arabic text (Architecture students)	154
Fig. 4.17b Comprehension of French text (Architecture students)	154
Fig. 4.18a Comprehension of Arabic text (Bio-Medicine students)	155
Fig. 4.18b Comprehension of French text (Bio-Medicine students)	155
Fig. 4.19 Levels of comprehension: Audio text in Arabic/French	156
Fig. 4.20 Lectures in French for sciences before university level	157
Fig. 4.21 Lectures in Arabic for sciences at university level	158
Fig. 4.22 Success with lectures in Arabic for sciences at the university	160



General Introduction

Language proficiency is crucial for successful learning and obviously, as scholars believe, high rates of success in school are attested among pupils and students whose mother tongue is the language of instruction, or at least a variety that is close to the standard form of the language. This is the case of a few monolingual societies like Britain or France. But the issue of education becomes more complicated in most other societies as they are characterized with the co-existence of two or more languages. This is particularly the case of countries previously colonized by powerful nations which imposed their languages and cultures on indigenous people, subjugated them and soon made them adopt the rulers' language in all life sectors and education.

Algeria went through such domination by the French for more than 130 years, a period long enough to impose their language and turn the country into bilingualism. After indepenence in 1962, French continued to be the language of instruction though the Arabization process was soon started by the new authorities, the aim of which was to recover the society's language, culture and identity. But it was a long process as it took almost twenty years to reach university level and only social sciences, law and economics were arabized. Hard sciences, medical and technological streams are still taught in French today, which is a problematic issue we attempt to consider in this research with an overall question in mind: How can students who have had all their pre-university education in Arabic cope with scientific streams in French at university level? How can they succeed academically in a language they do not master enough as they learned it at school just as a subject?

Formal instruction has always been regarded as a useful and necessary process for children's knowledge acquisition and intellectual development following their primary socialization in the home environment and pre-school life activities. First language acquisition is a natural process and by far the most important process that children go through starting from birth. When they reach school age by six, they have already mastered, to a large extent, the two skills they use to interact with members of the family circle and the closer community: speaking and listening. Then, in primary school they get progressively acquainted with reading and writing, unless

they have gone through a one- or two-year kindergarten phase or made somewhat familiar with the written word by their parents or in whatever way, including TV sessions and website programmes. In this case, school immersion and cognitive development will be much smoother.

However, in most communities, even in monolingual ones, it often occurs that children speak a dialect that is more or less distant from the standard form used at school. Such discrepancy will cause newly-arrived pupils to face difficulties that are proportional to the distance between the two varieties: the farther a dialect is from the standard, the more uneasy the child feels in class. We presume that this was one of the reasons that led governing institutions to standardize the language, usually the dialect chosen for the process being the one used by the powerful higher class of people: the variety of English spoken in the Royal Court in Britain in the 15th and 16th centuries was forcefully selected to be implemented as the standard form for political and economic purposes, but also for formal education. As a result, children having acquired an English dialect that was different from RP would find difficulties at school and would have to adapt to the new linguistic environment.

The issue is much more acute in other types of communities when bilingual education is not part of the country's language policy: thus, minority language children have to learn another language at school, as is the case of Mexicans in the United States, for example, or Pakistanis in Britain and Algerian emigrants in France: these need much more effort than native speakers to reach an acceptable level of academic language and knowledge acquisition.

No-one can deny the importance of language in human society as a means of communication in everyday speech interaction on the one hand, and a as a crucial means in formal education, both in its spoken and written forms, on the other. As a matter of fact, after the five or six first years of life, the child will soon have to go to school with the language acquired at home. Generally, in monolingual countries where there is only one standard language, the situation is quite different compared to bilingual and diglossic settings.

All speech communities in the Arab world suffer from a similar problem. As a matter of fact, though Arabic is said to be the people's mother tongue, they are subjected to a diglossic situation as Standard Arabic is not acquired by anyone as a mother tongue. In Algeria for instance, children arrive at school with the so-called Low variety (Ferguson 1959) or Colloquial Arabic, one of the regional dialects they have acquired as a mother tongue – including Berber varieties in Berberophone areas (about 20% of the population) many of whom also learn Algerian Arabic through their contacts with the wider community. But as formal instruction is only implemented in Modern Standard Arabic (MSA hereafter), beginner pupils are faced with the hard task of learning it, almost to the same extent as learning a second language. Indeed, children have to learn the four skills of MSA, a practically new language for them. Educationists, psycholinguists and sociolinguists have considered this literacy gap which can only be filled successfully by taking account of the languages and language varieties learned at school by children.

• *Setting of the study*

It is well known that Algeria is a multilingual country and for some clear geographical and historical reasons, the use of language among its population might vary according to different factors such as geographical region, age, gender, level of education, or domains of use. In this work, we shall first largely portray the historical and sociological reasons that have shaped the current linguistic situation. Our investigation however will focus more precisely on the educational side of bilingualism. We shall investigate the use of Arabic and French in the education system and more exactly at the higher education level. It is worth noting from the start that the French language is largely used in different domains in the Algerian society as a result of the long-term colonisation; but Arabic is constitutionally the official language of the state and the so-called Modern Standard Arabic (MSA) is used as the only language of instruction in the educational system from primary school to university, while French is only taught as a subject starting from 3rd year primary school. But at university level, French is still used in most scientific, medical and technological streams, which is the main issue of our concern as students

complete their high school curriculum in Standard Arabic with some French, officially considered as a foreign language.

Linguistically speaking, Algeria has been regarded an Arab country since the 7th century when the Arabs set foot for the first time in North Africa bringing Islam as a new religion and soon implementing Arabic as a language of worshiping and later for instruction and knowledge acquisition. Due to the large body of literature and the religious values attached to it, Arabic remained – along with the indigenous varieties of Berber pre-existing there – as the national identity through centuries and the different empires that settled on this land and in the Maghreb as a whole.

It may be worth recalling that, from the first centuries of Islam on, Arabic gained ground and was adopted in many previously non-Arab countries; and, as a language of a Revelation that encourages knowledge and calls for science, it became more and more powerful as scientists delved into various fields of research like philosophy, medicine, astronomy, chemistry, mathematics, in addition to poetry and literature. Such achievements accomplished by Arab scientists, but also non-Arab Muslims, promoted Arabic as a language of science for a long period. It developed, however, into a multitude of dialectal forms, and mutually unintelligible to a certain extent in today's twenty-two Arab countries, in particular in countries where a foreign language had some impact, as is the case of French in Algeria.

• *Rationale of the study*

One important objective in this research work is to suggest a valid way out of the issue that young university students are faced with in choosing their studies after they obtain the high school degree (the Baccalaureate in Algeria). When the French came to occupy the Algerian land with the intention of making it part of France starting from the 1830's, they did all their best to eradicate the Arabo-Muslim identity and within a few decades of occupation, they implemented French as the only language of administration and education. As a result, Algeria became one of the world's francophone countries and has remained so even after independence in 1962. Today, in spite of an overall gradual process of Arabization started in the 1970s,

French is still widely used in many domains and understood by a large portion of the population, mainly among élites and educated people. Such disparity has led to the dilemma of the co-existence of, or rather the competition between, the two languages at play, Arabic and French, even at the level of state formal education where Modern Standard Arabic (MSA hereafter) is supposed to be the language of instruction.

• Problem statement

Therefore, one crucial aim of our investigation is to question a language issue in the present educational system, a two-language formula in higher education: MSA is the official language of formal instruction from primary school to university where some branches are offered in Arabic and others in French. Our aim is to try to question the reasons behind the *status quo* resulting from an interruption of the Arabization process and whether these reasons are political, educational or social. We will try to describe the historical circumstances that have led to such discrepancy in the higher educational system. Other questions will tackle the idea of whether the maintenance of French as the sole language used to teach contents in scientific domains benefits to all students or raises reactions and attitudes, in particular among students who are disadvantaged. Also, we will wonder whether another educational plan is possible to remedy the incongruity that is felt at the level of the Algerian University. Such considerations have led to a number of questionings formulated as follows:

• Research Questions

- 1. What type of bilingualism are Algerians, students in particular, exposed to or faced with?
- 2. How do students in various university settings behave in their use of Arabic and French, particularly in medical and scientific branches?
- 3. To what extent are sciences and medical students' attitudes towards the two languages reflected in their actual linguistic behaviour?
- 4. What future linguistic development and language planning can we expect for better academic achievement in today's French-taught curricula?

The following hypotheses are put forward in an attempt to bring answers to our questionings and will only be checked on the basis of the results obtained from the use of a number of research tools which hopefully will clarify the situation.

- *Hypotheses*
- ➤ 1. Depending on the level of education, residence and socio-cultural background, various degrees of bilingualism and Arabic/French codeswitching can be attested among students.
- ➤ 2. The impact of French as a language of instruction in scientific, medical and technological studies makes French and bilingual use more prevalent among students who have chosen to pursue such streams at the university.
- ➤ 3. Students' attitudes are clearly reflected in their language behaviour, i.e., positive attitudes towards French in medical, hard sciences and technological fields lead to more use of French than among students in social sciences whose attitudes may lead to the rejection of French or neglect at least.
- ➤ 4. Better academic achievement in scientific streams can only be realized if bilingual education is implemented at pre-university levels, teaching relevant contents in the two languages. Otherwise, conditions have to be met for Arabic to be put into practice in all branches at university level.
 - Layout of the research
 - Thesis structure

In the first chapter, some sociolinguistic theoretical concepts, such as speech community, verbal repertoire are exposed as these will be used in our research work. Key issues like monolingualism and multilingualism, bilingualism and bilinguality with the different outcomes including codeswitching and code-mixing. Diglossia is also considered in its different forms, but with a focus on Ferguson's classical type as Arabic is the language of the country and education are dealt with and exposed in

this first part of the work. Some light will be shed on scholars' views on these sociolinguistic phenomena up to now.

The second chapter is an exploration and description of the Algerian linguistic situation with the aim of providing the reader with an account of the nature of Algerian speech and its complexities in various contexts, with a focus on students' linguistic behaviour. We will also show that the educational system and the values that sustain it are part of the larger Algerian linguistic profile.

While the third chapter focuses on examining the three inter-related issues that are directly connected to this research, namely bilingual education, attitudes towards the languages at play and language planning, the fourth chapter exhibits the methodology of our work, depicting the research instruments that will hopefully allow us to bring to light some answers to the issues related to languages of instruction at university level. Such outcomes will result from quantitative and qualitative analyses of the data collected for this purpose.

The thesis will end with some tentative recommendations for wiser decisions from the part of language policymakers and language planners with the aim of reaching better academic achievement in education, particularly among students attracted by medical sciences, hard scientific fields and technologies.

Chapter 1 Multilingualism as a pervading phenomenon

1. Multilingualism as a Pervading Phenomenon

1.1 Introduction

Language variation has always been a natural phenomenon; diachronically through time but also synchronically as one paramount necessity in people's lives is to learn to communicate whatever the language or languages are. The more groups of people have opportunities to meet for various purposes the more their languages are in contact. These can be distinct dialects of the same language or different languages, often genetically unrelated but got related somehow, in particular as a result of trade and business, wars and colonization, emigration and tourism. The output of such relations has led to contact between languages resulting in various linguistic phenomena and eventually to what is known today as multilingualism in practically all continents, even in those that are regarded as monolingual in European countries. People in the Western world, at least those brought up in societies where the use of one language has long been the norm, tend to look down upon communities using two or more languages, believing that being a bilingual is abnormal and may result in negative consequences on children growing up using two languages. Some monolinguals accept at most the idea that learning another language is an individual matter associated with specific functions, particularly for translation and interpreting or people with a religious mission to accomplish as it occurred in colonized countries.

It is important to recall that it is the phenomenon of multilingualism which is our main concern in this research, and the definition of the apparently simple concept of monolingualism comes here only as a contrast to bilingualism to show that, although it seems the most basic and common form of code, monolingualism is a rare phenomenon in a world dominated by multilingualism. As a matter of fact, according to some researchers there are more than 6000 languages in the world spoken in just about 200 countries (Grimes, 1992). However, these are not distributed equally around the globe and even if linguistically speaking all languages have the same ability to convey meaning, not all languages have the same value politically, economically and socially speaking. For this reason, among the 6000 languages, a few are used for wider communication, not only in their primary speech communities.

In fact, as Tucker (1999) says, "Fewer than 25% of the world's approximately 200 countries recognize two or more official languages". Therefore, as a large number of the world's population uses another language in everyday communication in a non-official manner, the available data indicate that there are more multilingual speakers than monolinguals around the planet. In addition to this, in many country children are encouraged to learn a second language or even a third one as part of their education.

History, Politics, economy, demography, religion and culture are among the forces that shape a language capacity to rule over the world and to become more outstanding. This is for instance why English is the most-spoken language in the world with 371 million L1 speakers and almost 611 million L2 speakers which means almost the double are not natives. French, which is the investigated language in our research, has around 76 million who use it as a first language and 153 million speakers who use it as a second language. These and other examples show that for demographical or political reasons, some languages have been exported toward other lands making monolingualism an exception.

A number of questions worthy of interest can be raised at this level: What happens when people are subdued by a powerful nation that forcefully promotes its language? What are the outcomes of the two or more languages in contact, then? What do these 'powerless' people benefit from the colonizer's language? Will their mother tongue suffer from language shift and the death of their language? In other words, will they become monolingual in the long run or will they maintain their linguistic identity and thus become bilinguals? Outputs to these issues depend on various factors including language power and prestige in particular as well as sociocultural identities. We will attempt to make a comparison between monolingualism and bi/multilingualism, looking at how these are distinguished by scholars and laymen. But before examining settings characterized with the use of more than one language, it is worth considering a concept that is crucial in any sociolinguistic investigation, that of 'speech community'.

1.2 Speech community and verbal repertoire

Depending on the size each community is characterized with a language or varieties of a language or even more languages that people use to communicate has been handled in various definitions, which, in addition to its importance for categorizing language use in context, will allow

1.2.1 The speech community

The concept of 'speech community' has been handled in various definitions, which, in addition to its importance for categorizing language use in context, will allow us to identify bilingualism or monolingualism of a setting according to the society to which speakers belong. As a matter of fact, *speech community is* a term used in sociolinguistics to identify a group of people who speak and understand the same variety of a language or various dialects, but also two or more languages regardless of the size of the town, taking account linguistic and non-linguistic cues. In fact, for Labov (1972:120), shared norms of language use are more important than the shared linguistic norms in a speech community. In a much-quoted statement, he argues that

The speech community is not defined by any marked agreement in the use of language elements, so much as by participation in a set of shared norms: these norms may be observed in overt types of evaluative behavior, and by the uniformity of abstract patterns of variation which are invariant in respect to particular levels of usage.

In an earlier definition of the notion, Gumperz too gave importance to shared norms saying: "Regardless of the linguistic differences among them, the speech varieties employed within a speech community form a system because they are related to a shared set of social norms." (1964), though later on (1968:114) he described a linguistic community as "any human aggregate characterized by regular and frequent interaction by means of a shared body of verbal signs and set off from similar aggregates by significant differences in language usage." In this respect, Romaine (2000:23) goes further to regard a speech community as

a group of people who do not necessarily share the same language, but share a set of norms and rules for the use of language. The boundaries between speech communities are essentially social rather than linguistic.

Indeed, though there's a high degree of mutual intelligibility between Algerians and Moroccans for example, and practically the same Arabic dialects are used on each side of the border (Maghnia and Oujda respectively), we cannot consider them as belonging to the same speech community as they belong to two different nations with different socio-political structures. In fact, even within the same country, we may speak of different speech communities: given some linguistic features, but also other social norms, in Algeria the speech community of Tlemcen is very different from that of Oran which is just about 100 miles away. We may then speak of a continuum of speech communities in a given geographical area in analogy with dialect continuum. In an attempt to determine the factors that make the speech community we belong to in Algeria, Dendane Z. (2007:37) writes:

[...] the necessity to take into account both social and linguistic factors to determine what a speech community is, we may consider the Algerian people as constituting one 'macro' community organized around social, cultural and political characteristics, a multi-dimensional space in which the members locate themselves, feeling they make up a community that is set off from neighbouring communities, particularly those of Morocco, Tunisia and the other countries of the Maghreb in spite of the pan-Arabic belonging felt on a much wider dimension. But within the Algerian macro-community, limited by the Algerian national borders, smaller communities have to be distinguished on the basis of geographical areas and according to the types of varieties used.

But the first mention of the notion of speech community was, to our knowledge, that of Bloomfield (193.3:45) who also acknowledges the intricacies in defining the term. He argues that

The difficulty or impossibility of determining in each case exactly what people belong to the same speech-community is not accidental, but arises from the very nature of speech-communities. If we observed closely enough, we should find that no two persons – or rather, perhaps, no one person at different times – spoke exactly alike.

Earlier scholars had a more localised definition of the concept which implied that the group speaking the same language and using the same rules had to be at the same geographical place to share those rules. However, advances in sociolinguistics have proved that speakers can possess a range of varieties of the same language and even more than one language in their verbal repertoire. Moreover, studies were axed toward a delocalisation of the concept and have shown that individuals can participate in different speech communities at the same time. This is the case, for instance, of people whose mobility in a given country makes them communicate using dialects and languages in the various parts they visit. In fact, each individual has acquired a range of speech ways, a verbal repertoire. *The verbal repertoire*

Therefore, linguistic variation associated with norms of language use are shared by the members of a speech community, but each individual will have his/her own ways of behaving linguistically, their *verbal repertoire* which consists of a higher or lower number of language varieties, languages and speech styles; and some people may be more competent than others in their use and comprehension. The concept of 'verbal repertoire' was originally introduced by Gumperz (1964) under the term 'linguistic repertoire' to encompass the various linguistic forms used by individual speakers in everyday interaction. Suggesting how language uses are selected in accordance with social constraints, Gumperz (1964:138) says:

Ultimately it is the individual who makes the decision, but his freedom to select is always subject both to grammatical and social restraints. [...] The power of selection is [therefore] limited by commonly agreed on conventions which serve to categorize speech forms as informal, technical, vulgar, literary, humorous, etc. [...] The social etiquette of language choice is learned along with grammatical rules and once internalized it becomes a part of our linguistic equipment.

It goes without saying that the totality of linguistic forms used in a given speech community make up that community's verbal repertoire and, at the same time, each individual will have a more or less perfect command of one language or more and/or varieties of a language. As an instance, we may consider the Algerian context: the verbal repertoire of the Algerian nation as a whole encompasses Arabic with all its dialects in addition to the standard form, French with its different uses and Berber

varieties, plus English for certain uses and other foreign languages like Spanish and Italian. But virtually no Algerian citizen displays a full command of all these languages and their varieties. Each speaker has his/her own verbal repertoire.

1.2.2 The verbal repertoire

An individual's repertoire presumably does not match that of the whole community, as each speaker has gone through a specific language experience and many factors – including mother tongue acquisition and any other speech variety sooner or later, socialization and appropriate language use, formal instruction at school, communicative competence and language attitudes – are involved in the constitution of his/her repertoire and make them learn to accomplish speech acts and verbal interaction, and thus to appropriately participate in the speech community.

Subsequently, a verbal repertoire may be bi- or multilingual in certain communities, and/or diglossic for others, to various degrees and speakers constantly choose appropriate ways of communicating in a given social setting; thus, it is clear that the concept of verbal repertoire is tightly linked with whatever type of speech community. The Algerian people, for instance, share the same specific grammatical and social rules for communicating and interpreting speech, described by Yule (2014) as "a form of social identity and is used, consciously or unconsciously, to indicate membership of different social groups or different speech communities", but not every speaker is competent in the range of varieties characterizing the community. Educated people are usually more proficient in French and thus are 'better' bilinguals, or diglossic in MSA, with active or passive proficiency in the standard form of Arabic. Similarly, we can state that individual bilingualism is the capacity to master to some degree two languages while societal bilingualism is a linguistic situation where a group of people with various capacities of bilinguality interact under the same bilingual speech community.

1.3 Monolingualism and bilingualism

It is only through a process of language policy that monolingualism became a norm in a number of countries, communities where one language is used in virtually all domains and for all functions. The usual pattern is that citizens with various dialectal forms of a given language, whether geographical or social dialects, are required to use the standard form in formal domains such as education, spoken and written media, administration, political relations, etc., the aim being constitutionally decided to unify the society. Also, it is often the case when the dominant language in a country is imposed on minority communities, either indigenous or immigrants, who only use their respective languages in restricted domains like home and informal settings, but have to assimilate to the standard form, the majority language, in all public walks of life, including their children's formal education and any communication transaction whether political, economic or social.

The standardisation processes started in European countries, the rise of nation building and the spread of nationalism in the 19th century led to the ideology of 'one-language-one-nation' whose aim was primarily to unify the citizens in a given country by implementing the language of the powerful as national and official, and in this way to reduce the use of dialects and minority languages. The idea inculcated by these long-rooted views is engrained in today's society; as Romaine (2000:32) says, "The idea that multilingualism is divisive, while monolingualism is a normal and desirable state of affairs is still with us today." Indeed, in political spheres, and even in mainstream linguistics, strong emphasis is put on monolingualism and homogeneous speech communities, though actually multilingualism is much more prevalent in the world, including some so-called western communities.

But one question arises here as to Arabic in the Arab world where the standard form, MSA, is implemented everywhere as the only official language for administrative and educational purposes, though there might be some minority languages accepted as national and even official languages (e.g. Berber in Algeria).

1.3.1 Monolingualism

Monolingual is "said of a person/community with only one language, also unilingual" (Crystal 1987:425) or "a person who knows and uses only one language, a person who has an active knowledge of only one language, though perhaps a passive knowledge of others" (Richards and Schmidt 2002)¹. Although such a concept seems quite clear and easy to define at first sight, it gets more complicated when we introduce a question such as 'Is a person who speaks a standard language and a local variety considered as monolingual?" In fact, any language is a collection of varieties of that language with the standard form representing these dialects. Thus, speakers in a given monolingual community may use, or at least understand, one, two or more additional dialects of that standard. In other words, individuals are potentially bi- or multi-dialectal. Romaine (1989:8) says in this respect: "Even monolingual communities are not homogeneous since there are usually regional, social and stylistic varieties within what is thought of as 'one language'." In fact, she maintains that "most of the world's speech communities use more than one language and are therefore multilingual rather than homogeneous. It is thus monolingualism which represents a special case." (Romaine 1989:8).

The question really gets complicated when we acknowledge the difficulty in distinguishing between the two terms 'language' and 'dialect', knowing that some dialects of the same language might be less intelligible than two genetically related but distinct languages like the Romance languages, Italian and Spanish, for instance. Other questions have to be tackled to define a monolingual since some people can use only one language and one dialect but are 'passive' in other languages. In general, there is no unique definition of monolingualism that can be applied to all situations but most nations' language policies have often been clear indicators of political monolingual orientation.

All those countries are regarded today as monolingual societies in spite of the persistence of indigenous languages such as Welsh and Irish in the UK or Basque and Breton in France, or the presence of immigrants who use their mother tongues at home, but have to learn to communicate in the language of the country, French in France for example, for all other purposes in the society. Both types of citizens are forced to integrate the wider community by learning the nation's language while dialects and minority languages are seen as debased, worthless at the nation's level,

_

¹ Longman Dictionary Language Teaching and Applied Linguistics

and thus discouraged. Monolingualism was settled thus for socio-political reasons and identity whereas multilingualism was seen as disruptive of the society's identity and uniformity. In this regard, taking France as a typical example of chauvinist monolingualism, Appel and Muysken (2005:101) report monolinguals' feeling that

negative effects from being bilingual, seem to reflect a widespread attitude towards bilingualism in the Western world. Many Western countries are viewed and view themselves as essentially monolingual, although they may actually have many speakers of other languages within their borders. [...] Bilingualism is seen as an old-fashioned residue from an earlier age or as a temporary phenomenon, the result of immigration. If there is bilingualism, it is expected to fade away, and develop into monolingualism.

In fact, it is exactly the opposite that the development of human beings and language history have shown: a great number of societies have developed multilingualism all around the world in spite of the phenomenon of globalization which has made English a world language; but at the same time it is turning the world into multilingual societies, maintaining their languages and adopting English as a working language in various fields including business and economy, politics and international relations as well as academic research and scientific production.

However, these so-called monolingual speakers tended to associate bilingualism with weaknesses in thinking, with harmful effects on bilinguals' cognitive intellectual development and personality split, referred to as 'multiple identity disorder' or later on as 'dissociative identity disorder' (DID). Another negative connotation mentions deficiencies in the two or more languages used by the bilingual leading to semi-lingualism, that is, low level in mastery of the languages in question! But isn't language variability an overall phenomenon in whatever type of speech community? Hymes (1972:38) clearly claims the universality of linguistic variation and the diversity of speakers' and community's linguistic repertoire when he writes:

Bilingualism par excellence (e.g., French and English in Canada, Welsh and English in North Wales, Russian and French among prerevolutionary Russian nobility) is a salient, special case of the general phenomenon of linguistic repertoire. No normal person, and no normal community, is limited to a single way of speaking

1.3.2 Multilingualism

However, such biased views began to change when researchers had to be involved in studies on bilingualism as estimates tell us that there at least three times more multilingual people in the world than monolingual ones. Li Wei (2000:3) writes:

In fact, one in three of the world's population routinely uses two or more languages for work, family life and leisure. There are even more people who make irregular use of languages other than their native one; for example, many people have learnt foreign languages at school and only occasionally use them for specific purposes. If we count these people as bilinguals then monolingual speakers would be a tiny minority in the world today.

As a matter of fact, in recent research, specialists in linguistics, psycholinguistics and education have begun to acknowledge the benefits of bilingualism on the brain and on bilinguals' everyday socio-cultural interaction, in particular in this era of increasingly globalized world.

The phenomenon of multilingualism has long triggered scholars' curiosity, including in particular sociolinguists, psycholinguists and educationists. The reason behind that might be the fact that we intrinsically admit that each speech community has its own dialect or own language, but the interesting issue is to try to understand what happens when two codes overlap or are mixed when used at the same time, whether at the level of society or in the brain of the speaker. The use of two languages or more seems more significant as a topic of investigation and more complex than speaking one language, for the co-existence of two or more languages in a community is far more extant than entirely unilingual settings; and thus, most writings on language use are concerned with multilingual societies. Romaine (1989:1) says in this respect, "It would certainly be odd to encounter a book with the title *Monolingualism*". In an earlier statement, Gumperz (1968:435) acknowledges the existence of multilingual communities alongside monolingual ones. He defines a linguistic community as

a social group which may be either monolingual or multilingual, held together by frequency of social interaction patterns and set off from the surrounding areas by weaknesses in the lines of communication.

While sociolinguists attempt to understand the use of languages and varieties of a language in a speech community and the motivations for code switching between these, psychologists are rather interested in what happens in the brain of a speaker who uses two languages. Educationists,

on the other hand, have been investigating bilingual education showing that bilingual pupils are not at a disadvantage and may even perform in school better than monolingual children. So, some questions can be raised at this level: What are the social implications of having two or more different codes used every day in the same speech community? Is using more than one language a handicap or an enhancement? What type of pedagogical methods can be implemented in bilingual class programs? Such important questions that lead to understanding societies, the human brain and language itself have certainly shadowed the study of monolingualism which has long been regarded as the norm. In fact, considering that the majority of the people in the world are bilinguals or multilingual, and beside the efforts of standardization and unity of one language and identity for many countries, one is more likely to meet bilinguals and people who are naturally fluent in more than one language than meeting pure monolinguals who speak only one variety of a language. In a word, in today's world, it is monolingualism which is the exception.

Multilingualism is linguistically defined as the knowledge and capacity of using two or more languages by an individual or a group of people. At the individual level the use and knowledge of two languages is called *bilinguality* and it can be the result of personal achievement or as a consequence of personal needs. However, bilingualism is a wider phenomenon that happens for different reasons and among a larger number of populations around the world.

It is usually accepted that there are about 6,000 languages in the world (Grimes 1992), and according to a recent count of *Ethnologue*² (2019), there are more than 7,100 languages. However, they are not distributed equally around the globe and even if linguistically speaking all languages have the same ability to convey meaning, not all have the same value politically, economically and socially speaking. For this reason, among the +7,000 languages there are languages that are used for wider communication and not only in their primary speech communities. As a consequence, for instance, "Fewer than 25% of the world's approximately 200 countries recognize two or more official languages, with a mere handful recognizing more than two." (Tucker 1999).

² Ethnologue: Languages of the World, 2019; 21st edition. An earlier edition (2009, 16th ed.) mentions 6,909.

However, a much larger number of the world's population use another language in everyday communication in a non-official manner, in fact the available data indicate that there are more multilingual than monolingual around the planet, around 40% monolingual for 60 % of the world's population that speaks more than one language. In addition to this, in many country children are encouraged to learn a second language or even a third one as part of their education, regardless of the efforts that countries deploy in order to protect their identities; it is usually seen as a good initiative to teach children a second foreign language.

History, politics, economy, demography, religion and culture are among the forces that shape a language capacity to rule over the world or become more used relatively to the other 7000 existing languages. This is for instance why English being the second world spoken language with 371 million L1 speaker and almost 611 million L2 speaker which means almost the double of its speaker are not natives, French which is the investigated language in our research has around 76 million who use it as a first language and 153 million that use it as a second language. Other languages that are among the ten most spoken languages around the world show generally the same criteria, that is, a smaller number of L1 compared to L2 speakers. These examples show that for demographical or political reasons some languages are more and better exported toward other lands, and this is why monolingualism is becoming an exception in a world that is shifting toward global multilingualism.

In a multicultural globalized modern world, the pervading phenomenon is therefore multilingualism. Full monolingualism is becoming quite rare since people are more and more confronted with more than a language in their everyday life. It is estimated that more than half of the world's population speaks at least two languages. Multilingualism is a natural consequence of the complexity of human history through time; land conquest was one of the main reasons different cultures had to interact with each other resulting in a wide range of language contact situations. In addition to this, world trade and exchange were a natural way of spreading languages beyond their borders to other lands and cultures. However, in the modern world the spread of different languages throughout the globe and the interaction between so many

languages happens much faster than ever before, due to the media, the Internet and modern technologies that facilitate these interactions which all have led to awareness of the necessity to speak more than one language. The world is moving more toward multilingualism, though the phenomenon of globalization is supposed to result in the use of English as a global language.

1.3.3 Bilingualism: Various types

The complexity of language and its uses, the co-existence of communities of people living in different speech communities and the contact between the languages used as well as individual social and psychological features are all conducive to different sorts of bilingualism. As a matter of fact, bilingualism can be seen along a continuum from elementary use of a few words in a second language to full mastering of two or more languages. Thus, every bilingual individual can be placed at a given time in one point in that continuum in a given multilingual society.

In spite of the difficulty in measuring bilinguals' fluency in the two languages, or in one or more of the four skills, scholars have proposed some definitions of the various types of bilingualism. Different scholars' statements confirm that bilingualism has been defined on the basis of various factors: While at one extreme, Bloomfield (1933:55) considers bilingualism as "native-like control of two languages", at the other end, McNamara (1967)³ views a bilingual speaker as "anyone who possesses a minimal competence in one of the four skills." Between these two extreme positions, many other definitions have been provided by various authors who take into consideration different variables, including linguistic environment, degree of exposure to the language(s), motivation and other socio-psychological factors. For the Polish linguist Weinreich (1953:73),

[...] the ideal bilingual switches from one language to the other according to appropriate changes in the speech situation (interlocutors, topics, etc.), but not in an unchanged speech situation, and certainly not within a single sentence.

However, bilinguals in the real world can be of various types along a proficiency continuum. To try to examine how words of a language relate to concepts in the brain, Weinreich made a distinction between bilinguals in the terms

³ Quoted in Hammers & Blanc (2000:6).

'compound', 'coordinate' and 'subordinate', the first one being the case of someone acquiring the two languages in the same environment, like a child whose parents generally use the two languages interchangeably. A coordinate bilingual, on the other hand, acquires his first language at home from birth, then learns a second language in another context, at school for instance, and keeps them separate even though they may be equally proficient in the two languages, which is not the case of a subordinate bilingual who has learned another language later in life and will never be as proficient as in his first language.

In what follows, we attempt to list a few other types of bilingualism:

1.3.3.1 Early bilingualism and late bilingualism

Early bilingualism, as the term suggests, refers to a child's second language acquisition along with the mother tongue, as in the case of bilingual parents who communicate with their offspring in the two languages simultaneously. Such language development lads to strong bilingualism also referred to as 'additive bilingualism', though it can be consecutive but before the critical age of six. This latter can occur when the child moves to a new linguistic community and thus is exposed to a dominant language like French in France, for instance. This is the case of Algerian immigrants' children who have to learn to communicate in the environment and to get ready for schooling. But such exposition to the dominant language may lead to language shift and mother tongue loss.

Late bilingualism, on the other hand, refers to second language learning once the first has long been acquired, that is, after the age of 10 or 11, the critical period hypothesis (CPH) as suggested by Lenneberg (1967). Indeed, research has shown that language learning after the age of puberty becomes slower and much more difficult (Lenneberg 1967; Krashen 1975). What distinguishes the two types of language development is that late bilinguals use their primary language in learning the second one, a process that results in transfer of already acquired linguistic structures.

1.3.3.2 Additive bilingualism and subtractive bilingualism

Wei (2000:455) defines *additive bilingualism* as a "situation in which a bilingual's two languages combine in a complementary and enriching fashion", while *subtractive bilingualism* is for him a "situation in which a bilingual's second language is acquired at the expense

of the aptitudes already acquired in the first language". But it was Lambert (1975) who first distinguished between these two types that result from societal forces; he showed that two languages can be acquired in a balanced manner and thus he qualified such bilingualism as 'additive' as it enriches and complements the bilingual's linguistic capacities. 'Subtractive bilingualism', on the other hand, refers to the case of bilinguals learning a second language, usually a majority language, to the detriment of their first language as they might use it in less and less restricted domains and lose it in the long run.

We wonder what type of bilingualism today's Algerian young people are exposed to and how the two languages they learn at school affect their academic development, in particular at university level.. In fact, a central goal of this research work is to examine how students enrolled in scientific and medical streams in the Algerian university are affected by the use of French as language of instruction in these branches while all their previous schooling was offered in Arabic, though in reality French has been used to various extents in the Algerian society as a result of more than a century of colonization, to the extent that many speakers can be considered as active bilinguals while others remain passive in the use of the second language.

1.3.3.3 Active bilingualism and passive bilingualism

The adjectives used to characterize these two types of bilingualism are obvious enough; active bilingualism is also called 'productive' and describes a speaker's ability to actively use the two languages, though with various degrees of proficiency in one or the four skills depending on individual factors like education, motivation, setting of acquisition, etc. An active bilingual is usually seen as a person who can master two languages at the same time, sometimes equally well and most of the time one language being more dominant.

In contrast, a passive bilingual, also called 'receptive' bilingual, is only able to understand a second language and sometimes not fully but is in any case unable to communicate in it. He understands the second language, though partially, but is not proficient enough to be able to speak it. This is the case of many Algerians, in particular those living far from big cities where traditionally the French language continues to be used in everyday speech albeit often mixed with Arabic (or Berber in areas where this language is the mother tongue).

Although the definitions of bilingualism and this categorization of the different types of bilinguals seem to be satisfactory, researchers have shown that defining the phenomenon is in fact problematical as it only refers to the levels of proficiency and does not take into consideration non-linguistic dimensions, including psychological and social factors. A multidisciplinary approach would do more justice to defining bilingualism which Hamers and Blanc (1987), for instance have embarked on. In particular, they make a crucial distinction between societal bilingualism and individual bilingualism which they refer to as 'bilinguality', as reviewed below.

1.3.3.4 Bilingualism and Bilinguality

To reach a more satisfactory description of the co-existence of two or more languages, and given the complexity of language, particularly in situations of contact, it is necessary and more fruitful to use a multidisciplinary approach taking into account various levels of analysis, including individual, interpersonal and societal aspects, as Hamers and Blanc (2000:24) maintain. Indeed, the two authors have put forward a remarkable distinction of language behaviour in bilingual communities saying:

The concept of bilingualism refers to the state of a linguistic community in which two languages are in contact with the result that two codes can be used in the same interaction and that a number of individuals are bilingual (societal bilingualism); but it also includes the concept of bilinguality (or individual bilingualism). Bilinguality is the psychological state of an individual who has access to more than one linguistic code as a means of social communication; the degree of access will vary along a number of dimensions which are psychological, cognitive, psycholinguistic, social psychological, social, sociological, sociolinguistic, sociocultural and linguistic.

(Hamers and Blanc 2000:6)

Therefore, while societal bilingualism is an overall phenomenon pervading a given country where a significant number of people, but not necessarily a majority, are accustomed to use or at least to comprehend a second language along with their mother tongue, bilinguality is a term that rather refers to each individual's capacity to use that second language and the degree of proficiency which might be measured along a continuum of competence. Usually, speakers' bilinguality is dominant in their L1, though there might be balanced bilinguals. In fact, as Hamers and Blanc (2000:27) argue, "each individual has his own dominance configuration."

Other factors go into the characterization of a bilingual speaker, including the age and context of acquisition, the social status of the languages at play and the sociocultural setting of the community. But all these aspects may not work in similar ways in all language contact contexts. In Algeria, for instance – as we shall see in the next chapter –, historical considerations, the linguistic configuration and the sociolinguistic setting are too complex to be categorized just on the basis of societal bilingualism and bilinguality. In particular, the diglossic character of the community makes things hard to analyse, as MSA, which is not the mother tongue of anybody, co-exists with the numerous regional dialects, mostly Colloquial Arabic but also Berber varieties in some areas. The confusion that results from this diglossic situation is that the speaker's bilinguality shows in a double relation with French: MSA/French and Algerian Arabic/French. On the other hand, Arabic/French codeswitching is so engrained in people's speech that we may speak of a mixture referred to as Franc-Arabic by Bouamrane (1986) ⁴, a variety that is only understandable by Algerians and to a lesser degree by their neighbours, Moroccans and Tunisians, who have been exposed to a somewhat similar socio-historical linguistic development.

1.4 Diglossia: Various definitions

The linguistic situation in the Arab world has always been most exciting with the study of the phenomena referred to as *diglossia*. The term was introduced by the French Arabist Willam Marcais (1930), who was indeed a specialist in matters of the linguistic situation in the Arab world, though it was not the first place where diglossia was studied. Other scholars in Europe had made some reflections on the co-existence of two types of varieties within one language. As a matter of fact, language use was an important socio-political issue in Greece in the early 1920's. Sotiropoulos (1977:10) reveals that it was the German linguist Karl Krumbacher⁵ (1902) who first introduced the term 'diglossia', $\delta t \gamma \lambda \omega \sigma \sigma (\alpha \zeta)$, to distinguish between Demotiki, the people's language used in everyday conversation, from Katarevousa, 'pure language', used in the written form or in certain formal contexts. The French Greekborn philologist Jean Psychari (1928) had also examined the phenomenon in the

⁴ Mentioned in Z. Dendane (2007: 75)

⁵ Cf. Sotiropoulos, D (1977) 'Diglossia and the national language question in Modern Greece' in *Linguistics 197*.

Greek society. In his article 'Un pays qui ne veut pas de sa langue'⁶, he rose against the purist movement with Katarevousa which artificially developed from ancient Greek, while Demotiki was the vernacular naturally acquired and used by the people in everyday conversation, and then standardized to become the national language of Greece in 1976.

Diglossia was also dealt with by the French linguist William Marçais in his article 'La diglossie arabe' (1930), specifically in his description of two varieties of Arabic used in North Africa, one for the written form, the other being only spoken. This was in fact a misconception due to ideological views of Europeans as the example to be followed: however, the written form was also spoken in formal contests such as education or in government administration for centuries before colonial rule and even during the French occupation of the Maghreb; the vernacular forms of Arabic, on the other hand, were the people's real mother tongue but were also occasionally written, especially in folk literature and poetry. In this respect, in a preface to his book *The Arabic language*, Versteegh (2nd ed. 2014:vii) writes:

Since its earliest appearance as a world language in the seventh century CE, Arabic has been characterised by an opposition between two varieties: a standard language, which occupies a prestige position and is revered as the language of religion, culture and education; and a vernacular language, which serves as the mother tongue for most speakers and is the natural means of communication throughout society.

Arabic diglossia has been characterized as a good example of 'classical diglossia', as viewed by Ferguson (1959, 1970).

1.4.1 Classical Diglossia

It was Charles Ferguson who introduced the term *diglossia* in academic circles by considering it as a sociolinguistic concept in his seminal 1959 article 'Diglossia'. In fact, in observing a number of language situations, Ferguson developed a theory of the co-existence of two varieties of the same language, one high (H) and the other low (L), the first being a standard and highly codified, the reason why it is likely to be used in official formal conversation, newspapers, other media and education, and

⁶ 'A country that doesn't want its language'. My translation of the title of Psichari's article (1928).

the latter being people's language used in everyday life. The L variety is neither standardized nor codified and its only purpose is to serve non-official everyday life conversation, though there might be contexts in which it borrows items and expressions from H, in semi-formal speech in particular, and thus it deserved the label "shadings of 'middle language'" that Ferguson suggested (1970:116), especially in relation to the Arabic case when educated people discuss some higher-level topic such as religion, politics or sciences.

Among the four language situations that Ferguson examined, Arabic is the most representative of such dichotomy as the High variety has remained stable for centuries. He observes that "Of the four defining languages, Arabic diglossia seems to reach as far back as our knowledge of Arabic goes, and the superposed 'Classical' language has remained relatively stable" (Ferguson 1959a:233). Regional dialects, on the other hand, have changed through time and diverged in all directions in the vast Arab world, to the extent of lack of full mutual intelligibility between Arabs in distant geographical areas. In contrast with the High variety which is only learned through formal instruction and is no-one's native language, the low variety, in its numerous colloquial forms, continues to be acquired as a mother tongue and used for every communication.

Ferguson's original characterization of diglossia had a far-reaching influence on further studies of this sociolinguistic phenomenon and opened horizons to researchers and scholars interested in the analysis of co-existing language varieties functionally distributed in a speech community, but also in the evolution of languages and language varieties. As Ferguson himself says (1959*a*:340), studying diglossia "is of clear value in understanding processes of linguistic change and presents interesting challenges to some of the assumptions of synchronic linguistics." His deep insights into this social/linguistic phenomenon sparked a great number of studies about various parts of the world.

In addition, in the views he developed in his 1991 'Diglossia revisited', he advocated to expand the scope of the study to include, as he says, "the relations between linguistic structure, language use, and language attitudes on the one hand and phenomena of

social organization and communicative functions on the other." (Ferguson 1991:230). Undeniably then, one objective Ferguson had in categorizing a typology of sociolinguistic situations was not only to consider diglossia as a descriptive concept of language co-existence, but also leading "toward a more general theory of language in society." (ibid. p. 232).

As a matter of fact, scholars found in the concept of 'diglossia' what could explain some characteristics of languages and language varieties co-existing in a speech community, in particular their allocation to different functions, that is, their complementary distribution, though they might be genetically unrelated or representing stylistic differentiation. Two interesting questionings were raised by Ferguson in his classical article: "How does diglossia differ from the familiar situation of a standard language with regional dialects? How widespread is the phenomenon of diglossia in space, time and linguistic families?" (1959a:336). Such questions have indeed been addressed by a number of linguists who have considered speech communities where the relationship between the languages or language varieties is different from Ferguson's original characterization of diglossia in the Arabic context in particular. In a much similar way, Fishman (1989:196) addresses the issue of diglossia "to determine when and to what extent it does obtain, how it came into being, what its consequences are relative to a particular focus of interest, which factors tend to strengthen or weaken it". Ferguson's issues have thus prompted huge work on diglossia in books and articles on various types of sociolinguistic situations in the world.

1.4.2 Other views on Diglossia

A diglossic situation obtains in societies where two varieties of the same language are used in complementary distribution, i.e., for different functions, as explained by Ferguson in the classical use of the term, which is to be distinguished

⁷ Cited in Hudson (1992:612).

from bilingualism on the one hand and stylistic differentiation within one language on the other. However, thanks to Gumperz (1960's), Fishman (1967) and others, the vision of diglossia developed to include other types of language settings for some similarity to the original characterization.

1.4.2.1 Extended diglossia

Fishman (1967) expanded the concept of diglossia to situations where two genetically unrelated languages display functional distribution, in the same way as for classical diglossia, although Ferguson had thought of extending the principles of diglossia to bilingual settings when he wrote that he did not make any attempt "to examine the analogous situation where two related or unrelated languages are used side by side throughout a speech community, each with a clearly defined role (1959:235). Fishman (1967:29), however, admits that it is Gumperz (1960's) who

is primarily responsible for our current awareness that diglossia exists not only in multilingual societies which officially recognize several "languages" but, also, in societies which are multilingual in the sense that they employ separate dialects, registers or functionally differentiated language varieties of whatever kind.

But we must acknowledge that such awareness was clearly expressed in Ferguson's original article, though the author's aim was to characterize 'pure' diglossia with specific characteristics, in particular those reflected in the Arabic-speaking world. What is meant by 'pure' diglossia encompasses the following features:

- The two varieties belong to the same language;
- the diglossic situation is stable and lasts for generations, even centuries;
- the High variety is not acquired as a mother tongue, but is learned at school;
- the Low variety has no prestige and is seen as a 'corrupt' form of H;
- the linguistic features of L are simplified at all levels;
- there might be semi-formal contexts in which the two varieties are mixed.

As for Fishman's 'extended diglossia', the focus is on the unrelatedness of two languages with functional differentiation in a speech community and lack of prestige

for L in contrast with the power of H. This type was also referred to as 'out-diglossia' by Kloss (1966) as opposed to 'in-diglossia' for the classical model, and later on by Scotton (1986) as 'broad' diglossia vs. 'narrow' in Ferguson's 1959 version.

The Paraguayan society with its bilingual setting is often mentioned in relation to extended diglossia represented by Spanish as H, language of education, formal settings, public administration, spoken and written media while Guarani, the language of the autochthons, is the L vernacular used in everyday communication and informal settings. Attempts of giving more prestige to Guarani have failed and Spanish remains associated with power, prestige, education and upward mobility and thus the two languages co-exist in Paraguay in a diglossia relationship.

Indonesia provides another interesting example of extended diglossia as after independence in 1945, the Malay language was chosen by the government among a multitude of other languages and dialects. Malay had been a lingua franca for a long time and thus the objective in adopting it as the national official standard language was to reach some sort of uniformity in an extremely diverse society with innumerable languages and varieties used for everyday communication maintaining therefore a situation of diglossia.

1.4.2.2 Triglossia

The Indonesian context has also come to be characterized by what is termed 'triglossia', a situation in which three languages or varieties are in use in a community, each for some specific purposes. Used by a large number of speakers, the colloquial variety named Bahasa Jakarta is becoming increasingly standardized and thus acquiring a certain degree of prestige, though not to the higher level of Malay Indonesian. We may perhaps obtain the triglossic pattern H - M - L, high, middle and low, in so many other settings, including a number of Algerian speech communities with MSA, Algerian Arabic and a Berber variety. This tri-dimensional combination was in fact suggested by Fasold which he also termed 'double- overlapping diglossia' (1984: 44-45) as it involves three levels.

Such considerations lead to posing the question: What then makes di/triglossia differ from bilingualism when in a bilingual community, speakers use one or the other

language for similar functions and when the two languages have been acquired natively or almost as two mother tongues? Isn't an Indonesian who masters both Malay and Bahasa a bilingual when he uses the two languages perhaps for the same functions, particularly now that Bahasa has been standardized?

This can be the case of Algerian Kabyle children born and living in Algiers, for instance, who acquire their Berber variety in parallel with Algerian Arabic during their socialization process, and then use the two languages interchangeably. Where then can we put the boundary between the two linguistic phenomena? In any case, both bilingualism and diglossia can be considered as dynamic, constantly changing as the country's politics, culture and ideologies move forward.

1.4.2.3 Stylistic Diglossia

The concept of diglossia has had such powerful impact in sociolinguistic studies that it was applied even in monolingual situations where the standard form of the language can be seen as H, used in education, administration and formal contexts – except for speakers who have acquired it as a mother tongue, RP English for instance in Britain –, and the various dialects of that language as L. In fact, this type can clearly be considered in terms of stylistic differentiation as most speakers will usually switch from L in their informal everyday interaction to H, the variety of formal settings. English and French speech communities, for instance, could be representative of what can be termed 'stylistic diglossia'. As a matter of fact, the creolist William Stewart (1962) had already drawn a parallel between diglossic functional distribution and stylistic variation, which led to the idea that there is only a difference of degree and kind. Indeed, Fishman (1968:45) argues in this respect that "Most of Europe is still marked by such diglossia if we recognize differences between dialectal varieties (utilized when one is among family and friends) and the national standard (the language of school, government and "high" culture).

Thus, diglossia has been regarded as an overall phenomenon that applies to various types of society as long as the co-existing languages or languages varieties, whatever their structural linguistic relationship, are characterized by functional

distribution and level of prestige and speakers, aware of such differentiation, choose to use one or the other language, variety, register or style according to the social context and the sociolinguistic norms accepted in the community. In fact, there might be situations in which they communicate by switching between the codes in the same conversation. Such linguistic behaviour, referred to as *codeswitching*, is a phenomenon that has long attracted scholars' attention, as we shall see below.

1.5 Language contact phenomena

One major goal that sociolinguists have always attempted to reach is to fully understand the linguistic outcomes resulting from languages in contact in various types of speech communities (Weinreich 1953, Haugen 1953, Ferguson and Gumperz 1960, Gumperz 1964). The other aim that ensues then is to examine the sociohistorical development of linguistic situations resulting from political and socioeconomic factors, and the social forces that lead to changes in people's linguistic practices, including borrowing, bilingualism and code alternation on the whole. The Algerian linguistic contour can be taken as an interesting example that displays some of these language contact phenomena, in addition to its diglossic nature as a long-lasting feature, resulting from the historical events that have shaped this country, including conquests and wars as well as today's globalization impact.

Language contact is manifested in various domains of research including language acquisition, bilingualism and codeswitching, social functions of language, discourse analysis, diglossia, language change, language policy and even pidgins and creoles. Numerous scholars have developed theories on contact linguistics since the pioneering works of Weinreich (1953) and Haugen (1953), some interested in synchronic studies of individual and societal bilingualism (Grosjean 1982, Hamers and Blanc 1989, Romaine 1989, etc.) and others focusing on diachronic aspects of contact-induced language change (Appel and Muysken 1987, Thomason and Kaufman 1988, etc.). Contributions on codeswitching studies in bi- and multilingual

communities have been of central interest in further research (in particular Myers-Scotton 2002b, Winford 2003 and Clyne 2003).

From a diachronic perspective, language contact phenomena have often been viewed in terms of a continuum from single-item lexical insertion or loan words, as a first stage integration from the other language, to stable balanced bilingualism and fully competent codeswitching (Myers-Scotton 1993b; Matras 2009). One central aim in the study of the co-existence of linguistic systems in a given repertoire is the speaker's code choice in a communicative interaction and the factors and motivations that shape that interaction.

Synchronically speaking, speakers who have a good command of a second or foreign language are continually faced with the choice, from the verbal repertoire they possess, of which code to use in a given context, or continually switch the two codes and mix them, sometimes even sub-consciously, unless they are aware the interlocutor does not understand the 'other' language. As Matras (2009:4) assumes,

bilingual (or multilingual) speakers have a complex linguistic repertoire of linguistic structures at their disposal. This repertoire is not organised in the form of 'languages' or 'language systems'; the latter is a meta-linguistic construct and a label which speakers learn to apply to their patterns of linguistic behaviour as part of a process of linguistic socialisation. Rather, elements of the repertoire (word-forms, phonological rules, constructions, and so on) gradually become associated, through a process of linguistic socialisation, with a range of social activities, including factors such as sets of interlocutors, topics, and institutional settings.

It is worth noting here that language contact outcomes had not been given importance until the 1970s as these were regarded as signs of language incompetence, deviant from the monolingual model of Chomsky's 'ideal speaker-listener' and 'homogeneous speech community' (Chomsky 1965). Weinreich (1953:73), for instance, had considered switches between two languages as "transfer of words" and studied them as mere cases of 'interference'. Before him, Haugen too (1950:211) had overlooked switching and mixing codes, regarding them as abnormal language practices:

Except in abnormal cases speakers have not been observed to draw freely from two languages at once. They may switch rapidly from one to the other, but at any given moment they are speaking only one, even when they resort to the other for assistance. The introduction of elements from one language into the other means merely an alteration of the second language, not a mixture of the two. Mixture implies the creation of an entirely new entity and the disappearance of both constituents; it also suggests a jumbling of a more or less haphazard nature.

Thus, Haugen strongly argued against 'mixed' or 'hybrid' language. Rather, he regarded any foreign linguistic item that entered a native language as a 'borrowing', which he defines "as a process involving reproduction" (ibid. p. 212).

Borrowing, as a matter of fact, was examined extensively as a phenomenon that did not 'disturb' the language and may even enrich it with lexical items that refer to unknown concepts or objects, whether these are cultural, technological or even prestigious, used along with the existence of equivalent items in the receiving language.

1.5.1 Borrowing

Languages the world over and at all times have presumably always borrowed and / or lent words as a result of shorter or longer contact with others peoples, their languages and cultures, to the extent that some languages, like English for example, possess more lexical items from other languages than their own. To identify borrowed words and sound changes they may have gone through, etymology came into existence as an essential tool within comparative historical linguistics using philological methods of research and later on dialectological data (Whitney 1881, Sapir 1921, Bloomfield 1933, Haugen 1950, Weinreich 1953).

The phenomenon of borrowing has been analysed from various perspectives, including the vocabulary, phonology, morphology of the loanwords, for a better understanding of 'how languages influence one another' (Sapir 1921). In fact, several earlier studies had shown how borrowings entered languages like English and how these were structurally transformed through time as a result of the different phonologies and morphologies in particular. Apple and Muysken (2005:153) agree

to say that "words are borrowed in a fairly abstract shape, which is then mapped onto the sound patterns of the language."

A good example can be taken from the Algerian context: the French word 'pompe' entered the Algerian Arabic language (AA) as a necessary item to refer to a mechanical or electrical pump introduced during the colonization as a tool that draws water. Given the lack of the voiceless bilabial plosive in Arabic, [p] was spontaneously replaced by its voiced counterpart [b] and the name of the device was pronounced [bumba]⁸. But soon it became [pumpa] to avoid the confusion with French 'bombe' which was then pronounced [bumba]. One outcome of this type of interference is that Algerian Arabic gained the /p/ phoneme in its inventory. Many other loanwords have entered the Algerian speech community by necessity, also termed 'cultural borrowings' by Myers-Scotton (1993b) as they are new concepts for which no established equivalents are used in Arabic. The French word tracteur (tractor) with some phonological adaptation [trektu:r] integrated the language along with this vehicle which Algerians did not know. Such loanwords continue to be used in spite of the Arabization project started after independence, proposing from Arabic terms that perfectly fit: جرّ from the verb جرّ 'to draw or drag' for 'tracteur' and from the verb ضخ 'to pump or drain' for 'pompe'. These are in fact seen as loan translations as they are literal renderings of the 'cultural' borrowing adapted into the Arabic pattern.

A large number of lexical borrowings related to Islamic background have recently entered European languages even though some words or expressions may have equivalents: *Hijab*, for instance, may be referred to as 'veil' in English and 'voile' in French, but that does not faithfully represent the concept known in Islam, i.e., the traditional Islamic hair cover that Muslim women wear outside.

Another motive for borrowing items from a donor language is prestige. The receiving language readily welcomes words from a language of higher status, in

⁸ The final vowel [-a] in [bumba] reveals a morphological adaptation of the loanword, as it represents the feminine suffix in the Arabic pausal form in nouns.

particular that of the colonizer, French in Algeria during the imperialist era, for instance, but also a language that is perceived as a world language, as in the case of English today. Such integration is not a necessity as it occurs when words exist in the recipient language: *Week-end* is a good example that is used in many languages, including French and Arabic dialects.

These and all other types of language loans show, as Collinge (2006:528) says, that "lexical borrowing is the readiest kind of interlingual interference." But the process does not stop at the level of single-word acquisition. Innumerable cases of communities have been faced with intense language contact which in the long run results in the more sophisticated phenomena of bilingualism and codeswitching, but also some dramatic processes of contact-induced change and language shift.

1.5.2 Codeswitching

One of the most direct and evident phenomena resulting from bilingualism is codeswitching (hereafter CS). Nearly all bilinguals around the world engage in the activity of switching back and forth from one language to another or mixing them in their everyday speech. What is interesting in this language practice is that speakers might do so almost without being fully aware of the operation. That is, in a bilingual community, the continual switching and mixing of the languages become like a third code that people use to communicate. CS has probably always existed whenever two languages were in contact and users of the two or more languages must have commented on it or at least noticed its uses and practice in various types of interaction and social settings. But it was only when linguistics became a modern established science starting from the early 20th century that scholars started studying systematically the ways people codeswitch and the reasons for doing so.

The phenomenon of code switching, an eventual consequence of language contact situations, is likely to happen when two languages have sufficiently been in contact and the speakers may be relatively fluent in a second or foreign language. Some linguists (e.g., Aronoff and Miller 2003) argue that bilingual speakers use CS

as a communicative option quite comparable to monolinguals who switch between dialects or even styles of the same variety.

It was in the late 1960's and early 1970's that linguists started showing interest in the study of codeswitching between language varieties in everyday conversation, but similar principles of code alternation were relevant in CS among bilinguals. Gumperz and his associates are regarded as pioneers in systematic investigations of CS, acknowledged as widespread use in communities with different language varieties or languages, with the aim of putting forward a theory of CS from an ethnographic perspective. Indeed, given the importance and pervasiveness of codeswitching, Milroy and Muysken (1995:7) describe it as "perhaps the central issue in bilingualism research".

In their seminal paper 'Social meaning in linguistic structures: codeswitching in Norway', Blom and Gumperz (1972) showed the tight relationship between linguistic structure and social meaning in the ways people in Hemnesberget (Norway) switched between the local dialect Ranamål and the standard form Bokmål selecting one or the other variety according to the context: to signal self-identity and pride in local Ranamål and switch to Bokmål which is associated with power, education and non-local values. The authors proposed the terms situational codeswitching and metaphorical codeswitching to differentiate, respectively, between the tendency to switch codes when the setting changes and those when the topic changes. A teacher in class will use the standard form (MSA, for instance) but will certainly switch to a colloquial variety with the students outside. But a metaphorical switch will occur even in the same setting if the conversation moves to a topic that requires another code. Here in Algeria, interlocutors in an informal discussion will certainly switch to standard Arabic (MSA) to refer to religious themes and comments or domains which dialectal forms cannot handle; doctors will always switch to French to talk about professional matters and issues which usually they are not able to explain in Colloquial Arabic or in MSA.

However, here in Algeria, and in multilingual settings in general, language switches and code alternations cannot be explained only in terms of Blom and Gumperz' principles as the grammatical rules governing the switches and the social and pragmatic features that operate in CS become much more complex, and thus, the theoretical approaches and methodologies have to be developed outside the monolingual context. As a matter of fact, researchers in various disciplines –including in particular sociolinguists and psycholinguists, linguists and discourse analysts – are involved in the investigation of CS which in fact has helped in understanding multilingual linguistic behaviour and code choice patterns. Such code selection patterns have been associated with *domains*, an early concept put forward by Fishman (1971) with the aim of explaining language use in relation to functions in multilingual contexts and social situations. He defines 'domains' as follows:

Domains are defined, regardless of their number, in terms of institutional contexts and their congruent behavioral co-occurrences. They attempt to summate the major clusters of interaction that occur in clusters of multilingual settings and involving clusters of interlocutors. (Fishman 1972:441)

The few domains identified by Fishman include family, education, employment, administration and government, but within each of these 'clusters of interaction', there might be sub-domains: in an Algerian family domain, for instance, code selection and switches will certainly depend on other factors such as topic, peers, social distance, etc. In addition, in a regular conversation, the switches from one code to another might be so rapid to the extent that interlocutors are often hardly aware, their utterances being often mixed at various boundaries in the sentences, a linguistic behaviour that has led scholars to propose different types of CS.

1.5.2.1 Types of code switching

Early research in CS (Blom and Gumperz 1972) focused on the relationship between code selection and mixing languages or varieties with social meaning and social context and thus tried to understand the situational variables that affect the occurrences of switches, their frequency and their motivation. Such sociolinguistic approach obviously goes in line with Labov's paradigm (1966, 1972) whose aim was to analyse language variation by studying the social distribution of linguistic variables to understand how and why they correlate with social factors. Labov's techniques for

intralingual investigation can be applied to situations where two or more languages co-exist in the community, the aim being to comprehend the way speakers switch codes.

However, Blom and Gumperz' early 'situational switching' considerations (ibid.) were not involved in studying the structural side of CS, though later on Gumperz (1976) got interested in grammatical aspects, particularly when he came up with the label *conversational switching* which he defines as "the juxtaposition within the same speech exchange of passages of speech belonging to two different grammatical systems or subsystems" (1982:4), in addition of course to his focus on the communicative aspects of CS. These structural properties of CS soon started attracting an increasing number of scholars after the issue of explaining code switches from a socially-oriented perspective. Correlations in linguistic terms were first examined by distinguishing in particular two types of switching: *intersentential* CS and *intrasentential* CS (Poplack 1980).

• Intersentential CS occurs at sentence boundary or even at clause boundary, i.e., when the speaker utters a sentence or clause in L1 then switches to L2 for another sentence or clause (French in italics) as in

```
(1) manqadt∫ ndʒi dərwək. Je suis fatigué. "I can't come now. I'm tired."
```

```
Or in (2) A: Tu as vu le film? B: ma3dʒəbni∫ bəzzæ:f "A: Did you see the film?" B: "I didn't like it much."
```

It is a clear that in (1) there is no mixing of the languages in the speaker's two utterances; and in (2), A's question is in full French while the reply comes in full Arabic. In (3), the switch occurs at clause boundary:

```
(3) Ben.. ça n'a pas marché Slayatər ma kuntʃ ħafəđ "Well, it didn't work because I hadn't learnt (my lessons)."
```

Such exchanges of 'real' codeswitching are usually heard among relatively balanced bilinguals, i.e., those who appear to be competent enough in L2 as opposed to those who have a rather weaker command of the second language, though

spontaneous speech from Algerian bilinguals, for instance, tells us that they are competent enough to avoid violating the grammars of the two systems (Arabic and French). As a matter of fact, Poplack (1980:581) showed that her quantitative analysis of Puerto Ricans residing in the US "revealed that both fluent and non-fluent bilinguals were able to code-switch frequently and still maintain grammaticality in both L1 and L2." Then, she adds (ibid.):

While fluent bilinguals tended to switch at various syntactic boundaries within the sentence, non-fluent bilinguals favoured switching between sentences, allowing them to participate in the code-switching mode, without fear of violating a grammatical rule of either of the languages involved.

Non-fluent bilinguals tend to mix linguistic items of the two languages at any point within the sentence, clause, phrase and word boundaries, though there are constraints that prohibit certain switches. This linguistic practice of merging elements of two grammatical systems⁹ is sometimes referred to as *code-mixing*, but Poplack (1980) refers to these as 'intrasentential'.

• Intrasentential CS

As indicated above, intrasentential CS occurs within the sentence, at various points including word boundary, e.g., the loan verb *checker* ('to check') used in Quebec with the French infinitive morpheme marker -er). Here's an example of intrasentential CS from AA/Fr CS:

(4) ki ta\(\text{ref } les bons endroits\), tem\(\text{i} takul \(\delta l'aise\).

"When you know the good places, you go and eat at ease."

More interesting than intersentential CS, intrasentential CS has been investigated by various scholars using different approaches, in particular to know whether the switches are insertions into the base language or alternations. Various models have been proposed, in particular by Poplack (1981) with her *free morpheme* and equivalence model to explain the feasibility of the switch in terms of bound morpheme, and the grammaticality of the utterance with respect to the two languages.

_

⁹ Cf. Muysken, P. (2000).

The Arabic definite article, for example, is not usually permissible with a French noun, unless it is a borrowing adapted phonologically and morphologically

- (5) ſraha mə *la maison* >> "He bought it from 'the house' (the firm)."
 *[əl mezõ] is not acceptable, but the borrowing [əl kæmju] ('the truck') is normal.
 However, there might be some counter-examples in which the Arabic definite article *el* is acceptable with nouns that are not adapted to Arabic phonology and morphology, even in cases of lexical codeswitching, as in
 - (6) rani bəddəlt əl passeport 'I have changed the passport'

Another approach to intrasentential CS was put forward by Myers-Scotton (1993a); it is the Matrix Language Frame model (MLF) which claims that in codeswitching there is always a dominant language or base language (BL) and an embedded language (EL). The speaker is usually more proficient in the BL, their mother tongue in principle, though there might be counter-examples, particularly when the conversation topic is better undertaken in an L2. An Algerian educated speaker will better discuss politics, for instance, in French with AA elements inserted as EL. Consider this sentence:

(7) Le but de cette politique huwa ndiru des partis vraiment démocratiques. The aim of this policy is to create really democratic parties.

Myers-Scotton's (1993b) markedness model (MM) is also worth mentioning: it tries to explain CS in social psychological terms and to reflect on the norms and roles for speakers' appropriate linguistic behaviour and how they exploit language use in terms of 'marked' vs. 'unmarked' choices according to setting, interlocutor, topic... In fact, one aim Myers-Scotton had in proposing the markedness theory was to explain code-switching in terms of social motivations in the speech community. She considers that the MM "views linguistic choices as "negotiations of identity" and "attempts to explain language choices as negotiations of self-identity and desired relationships with others." (Myers-Scotton 2006:154). Indeed, as far as self-identity is concerned, Coupland (2001:201), who acknowledges the association between style and dialectal differentiation, states however that it is "equally likely that the designing of acts of linguistic display would be geared to the speaker's *self*- perceptions,

projecting various versions of his or her social and personal identity." That is, emphasis is put on style as self-identity

Other linguists proposed other views on and models of CS, some criticizing others, as the phenomenon of code alternation is so complex, a complexity that results from so many factors, including degree of bilinguality, age, context, identity and so on.

• Extrasentential CS

Another type of switching is identified as *extrasentential* and also referred to as 'tag switching' because it concerns a single word or a tag phrase from the other language. A French tag expression often used in Algerian common speech with no real lexical meaning here is *ça va?*¹⁰

(7) ma nyəllih jəl sab m sak, ça va? >> 'I won't let him play with you, all right?'

In fact, these various types of switching occur often motivated by different functions and goals in everyday speech interaction, though speakers may even switch without conscious awareness. Also, they may choose L2 to be dominant, while L1 becomes embedded, depending of course on such factors as topic, setting and interlocutor. Such language behaviour in its extreme complexity has been referred to as 'bilingual mode' by Grosjean (2001) who says that

given the high level of activation of both languages in the bilingual mode, not only can codeswitches and borrowings be produced but the base language can also be changed frequently, that is the slightly less activated language becomes the base language and vice versa. A change of topic, of situation, of interlocutors, etc. may lead to a change in base language.

(Grosjean 2008:44)

As a matter of fact, regular speech interaction practices in Algerian communities make up what Grosjean calls 'bilingual mode', though there might be situations in which the speaker turns to a 'monolingual mode'; but this only occurs

¹⁰ In fact, the question « ça va ?" is very often used by Algerians to ask about someone's health or situation.

in some contexts in which constraints make the speech quite 'unnatural', as in a court session or a Friday sermon where MSA is used or at most an Arabic middle variety that is free from French switches and borrowings. In a classroom context as well, teacher and pupils are aware that switches and loanwords are not allowed.

We can thus visualize Algerian people's speech interaction in terms of a continuum consisting of a monolingual mode at one end – the speaker in this case takes into account a number of constraining factors such as the setting and the interlocutor, for instance, and deactivates the other language –, and a full bilingual mode at the other end. But in spontaneous situations of speech interaction, it is a whole array of AA/Fr code-mixing that can be observed with its numerous switches to, and uses of, French sentences, single lexical items and borrowings.

1.5.2.2 Codeswitching vs. code mixing

Many misconceptions and much confusion are reported about phenomena resulting from language alternation of linguistic elements of two or more languages, not only among language students, but also in research circles as scholars do not always agree on fixed definitions. In fact, while the two terms *codeswitching* and *code mixing* are often used interchangeably, some researchers in bilingualism insist on distinguishing them. In particular, code mixing has sometimes been referred to as intrasentential CS, as the speaker inserts small linguistic elements, words or short expressions; but true CS is intersentential where the switches occur at sentence or at least phrase boundary (Poplack (1980).

One distinction worth mentioning lies in the view of codeswitching as being associated with sociolinguistic factors and thus with the bilingual speaker's linguistic performance, while code mixing is described in terms of formal aspects of language structure (phonological, grammatical, lexical), i.e., linguistic competence. Muysken (2000:1) prefers using the term 'code-mixing', instead of the term 'intrasentential codeswitching', to refer to "all cases where lexical items and grammatical features from two languages appear in one sentence."

In contrast, Grosjean (2008, 2018) believes that these various outcomes or 'categories' (borrowing, CS, code mixing) are better understood when we take into account "the bilingual's language modes"; a bilingual is viewed as a speaker 'moving' along a continuum of language practices: one language is deactivated when interacting with a monolingual to a full activation of the languages used in the community when talking to a bilingual. This is obviously the case of speakers in the Algerian context when they are aware of, or guess, the interlocutor's verbal repertoire. A native speaker of Tizi-Ouzou (Kabylia) will most probably not use Berber when interacting with, or even in the presence of, non-Berber speakers.

1.5.3 Other linguistic outcomes

In addition to the phenomenon of multilingualism that pervades the world in its various forms, a phenomenon that results from the contacts of people and their languages, other less ubiquitous outcomes of language contact can be briefly stated in the following.

1.5.3.1 Pidgins and Creoles

One interesting and peculiar outcome of language contact has been referred to as 'pidgin', a language practice that comes into being under unusual conditions. A pidgin is a simple form of speech that emerges from the contact of people with no common language and from the necessity to communicate, and thus it plays the role of a lingua franca. Todd (1974/1990:1) provides a simple but clearly impartial definition when he says: "A *pidgin* is a marginal language which arises to fulfil certain restricted communication needs among people who have no common language." Trask (2007:221), on the other hand, came up with an objective but somewhat debasing description of pidgins, writing that

A pidgin is nobody's mother tongue, and it is not a real language at all: it has no elaborate grammar, it is very limited in what it can convey, and different people speak it differently. Still, for simple purposes, it does work, and often everybody in the area learns to handle it.

Typically, pidgins are ephemeral, though some have survived in lands previously colonized by Europeans; a pidgin tends to disappear when there's no more need for its use if the two parties, usually tradesmen or slaves in the past. A pidgin may also eventually evolve into a 'Creole' when a pidgin speech community gets somewhat stabilized and the children start acquiring it as a mother tongue.

A Creole is a relatively stable language that developed from a pidgin, particularly in colonial plantation settlements, on mixing two or more different languages, one of these being the European colonizers' language, mostly English, French or Spanish. In spite of the low esteem given to Creole languages, some have been standardized and become official languages like Haitian Creole of Haiti and Tok Pisin, one of the official languages of Papua New Guinea. However, the literature reports a number of other Creoles that are extinct today, mostly because of their stigmatization, and thus these have been replaced by the more prestigious language of the 'masters', English in particular, though in various forms closer or farther from the standard of the base language.

One wonders why similar processes of pidginization and creolization did not occur during the French colonization of Algeria and the Maghreb. One obvious reason lies in the high prestige of the Arabic language which the Muslim indigenous populations cared so much about, particularly for its association with Islam and the Qur'an. Since the inception of the occupation of Algeria, the French rulers had done all their best to eradicate both Arabic and the religion. The French minister Rambaud (1897) said that the third conquest would be realized through school¹¹, but they only succeeded in turning part of the society into a bilingual one by the early 20th century and towards independence in 1962, as we shall see in the next chapters.

1.5.3.2 Language shift and language death

Language death is the extreme outcome of linguistic contact and mostly occurs in a gradual process that usually begins with language shift; that is, because of cultural assimilation and interaction with a higher prestige language, or language imposition

¹¹ Paraphrased from Rambaud's words "La troisième conquête se fera par l'Ecole" (1897).

by the powerful, speakers in a given community gradually abandon their native tongue, using the dominant language and eventually lose theirs altogether. This is the case of native American Indian languages, Manx in Britain. It is worth noting here that many communities in most parts of North Africa were formerly Berber-speaking but lost their languages with the acceptance of Islam and Arabic.

1.6 Conclusion

One aim of this first chapter has been to show that, in spite of the attention attached to monolingualism in the Western world, societies are rather characterized with the universal phenomenon of multilingualism. The co-existence of two or more languages and resulting language variations make up the norm in today's world, though most research on languages were until recent times undertaken on the basis of monolingual standards. Disapproving of such monolingual views, Grosjean (2008:12), for example, says that "researchers have invariably used the monolingual child as the yardstick against which to judge the bilingual." In fact, it is only through a wholistic view of multilingualism that we can fully appreciate bilingual speakers' competence and performance in various settings and their specificities as communicators in contrast with monolingual individuals.

This chapter has thus considered monolingualism in contrast with bilingualism in its different forms some of which making up the core of our research in the university setting along with diglossia, another language situation that characterizes the Algerian sociolinguistic profile and all other Arabic-speaking countries. We have also dealt with phenomena that result from language contact including borrowing, code-switching, code mixing, language shift and other outcomes.

The next chapter is devoted to concepts related to language planning and language attitudes, two areas that are of chief importance in this research work on the implementation of Standard Arabic at all levels of pre-university instruction but the use of French in a number of scientific, technological and medical branches in tertiary education.

Chapter 2 Historical Background and the Algerian Linguistic Profile

2. Historical Background and the Algerian Linguistic Profile

2.1 Introduction

This chapter is dedicated to a recount of the major historical events which are briefly depicted to show how they have shaped modern Algeria, and therefore somehow made of it what it is today, socially and linguistically. These have led to the characteristics of the country we know today in particular on language matters. As it is well-known, due to its geographical position, Algeria was destined to be a place where several cultures and empires would meet, merge and face each other: this often resulted in historical and linguistic complexity over time. Indeed, in order to understand the development of the Algerian society and its linguistic complexity, it is necessary to go over its historical development and to pinpoint the most important milestones.

The first part of the chapter will provide an overview of some of these events, mainly depicting Berbers' lives, the natives of the land, and their many struggles against and conflicts with great empires of ancient times. The Tamazight language, today's second official language in Algeria, was spoken all over the area of North Africa with its different varieties. The least we can say is that this language and culture have resisted so many civilisations and is still today a major part of the Algerian linguistic profile. We shall also describe, partially, the main historical events that made Arabic become the main language of the area. Finally, we shall talk about the arrival of the French and the implementation of the French language which will remain part of the Algerian sociolinguistic profile long after independence.

The second part of the chapter will be devoted to an account of the Algerian sociolinguistic contour with all the complexities that resulted from various events and foreign occupations throughout its history. As a matter of fact, in addition to the Berber-based languages, which were indigenous to the country before the arrival of the Arabs and then the French, Arabic and French have made the sociolinguistic profile extremely complex.

2.2 Historical overview

The prehistoric period is not very well known by archaeologists as proofs are missing. Meanwhile, some research suggests that traces of early human presence in Algeria goes back to 1.8 million years ago with the discovery of stone tools found in Ain Hanech (Located in the High Plateau in Northeastern *Algeria*) in 1992. Earlier in 1954 archaeologist C. Arambourg discovered bones that dates back to 700,000 years ago. Archaeological researches demonstrate the existence of a Neolithic civilization that developed in Saharan and Mediterranean parts of North Africa between 6,000 B.C and 2,000 B.C. Traces of these civilizations can be witnessed in Tassili Najjer cave paintings situated in Southeastern Algeria.

It is necessary to understand the importance of the geographical location of Algeria as this played a major role in its historical development and therefore in today's linguistic complexity. Situated in North Africa, facing the Mediterranean Sea, the land was indeed a portal to multiple eastern and northern civilizations which colonised, traded and settled for a longer or shorter period, successively leaving a rich history in the area. However, early pre-historic periods had little or no palpable effect on the linguistic situation in Algeria.

The languages that prevail today in the linguistic picture include the Berber language varieties of course, Arabic, spoken in its Algerian Arabic dialectal forms (AA), is used in the majority of the territory, and even Berber-speaking people use AA when interacting with non-Berber speakers. But Arabic is also used in its standard form (MSA) in certain settings and formal education, by virtue of its status as the first official language of the nation. The French language too is used extensively in some areas but less in others, particularly in rural areas and southern departments. French remains of significant importance in some institutions like part of the medias, some administrations and in some higher education branches. Other languages' impact, like Turkish and Spanish, is way less significant and can be restricted to some few words and expressions remaining in the colloquial forms of multiple regions.

2.2.1 Pre-Arab conquests in North Africa

The Phoenicians were among the first civilizations to establish trade in the area of North Africa around 900 B.C. They established the city of Carthage, in modern-day Tunisia around 800 B.C. The Berbers living in that period were divided into various tribes and well organised politically; they were also quite advanced in agriculture and manufacturing which resulted in multiple trade activities with the Phoenicians. As the powers of the Phoenicians grew, their need for more land grew in parallel which led to the occupation of further Berber lands and the enslavement of the population. The Phoenicians decline started due to the loss of multiple wars against the Romans.

Around the 2nd century B.C, the Berbers were divided into multiple tribes and finally reunited under the rule of Masinissa into what was called Numidia. The Roman empire was becoming stronger in the region and a short time later, it coasted on the shores of Numidia (Modern day Algeria, part of Tunisia and part of Libya), with the intention to settle down. Although the Berbers of the independent kingdoms of Numidia had shown resistance, the lands eventually ended under the domination of the Romans and the enslavement of the autochthons or their conversion to Christianity in masses were some consequences of the conquest. The Vandal occupation and then the Byzantine empire were the successors to the falling Roman empire which had lost eventually the control over the region of North Africa with no real impact apart from some Christianisation which in turn lost of its strength as a result of the Arab Muslim conquests of the 7th century. In fact, the Muslim conquerors had a much stronger and durable impact on the culture and language of the Berber autochthons who had become Islamized by the th century and Arabized in most parts of the Maghreb.

2.2.2 The Arab conquest of the Maghreb

After the conquests of the Levant and Egypt, more Arab-Muslim conquerors (fātiħīn meaning 'openers') headed for North Africa (the Maghreb) around the second half of the 7th Century (by 25 H), and by the beginning of the 8th, the Byzantine and Roman empires had lost their last territories to the Umayyad dynasty. It is worth mentioning that none of all these civilizations left any significant impact on the

cultural and linguistic profiles of Algeria. To some extent, the Turkish empire and the Spanish invasions that took place later on impacted the local dialects with a few words, nothing comparable with the Arabs' occupation of the lands of North Africa which indeed changed the linguistic profile in the area forever. Then, about ten centuries later, because it lasted more than a century, the French colonisation too had significant linguistic and cultural effects on the whole area, including today's Morocco, Algeria and Tunisia.

Being one of the Semitic languages, Arabic emerged around the first century AD in the region of Arabia. In the pre-Islamic period, a trans-dialectal variety of Arabic emerged in the Hejaz called Hejazi Arabic in which the Holy Book, the Qur'an, was sent to Prophet Muhammad (pbuh) starting from 610 AD. Soon, the new religion began spreading within, then outside Arabia in all directions. The use of Arabic had significantly extended with the spread of Islam, given its tight relation with the Holy Quran which was revealed and written in an Arabic variety of Mekka, the birthplace of the Prophet (pbuh). As a matter of fact, under Islamic rule, Arabic became more known around the world than ever and for the first time in its history it was 'standardized', or rather codified, thanks to early grammarians, like Abul 'Aswad ad-Du'aliy, AlKhaleel Ibn Ahmad, Sibawayh and many others. In the golden age of Islam (dated from the 8th century to the mid-13th century), Arabic became the global language of sciences and philosophy, arts and literature; the Europeans had to learn it to improve their knowledge in various scientific fields, including algebra and geometry, chemistry and biology, medicine and astronomy. This lasted until the Mongol invasions (started in 1258) and their devastation of lands and cities like Baghdad, the centre of sciences and knowledge then, their destruction of manuscripts and libraries, the downfall of Andalusia (12th to 15th C.), and internal wars in the Muslim world. All these weak periods were soon followed by the ascendence of the West which soon engaged in colonisation and the occupation of African and Islamic lands, including the M aghreb countries which were colonized by the French in the early 19th century. But before that, two chief events have to be mentioned at this level: the Spanish aim of spreading their occupation of North western parts of Africa after

the *Reconquista* that led to the fall of Andalusia and Granada in 1492; the Ottoman protectorate of Algeria.

2.2.3 The Spanish conquest

When the *Reconquista* in the Iberian Peninsula was over, the Spanish government turned its attention toward North Africa. A number of towns in the Algerian coasts were occupied: Mers-El-Kebir (1505), Oran (1509), Algiers (1510) and Bugia (1510). The Spanish conquered Oran and were well established in the region. In 1529 they left Algiers and only until 1708 they left Mers-El-Kebir to only come back in 1732 when the duke of Montemar won the battle of Ain-Turk. Later, Charles III of Spain sent, under the command of Alejandro O'Reilly, a large fleet to attack Algiers. The Spanish succeeded in their attacks killing thousands of Algerians but they did not hold Algiers for long. However, Oran and Mers-El-Kebir were held until 1792 and freed only when the Bey of Algiers bought them from the Spanish.

2.2.4 The Ottoman occupation in Algeria

For three hundred years, Algiers was the centre of Ottoman governance in the Maghreb. Indeed, Algeria was a province of the Ottoman empire and Algiers was its capital. Turkish was the official language at that time whereas Arabs and Berbers were not part of the government. Governors ruled by the title Pacha which was a term that refers to higher rank in the Ottoman empire, or Dey which was a form of honorific title given to rulers in the region of Algeria. Algeria was known for its piracy capacities during the Ottoman reign and the European powers had to pay for the safety of their ships. Algeria remained part of the Ottoman Empire which eventually had no more great influence, though the control over the Mediterranean Sea was even stronger during the Napoleonic wars. Algiers indeed did benefit from trades during the period of conflicts in Europe. Therefore, the French were indebted to Algeria as they had been importing food to France by credit. Hussein Dey demanded the French consul Pierre Duval to pay the debt, but this latter refused and Hussein Dey hit him with a whisk. The French government used this excuse to end political diplomacy with Algiers and set up later to invade it.

It is worth mentioning, however, that not all of these civilizations left a clear impact on the cultural and linguistic profile of Algeria. Nevertheless, to some extent, the Turkish occupation and Spanish invasions only impacted the local dialects with a few words, nothing to compare with the Arab conquest and settlement which changed the linguistic profile in the area forever leading to language shift in most parts of the country, to the exception of a few remote areas where Berber varieties were maintained and are still used today. The French, too had a strong impact on the society during their colonisation of about 132 years. It was culturally more rooted, and their language merged with the languages used in Algeria and in North Africa in general.

2.2.5 The French colonisation of Algeria

The history of Algeria in relation to France goes back to the late 16th century when Algeria was part of the Ottoman empire. At that time, he two governments had agreed on a Franco-Ottoman alliance which resulted in trades and business deals. However, the trade was often a source of conflict between the Ottomans and the French. In 1827, France used the famous reaction of Hussein Dey, the Turkish Regent of Algiers, toward Pierre Duval, the Consul of France, as an excuse to put an end to all diplomatic relations with Algeria. This latter, when asked to pay a large wheat debt and refused, Hussein Dey hit him on the face with a fly whisk. As a reaction, the French blockaded Algiers for three years. In 1830, they started invading the coastal areas and gradually expanded their presence on the Algerian soil until 1848 when the French government finally occupied the majority of the Algerian land and declared Algeria part of France, a full colonization that was going to last for more than a century, until 1954 when a seven-year war ended in independence in 1962.

However, the whisk event was just an excuse. The French had other purposes in wanting to occupy the Algerian lands and exploit its people and resources. In particular, they came with a feeling of superiority vis-à-vis indigenous people whom they regarded as 'savages', and thus one important mission they carried was to 'civilize' the country, according to their views of course. As a matter of fact, what was meant by civilizing was to 'westernize' the country by eradicating the Arabic

language and Islam and inculcating the French principles, their language and their religion. In respect of the language issue, Dendane, Z. (2007:81) says that

right after the occupation, one of the fundamental goals of the colonial policy was to denigrate violently non-French languages and cultures and to impose French as the only official language, "the only language of civilisation and advancement" (Bourhis 1982:44), as it was considered by the colonial government.

In the same line of thought, Kh.Taleb Ibrahimi (1997:42-3) acknowledges that "French, a language imposed on the Algerian people in violence, constituted one of the fundamental elements used by France in its policy of depersonalization and acculturation towards Algeria."¹²

In 1830, the French armies started invading the coastal areas and gradually expanded their presence on the Algerian soil until 1848 when the French government finally occupied the majority of the Algerian land declaring Algeria part of France. The first concrete resistance by local populations was led by Emir Abd-el-Kader and it took the French over ten years to put down his rebellion, using chemical weapons and mass massacres. Once things were set, Algeria was divided into three civil departments: Oran, Algiers and Constantine. Colonial rule lasted for more than a century, until 1954 when a seven-year war led to Algerian independence in 1962.

The native Algerians had therefore lost their authority on the lands and became subjected to the new ruler. Part of the French strategy was to bring a large number of colonists from different areas across Europe which affected the social structure. This was a crucial fact for the outcome of the post-colonial linguistic profile and the nature and identity of the educational system later. Indeed, the plan of making Algeria a permanent part of France had existed since the very beginning. This had a strong impact on the very nature of the Algerian society, affecting it economically, culturally and linguistically. Given the French hegemony, the transformation of the educational system was of course a priority, and indeed had led to dramatic developments since then, as we shall see in the next chapter. An overall picture of today's Algerian

-

¹² My translation of the original French text « Le français, langue imposée au peuple algérien dans la violence, a constitué un des éléments fondamentaux utilisés par la France dans sa politique de dépersonnalisation et d, acculturation à l'égard de l'Algérie."

linguistic profile will be exposed below, but it is necessary to first mention the impact of colonial rule on education.

2.2.6 The colonial education strategy

One important objective of French occupation of Algeria, starting in 1830, in addition of course to getting hold of the lands and resources, was to enforce their ideology, what they called *mission civilisatrice*; that is, they came with the idea of civilizing the Algerians who were backward people, according to them. Senouci-Meberbeche (2015:14) explains that the ideology

was based on the belief of the superiority of the French civilisation and the backwardness of non-European cultures and civilisations. Part of the French mission civilatrice and what the latter considered to be a duty, was to civilise what they regarded as being "barbarian" and "savage"....

As a matter of fact, one of the crucial things the French rulers started to do, in relation to education, was preventing Quranic schools and madrasas to prosper, the aim being to supersede Arab/Algerian educational values by trying to eradicate pre-colonial education. Such project of subjugation of the Algerians to colonial domination and the French language was clearly stated by the Duc de Rovigo in 1932, when he declared his view on the propagation of instruction in French as the most efficient means of progressing in the domination of the country.¹³

In fact, in spite of the resistance the rulers faced from the Algerians, it was a success: indeed, almost half of the indigenous population was literate in Arabic, but that literacy rate went down to less than 15% by the turn of the 20th century. In the same line of thought, Heggoy (1973:180) observes that

The attempt by France to control Algeria through the assimilation of Algerians into French culture was no more clearly demonstrated than in the field of education. The imposition of French educational norms and the denial to the Algerian of his legitimate cultural identity through controls of language, curriculum, and methods of instruction revealed the colonialist policy in its most destructive aspect.

¹³ Paraphrased from De Rovigo's statement in French : «Je regarde la propagation de l'instruction et de notre langue comme le moyen le plus efficace de faire faire des progrès à notre domination dans ce pays.»

Therefore, the strategy of eradication of the Algerian language and identity was under way, and soon Algerian children were progressively given the possibility to go to school, especially in big towns and urban areas; but of course, they had to receive their formal instruction in the French language, while Arabic was taught just as a language. Such imposition of the French language did not lead to language shift, as people continued to use their dialects (Arabic and Berber) in their everyday life, and standard Arabic, particularly for religious purposes. But the forced introduction of French was going to have great impact on the society as a whole and to transform its sociolinguistic profile forever. Today, Algeria is characterized with societal bilingualism where French continues to have great impact despite the Arabization process started right after independence n 1962. In fact, Algeria has sometimes been considered as the second francophone country after France!

2.3 The Algerian linguistic setting

All countries have been affected one way or another in their linguistic shape. Some languages have disappeared for various reasons, mostly foreign interference, and others become ruling languages for hegemonic and politico-economic reasons. We tend to forget, for instance – and perhaps many would be astonished to know – that English, today's global language, originated from Anglo-Frisian dialects brought to Britain from outside the British Isles by three Germanic tribes in the mid-5th to 7th C. AD and imposed on the natives who soon lost languages like Gaelic, Cornish and Manx. A similar language event occurred in North Africa and in Algeria, in particular.

The historical events briefly depicted above have resulted in an extremely complex linguistic profile in Algeria. We will deal in this part of the chapter with the languages that prevail in today's Algerian linguistic picture which encompasses:

- Berber or Tamazight, a branch of the Afro-Asiatic language family, known as the oldest languages in Algeria and North Africa as a whole, constituting the mother tongue of about a quarter of today's Algerian population and almost half the population in Morocco (approximately 10M and 20M respecively).

- Arabic, brought with the Islamic conquest of the 7th century, is spoken in its Algerian Arabic dialectal forms in most of the territory. Arabic, declared as the official language of the country starting from the first Constitution (1963), is in fact the standard form referred to as MSA;
- French, introduced during the long-term colonisation (1830-1962), turning the society into a bilingual one. It is still used extensively in most areas but less in others; it remains of significant importance in some institutions like some medias, some administrations and part of the educational system.
- Other languages' impact, Turkish and Spanish in particular, are much less significant an impact restricted locally to a few words which remain in the colloquial accents of a few regions.

2.3.1 The Berber language issue

Tamazight (or Berber) is a term that encompasses numerous varieties of this language which was indigenous for millenaries to all North Africa and some nearby countries. Indeed, historical researchers agree that the most ancient inhabitants of North Africa, including Algeria, were of Berber origins, and Tamazight was the first language spoken in this region of the continent way before the arrival of the Arabs around the 8th century. Grandguillaume (1983:14) attests that "the Berber dialects came from the spoken languages in the Maghreb before the Arab conquest in the 8th century." But such stable situation was going to be disrupted, not by the Romans' or the Byzantines' occupations whose languages and culture had almost no impact, but by the Arab conquests starting from the 7th century (642 AD). They succeeded in conquering vast areas in North Africa and elsewhere in just a few years to spread Islam as a newly-revealed religion and, obviously, the vehicle through which it was disseminated was Arabic, the language in which the Qur'an, the Holy Book of Islam, was sent. Indeed, such wave of Muslim fātiħīn (Arabic word for 'conquerors') was going to result in dramatic changes in the social, religious and linguistic configuration of the Maghreb, and Algeria is a good example of the ever-lasting effects that Arabization along with Islamization had on the society.

Thus, similarly to what occurred in the British Isles around the 6-7th C. AD as mentioned above, a great language shift took place progressively in what was soon to be named the Maghreb, making most indigenous populations slowly shift from their Berber vernaculars to Arabic, the language of the new religion that they gradually accepted. Today, there are many places which still carry Berber names but their inhabitants have completely 'forgotten' their language. However, in Algeria (and Morocco as well) some Berber communities succeeded in maintaining their languages though they eventually converted to Islam. This is particularly the case of Kabylia in Algeria, East of Algiers, and some other remote places like the Mzab, the Aures and large areas in the Sahara. In the long run, all other areas became fully Arabized and progressively lost their Berber varieties.

The Arabic language was thus established as the government language in the region and it was used in all official and legal settings, making Tamazight a secondary vernacular that had no academic status. The more the Arabs established themselves there the more the High/Low relation between Tamazight and Arabic became evident. This was due to two main factors: firstly, for the Arabs, Arabic, the language of the Quran and therefore religious education, had to possess a high status and a higher level of use in essential matters such as education in mosques and schools. Secondly, although Tifinagh existed as a written system, the Berber traditional literature was not apparent enough to make the language a rival to Arabic in official settings. The Berber language survived, therefore, in the form of various vernaculars in some scattered regions, and as an oral tradition with lesser written heritage.

Berber lacked recognition by the governments until the turn of the 21st century when it obtained the status of national language (2001 Constitution) and then in 2016 it became constitutionally official. In this respect, Kerma (2018:) says that "the new Algerian Constitution represents a historical turn in that it acknowledges Berber as a national language and as an integral part of the unified Algerian linguistic and cultural identity." This status, however, maintains Tamazight, or any other variety of Berber, in a diglossic relation with MSA on the one hand and French on the other, these two latter languages being more prestigious. In Ferguson's terms, all mother tongues in

Algeria are viewed as Low and function as means of everyday communication in informal settings, though they are often mixed with French words and expressions.

In modern days, Tamazight is spoken by 30% of the population in Algeria. For the Berber people, it is not simply another variety or dialect, it is a matter of identity and preserving it goes along with preserving a whole culture. Right after independence, the process of Arabization included the exclusion of all languages and the promotion of Arabic language over all. A great majority of the Amazigh community perceived these laws as a threat to the Berber identity and united all around the Maghreb countries to reestablish a more official and recognized status to the Berber language. Indeed, in Algeria this was partially achieved in 2002 as the Berber language was recognized as a national language, and in February 2016 the language was recognized as an additional official with the same status as Arabic by the Algerian parliament.

The struggle for its status, the historical presence and the issue of identity makes it relation to Arabic and French quite special. The contact with these two languages resulted in code switching and borrowings that can be perceived within its community. The Arabic language has influenced Berber much more than the other way round. In fact, many lexical items of the Arabic language, particularly religious, political and administration terms, have been implemented in the Berber language. For example, the Arabic numbers are used in the Berber language, and adapted into its pronunciation. The interactions between the French language and Berber resulted in loan words in Berber as it did for Algerian Arabic. What characterizes it however, is that some of these words are adapted to the Tamazight morphological system. For instance, French words like 'gendarmes' or 'policiers', are adapted to the plural form of the Berber language giving [3adarmijən] and [bulisijən].

Codeswitching in the Berber speech community occurs in a two-way form as it includes switching from Berber to AA and Berber to French as well. This depends of course on the speaker's level of proficiency in these languages, lexical needs, interlocutor and sometimes attitudes toward these two languages. In fact, the factor

of language attitudes plays an important role in understanding the Berber speakers' language use. As a speech community, Berbers have their own set of language attitudes that might differ from other regions and be similar in some aspects. Attitudes toward French and Arabic might differ from an individual to another, but in general, the will to keep their identity intact and independent plays an important role when it comes to language attitudes Berber speakers might have towards both Arabic and French, a factor that can play an important role when it comes to code choice. Yet, just like all other Algerians, Berber speakers bear a feeling of inferiority in the face of both MSA and French given their prestigious status. This status of prestige generates a situation of diglossia involving all dialects vis-à-vis MSA and French.

2.3.2 The phenomenon of Diglossia in Algeria

Algeria is known among the twenty two Arabic-speaking countries with the standard form of Arabic (MSA) as the only or first official language, depending on the country (in Algeria, for instance, Berber has recently been promoted as a second official language). However, what is known as Modern Standard Arabic (or Classical Arabic), is no-one's mother tongue in the whole Arab world which is one important characteristic of diglossia. Mitchell (1975:70) says in this respect that "Modern Standard Arabic is not a spoken language, it is nobody's mother tongue, and the man who wants to talk at all times like a book or a newspaper is a decided oddity." It is indeed agreed that MSA is not acquired by Arab children as a native language, but Mitchell has gone too far in asserting that it is "not a spoken language", for it is indeed used in its spoken form in most formal settings, including TV talks and documentaries, in radio news, school and university lectures, mosque sermons, historical and scientific documentaries, etc.

On the other hand, diverse varieties of Algerian Arabic function as everyday means of communication used at home, in the streets and for all informal communicative purposes, just like Berber varieties in Berberophone communities. *G*randguillaume (1983:13) states that "The mother tongue of every Maghreban is either an Arabic or a Berber dialect. These dialects are essentially spoken". It is worth noting here that most Berberophones, particularly those living in the capital and other

cities, also use Arabic dialects especially in mixed settings. What is meant here by 'Arabic dialect' includes in fact the colloquial dialectal forms specific to the various regions of the Maghreb, and they are different in form and status from MSA. As Dendane (2007:98) asserts,

what is regarded as the high variety is *not* anybody's mother tongue, and, in particular, Arabic speakers all over the world are fully aware of the differences in use between 'educated' Arabic, which many simply call *al* '*arabiyya*, and the local Arabic vernacular used spontaneously in everyday speech interaction.

Indeed, one important feature that characterizes the Algerian linguistic profile is the co-existence of MSA, the official language, and Algerian Arabic. Ferguson's view of diglossia applies perfectly well to this situation: the co-existence of two distinct forms of Arabic that he terms High and Low respectively, each having a specific function in distinct domains of use, though there might be some overlapping in certain circumstances where a mixed variety can be used. Insisting on the importance of 'function' in a diglossic situation, Ferguson (1959:235) writes:

One of the most important features of diglossia is the specialization of function for H and L. In one set of situations only H is appropriate and in another only L, with the two sets overlapping only very slightly.

Actually, this situation applies to all Arabic-speaking countries where MSA is the language of the pan-Arab nation, used in official settings including government administration, religious affairs, the media, literature, and of course in the educational system as the primary means of instruction, though some forms of spoken Arabic in prestigious cities like Cairo and Damascus where attempts at standardizing their prestige dialects have been tried without real success. In this respect, Ferguson (1970:116) says that "Arabic speakers, within the areas of influence of these prestige dialects, may in the course of their lives adjust their own dialect in the direction of the prestige dialect or even be bi-dialectal." In fact, it is all natural that speakers adapt their linguistic behaviour to the varieties they are exposed to and thus, depending on the necessity to communicate and their motivation to learn to accommodate to other's speech, they may become bi- and multi-dialectal, partcularly in large cities.

On the other hand, the Algerian speaker uses colloquial Algerian Arabic that has evolved gradually to become the actual modern dialecy called 'Darija'. It has a lower status (L) but is the mother tongue of the majority of Algerians, about 25% of the population being Berberophones. AA serves as the main language of everyday life for the Algerians and it is the main vehicle of the Algerian verbal culture, though it is often mixed with French words and expressions.

MSA, which is taught starting from primary school may be identified as a reflector of identity as well. In fact, there are situations in which speakers attempt to use some MSA features in their speech resulting into a kind of intermediate variety. In this respect, emphasizing the overlapping between MSA and AA, or mixture of the two varieties in increasingly more contexts, a practice that goes against Ferguson's principle of 'compementary distribution' (1959:328), Djennane (2014:53) states the following:

It is of significance to mention that overlaps that nullify the complementary distribution of SA and AA are abundant in that H and L are not always kept separate. For example, in an informal context such as a family meeting, though AA is undoubtedly the prevalent variety, if a topic including, for example, science is to be discussed, SA would be extensively used for the simple reason that education is conducted in SA. AA lacks scientific terms and therefore speakers find it a necessity to code-switch back and forth between the H and L so as to compensate for such a linguistic gap.

Thus, we may accept the existence of a form of continuum going from the Low variety with the lowest status to the highest form of Arabic. In fact, depending on contexts, the use of MSA in everyday speech is a possibility, depending on factors like attitudes towards it, proficiency in it and level of education. Badawi (1973) used a diagram to display the relations between MSA and different varieties. He applied it first in the Egyptian setting; yet, it can virtually represent the diglossic situation in all Arab countries.

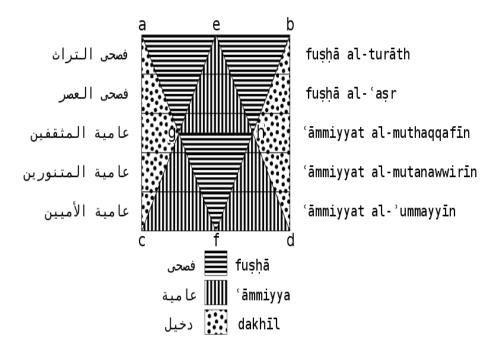


Fig. 2.1 Badawi's Diagram (1973): "Levels of Egyptian Arabic"

- Badawi's levels (1973) classified in a hierarchical manner (as translated by Freeman (1996):
- 1) The Classical Language of Tradition;
- 2) The Modern Classical Language;
- 3) The Colloquial of the Educated;
- 4) The Colloquial of the Enlightened;
- 5) The Colloquial of the Illiterate.

It is important to note that Badawi and other scholars make a clear distinction between *Fuṣhā al-Turāth* and *Fuṣhā el 'asr*, two forms of Arabic that have been referred to as Classical Arabic and Modern Standard Arabic, respectively.

Classical Arabic is said to have the highest status and is especially related to religion and usually performed during religious ceremonies or TV films and documentaries on Islam. It refers to the classical ancient spoken and written form of Arabic with a huge body of literature reflected in classical texts of poetry, religious texts and ancient grammar books. One surprising characteristic of CA is that it has existed and remained unchanged for centuries in spite of the great changes of the

modern era that have impacted the whole world since the late 19th century and, in addition, all languages have changed through time.

However, the only impact that recent developments have had on the Arabic language since an-Nahda (the Awakening or Renaissance, mid-19th to the early 20th centuries, particularly in Egypt) is at the lexical level, though some complex morphological and syntactic forms may be avoided depending on the styles that speakers and authors want to convey. Indeed, what is referred to as MSA has been regarded as a modernization of CA with the purpose of adapting it to the current world, in particular through the borrowing and adaptation of foreign technical terms or their Arabization. Indeed, MSA is the result of the addition of a number of foreign words and expressions that the Arabs had to adopt to keep up with scientific and تلفزيون technological developments. Some examples include common words such as [tilifizju:n], 'television'- also adapted as تلفزة [talfaza] - and راديو 'radio', or scientific words like رسْكُل and أوكسيجين, 'oxygen' and 'carbon' and the verb رسْكُل [raskala] 'to recycle'. But MSA also uses the strategy of loan translation either by synthesizing to mean 'car' from the verb سیار 'to go/to be سیار 'to go/to be in motion', or by translating expressions like the English phrase 'on the air' rendered in a word for word form.

Such inclusion of foreign items, referred to as الدخيل in Arabic (loanwords and foreign expressions that 'entered' the language), might have led MSA to be perceived as somewhat less prestigious and less 'pure' than CA. It is however the standard form used in the medias, governments and educational systems in the whole Arab world, while CA is usually more used in religious domains and pure classical literature. MSA is regarded as more flexible and easier to use as it facilitates the task for modern speaking by getting rid of some heavy grammatical rules, case-endings in particular, and a large vocabulary found in CA. But this is not enough to consider MSA as distinct from CA as Western linguists do! As a matter of fact, laypeople in the Arab world as well as writers and linguists do not make a distinction between the two forms to which they refer to as al-Lughah al-'Arabīyah al-Fuṣḥā or simply al-'Arabīyah. None of these Arabs has ever used the term كلاسيكة 'classical' to refer to what Western

Arabists call Classical Arabic. The difference between the two forms of Arabic may be compared, for instance, to the distinction between RP English accent and another standard form of English, each being prestigious in its milieu. The table below shows a few examples of words and expressions that may be said to differentiate between CA and MSA:

Table 2.1 Examples of pseudo-differences: CA vs. MSA

CA	MSA	English
[şahin] صهٍ!	[ʔuskut] اسكُتْ!	Silence! Shut up!
[ʔiχtila:f] اختلاف	[farq] فرق	Difference
لا أبرَحُ [la: ʔabraħu]	[la: ʔatruku] لا أترُكُ	I won't leave until

However, such differences can actually be explained in other terms, in particular in terms of synonymity: it is obvious that the two forms in each item can be found in CA and MSA; every speaker would use for instance the two words $\dot{\psi}$ and with no difference in the meaning and even the context, but maybe not and which may sound archaic. As a matter of fact, in today's $Fush\bar{a}$, a great number of lexical items and phrases have fallen in disuse – but keep being understood by those interested in Quranic Arabic and ancient literature – and others terms have been added or borrowed by necessity given the modern world and the new technologies. But on the whole, anyone who has learned CA will have also learned MSA and vice versa.

In an overall manner, these two forms of Arabic are considered to be the H variety, while each playing some specific role in the society, though often with overlapping, and people not being aware of differences. In fact, there are more similarities between CA and MSA than differences: they both have a standard written system and are both spoken and written; they have the same phonemic inventory and do not differ so much at the morphological and syntactic levels; They both have a huge body of literature, dictionaries, linguistic and poetry heritage. They only differ to some extent at the level of lexical use and style, just as, for instance, today's RP

English differs from the English used in the 18^{th} and 19^{th} centuries. In any case, Arabs do not make a distinction referring to both forms as *al lugha al 'arabyiah l fuṣħā*, and even some Arabists use the form CA/MSA without distinction.

The different dialectal varieties, on the other hand, are not written and are transferred from a generation to another in an oral tradition. All the vocabulary, stories, idioms and sayings, therefore, have no existence in books and are not saved in libraries, but only rely on the collective knowledge of the spoken form and transfer between generations. However, there have been some attempts, particularly by informally lettered people, of recording folk literature and poems in some form of the dialect that is in some mid-position between H and L, and this allows us to reflect on the idea of continuum from H to L.

2.3.3 The H-L continuum

Within the continuum that exists between the H and L varieties, comes a variety often referred to as "Educated Spoken Arabic". It is a variety which results from the friction and continuous contact between MSA and AA. It relies on the most part of it on MSA and uses some vocabulary of the colloquial. It is therefore, lexically and structurally more flexible than MSA and in terms of diglossic relationship between H and L varieties, playing an intermediate role. It has the purpose of having an intermediate variety that can be both used by the intellectual elites and understood by the less educated population.

Thus, the Arabic language as a whole can be represented in the form of a continuum of varieties that occur according to the context and the degree of formality:

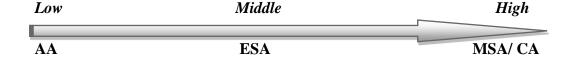


Fig. 2.2 Diglossia continuum in the Arabic language

In fact, not only does Ferguson (1970:116) acknowledge the existence of a continuum between the High variety and the Low variety, but he also refers to the fluctuation and changes that may occur along that continuum when he says:

Intermediate between the two varieties, or sets of varieties, relatively 'pure' Classical and Colloquial, there are many shadings of 'middle language'. These intermediate forms, some highly fluctuating and transitional, others more stable, represent two tendencies: classicization, in which a dialect is modified in the direction of classical, and koineization, in which dialects are homogenized by the modification of features which are felt to be especially distinctive of a particular regional dialect.

As a matter of fact, Algerian speakers' competence and use of Arabic exists in a complex configuration. Between Modern Standard Arabic and Algerian Arabic, the speaker is offered a set of possibilities that range from the High to the Low varieties. Of course, code choice between these varieties depends primarily on the level of education of each individual, and secondly on the context and the situation that is more fit for a given choice; and finally it depends on the interlocutor's competences. In an attempt to depict this complex linguistic picture, Bouhadiba (1998:1-2)¹⁴ asserts that

Today's actual reality as it is observed is characterized by a continuum of Arabic in which the varieties of this language are sometimes difficult to delimit: Classical Arabic, literary Arabic, Modern Standard Arabic, cultivated spoken Arabic, dialectal varieties with Arabic dosage but where French is strongly implanted at the lexical level.

Researchers agree that the notion of diglossia and triglossia applies quite well to the linguistic situation in Algeria. MSA and CA are recognized as the High variety while each playing a specific role, and Algerian common different dialects constitute the low variety used by common speakers in everyday conversations. A range in the form of a continuum exists, though, between the H and L varieties. Although the Darija emerged from Arabic, it differs from it in many aspects, at all linguistic levels, lexical, morphological and phonological and even semantic. Indeed, there are cases in which the same word in MSA might be used in Darija but with a slightly different meaning, as shown in these few examples from the Arabic dialect of Tlemcen (West of Algeria).

au niveau lexical..." (Bouhadiba 1998:1-2).

¹⁴ My translation of the original text in French: "La réalité linguistique actuelle telle qu'elle se présente à l'observation est caractérisée par un continuum de l'arabe où les variétés de cette langue sont parfois ifficiles à délimiter: arabe classique, arabe littéraire, arabe standard moderne, arabe parlé cultivé, variétés dialectales à dosage arabe mais où le français est fortement implanté

Table 2.2 Examples of semantic shift: AA vs. MSA

AA	MSA	English
[mʃa] مشی	[ðahaba] ذهب	He went vs. walked
zəwdʒ] > two	[zawdʒ] > couple	two vs. couple
[jahdar] يهدَر	[jahdar] يهدِر	speak vs. mumble

In this example, the word 'مشی' for instance, in AA refers to the verb 'to go' in the past simple, but in MSA, the phrase for 'He went' is 'ذهب'. However, the word مشی originates from MSA and refers to the verb 'to walk' instead. Dialectal Arabic is full of such words originating from MSA, but having undertaken a semantic shift in people's speech. The examples below clarify the differences at lexical levels

Table 2.3 Lexical differences: AA vs. MSA

Lexis	Algerian Arabic	Standard Arabic	Gloss
/ntaas /	+	₹.	Of
/ballaç /	+	-	Shut
/barka/	+		Stop it

The examples stated in the tables were taken from "Cahier de Dialectologie et Linguistique Contrastive", (Bouamrane 1989). These items have their roots in MSA but are transformed in the dialect.

Morphologically speaking, the use of the dual forms in verbs and nouns are lost in the dialects, except for a few items that naturally come in pairs, like [rədʒli:n] 'two feet' or [jəddi:n] 'two hands', or [ʕajni:n] 'two eyes'. The examples below clarify the possible differences that exist between MSA and AA in verb conjugation where the dual morphemes are replaced by the plural morphemes.

Table 2.4 Morphological differences: AA vs. MSA

Standard Arabic	Algerian Arabic	English	Tenses
/jal Sabaan/	/jalfbu/	They play	Present
/ilSabaa/	/ ?a 15 bu/	Play	Imperative
/1a5ibaa/	/las bu/	They played	Past

At the level of phonology, these examples can be stated to portray the differences:

Table 2.5 Phonological differences: AA vs. MSA

Rural Spoken Arabic	Standard Arabic	Gloss
/gaa1/	/qaala/	He said
/tu:m/	/θawm/	Garlic
/ d a w /	/ d a w? /	Light

Beside the triglossic complex relationship of a high prestigious variety and the low colloquial variety, the Darija itself is highly diversified. It is the mother tongue of approximately 75 to 80 % of the population and practically all varieties are understood by Algerians though not always to the same extent as they vary from a region to another from the east to the west and from the north to the south. These different varieties of Arabic belong to the same Maghrebi Arabic language continuum, which includes those of Morocco, Algeria, Tunisia and the other Maghrebi dialects as well. In fact, the dialects in the Maghreb world, and especially the Moroccan, Tunisian and Algerian are, to some extent quite mutually intelligible. This fact explains as well the reason why, for instance, dialects that are in the far west of Algeria are very similar to the dialects in the east of Morocco, while dialects that are in the extreme east of Algeria resemble quite well to the Tunisian dialects.

Table 2.6 Phonological differences along the Maghreb dialect continuum

Moroccan	Algerian	Tunisian	Arabic	English
[ʒu:ʒ] جوج	[zu:dʒ] زوج	[zu:z] زوز	[ʔiθna:n] اثنان	Two

The example in the table above illustrates some variation that occurs at the phonological level; it can be observed when comparing dialects of these three countries belonging to the same dialect continuum. Indeed, comparing the dialects of the Maghreb countries is not of our current concern, nor the comparison is limited to these words only, but it illustrates quite well the linguistic continuity between these countries and the fact that Algerian Arabic belongs more precisely to the North African Arabic Dialects.

Lexical, morphological and phonological as well as variation in the accent and pronunciation mainly characterizes the differences between multiple dialects in Algeria. Moreover, the distinction of rural and urban plays an important role in differentiating many varieties that might coexist in a single geographical area.

Table 2.7 Lexical differences: Various Algerian dialects

Tlemcen	Oran	Algiers	MSA	English
[ʔasəm] آسم	[ʃawala] شوالا	[waʃnu] وشنو	[ma:ða:] ماذا	What ?

The table above shows some variations at lexical level from a region to another. In fact, changes at the vocabulary level is one of the most distinguishable features that native Algerians use to distinguish their dialects from other region's dialect.

Table 2.8 Morphological differences in two Algerian dialects vs. MSA

Tlemcen	Oran	Arabic	English
[no:d] نوض	[no:di] نوضي	[?inhadi:] انهضي	Get up!

The table above shows differences that can occur at the morphological level, illustrating the example of Tlemcen dialect as opposed to Oran dialect. For instance, the phrase نوض in the Tlemcenian accent can be used for both genders (male/female) with no feminine marker when addressing a woman. However, the ending morpheme φ {-i:}, used in MSA to refer to a feminine addressee is preserved and pronounced in Orani accent.

Table 2.9 Phonological differences in some Algerian dialects vs. MSA

Tlemcen	Oran	Algiers	Arabic	English
أول لي	قول لي	قول لي	قل لي	Tell me
?ul li	gul li	qul li	qulli:	

The table above shows variations at the phonological level, the differences in pronouncing the \mathcal{G} [q] sound is another important feature that is widespread all over the country; it distinguishes between different regions and dialects as well as rural and urban varieties. These examples are just an approximation of the possible variations that may occur in different dialects and if some Wilayas (provinces) in Algeria share almost the same variety or accent, some others might include different dialects as well. In an overall manner, greater variation is easily attested in big towns and large urban areas where people from different places have come to settle down and continue using their own dialectal varieties. Obviously, the contact between different varieties leads to interference and speakers may switch to the others' variety or mix the two, which results in the long run in the formation of new dialectal forms.

In fact, dialectal variations do not only include the regional aspect, but the rural/urban dichotomy as well, particularly when speakers of various dialects meet in the same town or city; thus, such dialect contact is taken into consideration to determine people's linguistic behaviour. The social factor is an important one too, when it comes to distinguishing between dialects. The speaker's social background is indeed an important dimension used to describe dialect properties. Mainly, we can distinguish urban and rural forms of a variety, considered as different dialects phonologically and morphologically, despite their co-existence in the same geographical location.

Phenomena like urbanization of a rural form and code mixing between the two are also a possibility. These multidimensional variations imply differences in attitudes as well. In fact, the notion of language attitudes in the complex Algerian situation, might as well be applicable to the dichotomy urban/rural, as much as it is to dichotomies like French/Arabic or Standard Arabic/Colloquial Arabic. This complexity is a common property to the whole Arabic-speaking world, except for the

French/Arabic dichotomy that is specific to the three Maghreb countries, Morocco, Algeria and Tunisia. The diagramme below reminds us of the complexities of Arabic with its various types of dialects while the Standard form, MSA, is unified and common to all Arabic-speaking countries.

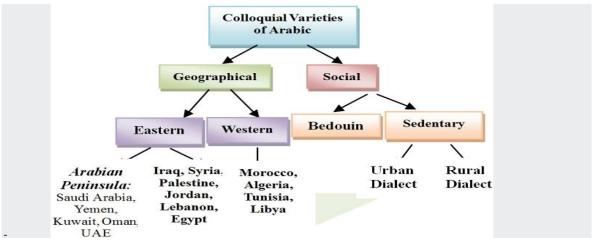


Fig. 2.3 Complexity of Arabic dialects typology in the Arab world

Thus, the Arabic language as a whole may be seen as making up a two-fold continuum that consists of an H-L dimension on the one hand and a dialectal continuum, on the other. Each of these two continua can in turn be specified to each area or country: the H-L continuum in a given country, like Algeria for example, will be quite distinct according to the dialectal forms in that country; and each country or area is characterized with its own dialect continuum, though it may also be worth investigating the wide range of varieties in the whole Arab world.

Another feature that is specific to Algerian Arabic is that it is full of French words and sentences, to a much larger extent than the subsistance of Spanish, Turkish and Italian words and expressions only found as borrowings. In fact, if we can attest AA/French bilingualism and resulting codeswitching as a pervading phenomenon, there is no sign of the use of Spanish, Italian or Turkish in the communities, and even Berber, except at a restricted level of borrowing. Borrowing from Berber too are found in AA in a tiny amount, while Berber has taken a great number of lexical items and expressions from Arabic. Again, history has made some languages, like Spanish

and Turkish, not a permanent part of the Algerian dialects as French is, though some of their traces persist at the lexical level.

However, we have to bear in mind that, as a result of the long-term French occupation and their policy of acculturation, the French language holds a far greater position and status in Algeria than the other languages. Indeed, it may be considered as a second language, not constitutionally but sociolinguistically speaking, to the extent that no research about languages in Algeria could be undertaken without taking into account French which has turned the society into a bilingual one.

2.4 Bilingualism in Algeria

The long-term colonization had certainly the greatest effect on the Algerian Arabic over its history. The way and the purpose of the French occupation of Algeria resulted in inevitable bilingualism. It is important to mention that the French colonization was not only territorial, but also cultural, religious and linguistic as well. In fact, the French government never intended to leave Algeria nor to see it as an independent entity in the first place. Algeria was perceived by the colonizers as an integral and extended part of France. This implies that the Algerians' language and identity eradication was part of the colonizer's plan. This explains as well the fact that language was a tool used by the colonizer, firstly to replace the Arabic-Berber Algerian identity, secondly to implement all the French institutions, and educational system on the Algerian soil. The French language was, therefore, a way to take over the Algerian soil and identity simultaneously. Contrasting the Algerian setting as to the French language with its two neighbour countries, Ennaji (1997: 17-18) writes the following:

By contrast, in Algeria the place of French is a paradoxical subject of conflict for historical reasons. Because France attempted to assimilate Algeria (more than Morocco and Tunisia) into the French cultural community, officials in independent Algeria react in a hostile way to French and are very keen on seeing it replaced by the national language, Arabic.

However, for many Algerians, French is still considered a major tool that plays an important role in the assessment of the Algerian culture and a key component to knowledge and modernity. At a certain moment, the French language was the only way Algerians could use to communicate with the non-Arabic-speaking world, but in recent times, it is not the case anymore as French is being replaced in some domains by the English language as an effect of globalization. Meanwhile, a great number of people, especially those who lived just after independence, consider the French language virtues and have a positive attitude toward it and its users, and see no threat of identity about using it. Therefore, the relation that the Algerians have with the French language is divided into two groups: those who are against its use and those who are for; those who have positive attitudes towards it and those who have negative ones This divergence is indeed reflected in people's daily speech.

On another level, a political one, the French persists not only in the Algerian society, but also in the different institutions. Officially or non-officially, it is possible to perceive the presence of the French language in some media, administrations, signposts on the roads, medical and scientific domains and part of the educational system. Of course, its presence is not complete but partial in these domains, but still enough to puzzle linguists and those who are responsible for the language policy of the country, about the future of the linguistic situation in Algeria and its national and Arab identity.

In an overall manner, what is observable, as far as the Algerian linguistic situation is concerned, is that the French language is present in many facets, ranging from lexical borrowings and small utterances used in everyday speech to official and administrative speeches and formal education in certain university branches; ranging from a few borrowed words used by everyone, regardless of their level of education, to the well-structured sentences used by the élites and educated people in French, either with the purpose of expressing an idea correctly for those who master French more than MSA or as a marker that displays the feeling of belonging to a specific social range/culture. But many speakers, worrying about the linguistic hegemony of French, believe that Algerians are losing their identity and their culture is being dislocated because of the colonizer's language and thus display negative attitudes towards French. In fact, the old conflict between Arabophones and Francophones felt

during the 1960s and the 1970s is still present, and people can be placed along a continuum as to their feelings and attitudes towards the two conflicting languages. In investigating some bilingual communities, like the one of Canada, Hamers and Blanc (2000:31) have come up with the following:

Every bilingual community is situated between the two poles of a continuum, ranging from a set made up of two unilingual groups each containing a small number of bilinguals, to a single group with a more or less large number of members using a second language for specific purposes. At one pole most speakers in each group use only one language for all functions, whereas at the other a varying number of speakers use both languages but for different purposes.

What is interesting to consider too, is that the phenomenon of bilingualism exists side by side with diglossia. It is difficult to outline the complex and dynamic linguistic situation of Algeria in a few lines. However, we can say that, in addition to the colloquial forms that vary from a region to another all of which being in the Low variety niche, there are two languages that fill the H (high) variety position, one being introduced more than ten centuries before, and the other being a totally different unrelated language, French imposed in the 19th century. In fact, MSA and French play the same role of the High variety, used in formal contexts. As the two languages are felt to be prestigious, each for its own reasons, we can only speak of bilingualism. But as the Algerian people do not use MSA in everyday interaction, their use of the low variety, AA or Berber, in relation to the French language is to be viewed in diglossic terms, though in a different way in comparison with Ferguson's 'classical' diglosssia, also termed 'in-diglossia' or 'narrow' diglossia by Kloss (1966) and Scotton (1986), respectively. A situation like the co-existence of Algerian Arabic (or Berber) with French has been referred to by Fishman (1971) as 'extended diglossia', where the H and L are not genetically related, as opposed to Ferguson's 1959 classical description of diglossia. Schiffman (2007:141) reminds us of Fishman's notion of diglossia extended to

situations found in many societies where forms of two genetically unrelated (or at least historically distant) languages occupy the H and L niches, such that one of the languages (e.g., Latin in medieval Europe) is used for religion, education, literacy, and other such prestigious domains, while another language (in the case of medieval

Europe, the vernacular languages of that era) is rarely used for such purposes, being employed only for more informal, primarily spoken domains.

Therefore, Algeria is informally classified as a bilingual society, or rather a multilingual one, with the co-existence of Arabic in its different forms, French as a prestige language, and Berber dialects in a number of places. It is obvious that *not* all members of the community master *all* languages with the same degree of proficiency and the society's verbal repertoire may be considered in terms of a continuum of linguistic abilities in each language or variety, except of course for the individual's natural competence in their mother tongue. The following figure (Z. Dendane 2014) depicts this complex sociolinguistic profile of Algeria:

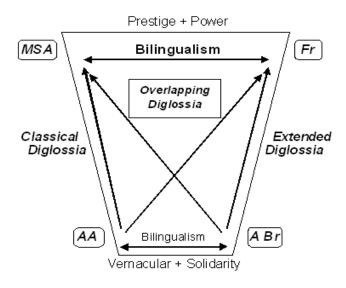


Fig. 2.4 Language relations in the Algerian society (Source: Z. Dendane (2014).

2.4.1 Borrowings into Algerian dialects

The outcomes of this specific language policy France had toward Algeria can be felt at multiple levels which started with borrowing, a phenomenon that occurs first in language contact situations. Today, a great number of French borrowings, expressions and loan words remain in the Algerian dialects, almost perceived as Arabic words; and in some cases, for people lacking education, it is quite difficult to distinguish the French origin of the word from Arabic. In a general manner, usually even speakers who have knowledge of French might use French in a conversation

without really being aware of the loans or a borrowed words. Multiple examples in the Algerian dialects are seen as an integral part of the colloquial; words like 'loto, train, portable' and phrases like 'ça va', 'ça y est' etc., have long become part and parcel of AA and the Arabization process has not been able to have them replaced by Arabic.

2.4.2 AA/French Codeswitching

On another level, code switching, might include the use of small sentences of the French language as the embedded part in an Arabic sentence, or in the opposite case, the use of small Arabic utterances as part of a base French sentence, which is identified as intra-sentential code-switching. In other cases, however, the switch does not occur simply in between a sentence, but the use of two distinct sentences, one in each language can be witnessed among some Algerian speakers. Codeswitching, being the natural consequence of a bilingual situation, often occurs in the Algerian dialects, though in different frequencies depending on the individual idiolect, level of education and language attitudes. It can be witnessed in the form of small utterances that everyone knows, like 'ça va?, quand-même, impossible, etc.' to more structured sentences that people might use in their daily speech. It can be used naturally as a need for everyday speech, as much as it can be used as a marker to be identified as an 'intellectual' or 'educated' person, for instance. Moreover, some domains, like medicine, politics, or sciences, sometimes impose the use of the French language on the speaker to a larger extent. It is the complex history between France and Algeria that is reflected in the daily speech of Algerians in the form of a daily life naturally occurring codeswitching. But the linguistic complexity between these two languages in Algeria does not stop at the level of code mixing. At another level, the presence of the French language is the reason of a certain division among the population. For some people, the French language in institutions and in everyday speech is definitely the mark of colonization and removal of identity. The attitudes of these people are usually negative toward French and its users. Language policies that are based on this attitude tend to perceive it as a danger for the Algerian national unity and Arabic-Islamic identity and work for its removal from the Algerian societal scenery. For

others, the French language is *un butin de guerre* (spoils of war) as considered by the Algerian novel writer Kateb Yacine.

MSA and French are both considered as high varieties in the triglossic situation of Algeria, but of course, these two H varieties, operate in different contexts and their prestige is felt for different purposes. Meanwhile, the coexistence of French and MSA nourishes a debate of identity as already mentioned, and people with different sociocultural backgrounds might have different attitudes toward either MSA or French. On the one hand, Algerians speak dialectal Arabic in the streets mixed with French and MSA depending on either the context or the educational level or both; on the other hand, French and MSA, representing languages of formality, are used depending on factors like contexts, proficiency, preference, domain of use and attitudes toward each. As Dendane (2007:97) writes,

What is interesting to note here is that the different 'ways of speaking' are characterized by a sort of fluid mixture of all three codes, particularly in urban and recently urbanised areas, and understood perfectly well by a large majority of people as a result of language contact situations.

In fact, depending on their level education, but also their attitudes towards languages, many Algerians easitly switch from Arabic, sometimes in its two forms L and H, and French to convey different types of messages according to the contexts in which they find themselves; they may even mix the three codes, or four among Berberophones, which gives them a means of communication that is specific to Algeria and hardly intelligible to speakers of other Arab countries.

2.5 Conclusion

We have attempted in this chapter to bring forth the most important historical events that have led to today's complex linguistic situation in Algeria. Indeed, various developments through time in the history of the country, and North Africa as a whole, have shaped the whole Maghreb resulting today into a wide area characterized with multilingualism on the one hand, and diglossia on the other. The strategic geographical position had long attracted the interests of powerful civilizations,

including first the Phenicians, then the Romans and the Byzantines; but these had no real linguistic impact on the indigenous people whose Amazigh languages were labelled Berber, belonging to an Afro-Asiatic family.

The strongest linguistic influence, associated with the expansion of the new religion Islam, came from Arabic, the language of the Qur'an. It did not take long to convince the indigenous people who soon adopted Arabic as the language of their new religion, and soon most Berberophone areas became progressively Arabized losing this way their language, to the exception of a few remote mountainous and Saharan areas who have preserved Amazigh varieties to this day though they accepted Islam which led to Arabic/Berber bilibgualism as Arabic is necessary to practice Islamic prayers. However, the introduction of Quranic Arabic soon led to Ferguson's classical diglossia as people used various dialects in their everyday conversation while the standard form was only used in formal settings including religious speech, education and written material on the whole.

About ten centuries later, the long-term French occupation of Algeria had another singnificant impact on the populations as French was imposed as the language of administration and education, turning the country into bilingualism whose consequences for language planning and language policy and on people's culture, language practices and attitudes, with negative and positive issues, persist to this day in Algeria almost sixty years after independence.

The next chapter will consider language in relation to speakers' attitudes on the one hand, and to language planning on the other.

Chapter 3 Language Planning and Education: Acquisition and Attitudes

3. Language Planning and Education: Acquisition and Attitudes

3.1 Introduction

This chapter will be dedicated to different aspects of language in regard to education. Certainly, the study of education and the exploration of its multiple aspects in multilingual settings is quite different from monolingual situations, as the diversity and multiplicity of languages in a given country has a direct effect on the nature of its educational system. In contrast, education and language policy can have an impact on the spoken languages. The first part of the chapter will deal with the process of language acquisition and its relation to education. We shall discuss the differences between language acquisition and language learning, as well as the aspects of the mother tongue still in relation to education. Aspects of bilingual education and bilinguality in education as well as types of bilingual education will also be discussed largely within this first chapter, This theoretical framework is needed for a better understanding of the linguistic and educational situation in Algeria where bilingualism is highly present and affects extensively the educational system, particularly in higher education.

Language attitudes, being one of the major components of our research, will also be dealt with in the second part of the chapter. It will summarize the major theoretical background lines concerning it. Attitudes for a given language are central to much debate in different fields such as social psychology, sociology and linguistics. In multilingual settings, especially, the concept of language attitudes is an important factor both in everyday life and educational settings. Indeed, it plays an important role when it comes to understanding the linguistic functioning of a society both outside of and within education. We will then portray the main views on language attitudes and the way they can impact the process of education. Concepts like motivation and attitudes will be dealt with, in the shadow of the implication it has on education. This part of the chapter, will also reveal the role of language attitude and its status in relation to multilingual settings.

This chapter also includes the description of different aspects of language policy and language planning. It is a needed matter in our research, since all matters of education are strongly related to political decisions. The task of the last part is to explain the complex relation between language attitudes, education and language policy, and how these elements are interrelated and can affect each other.

3.2 Language acquisition in multilingual settings

In a bilingual or multilingual environment, child language acquisition is far different from settings where only the mother tongue is used. The events that Algeria has gone through, for example, have made of it a diglossic and multilingual society: on the one hand, the official language of the country is not acquired as a mother tongue and thus children are faced with a variety of Arabic, MSA, that is very different from their dialects; on the other hand, the French language is so strongly deep-rooted in the society that the colloquial forms of Arabic (and Berber in some regions) are full of borrowings and everyday expressions from French, the fact that makes Algerian Arabic hardly intelligible to other Arabic-speaking countries, except for its neighbour countries, Morocco and Tunisia, which were also subjected to a similar French colonial bilingualism, though to a lesser extent as already mentioned. In addition, Arabic / French codeswitching is common practice in the speech of many Algerian people who may use the two languages for the same or different purposes. So, the questions to raise here are: What mother tongue is acquired by Algerian children? And what medium of instruction are they faced with at school age?

3.2.1 Mother tongue in Education

The first language, naturally acquired by a child from birth, is often referred to as 'mother tongue' or 'native tongue' or even L1 when opposed to a possible L2 which might be foreign or learned as a second language. Indeed, the process of acquiring one's mother tongue is far different from learning another language at a later stage in the child's life. Since the advent of Chomsky's ground-breaking work (1957) on language acquisition, postulating the innateness theory, most linguists

today have accepted the hypothesis that we are born with 'something' in the brain that Chomsky labelled LAD (language acquisition device), which allows all children of the world to acquire the language they are first exposed to. As opposed to the behaviourist theory, which claimed that learning a language is based on stimulus-response, imitation and reinforcement, Chomsky's mentalist views (1960s) assume that a child comes to life with an innate capacity to acquire his/her mother tongue in a very short time, the fact that cannot be explained in behaviourist terms, in particular the creative aspects of linguistic competence; this led to a deeper and more abstract view of linguistic ability that Chomsky associated with what he referred to later on as UG (universal grammar). He observes (1965:28) that "the child constructs a grammar—that is, a theory of the language of which the well-formed sentences of the primary linguistic data constitute a small sample." The child is then predisposed to build a grammar of the language he is exposed to and soon he acquires the underlying structures of the system (phonological, syntactic and semantic) which allow him to produce an unlimited number of sentences, including those he has never heard before!

As for second language acquisition and UG, it has been suggested that L1 acquisition contributes to L2 acquisition on the basis that an L2 learner will put into practice the universal grammar already acquired, but gearing parameters towards the new language, though the issue has led to hot debate between supporters of L1 'help' in L2 acquisition and those who refuted the relation. Then, how about acquiring two languages from birth?

A child can also be exposed to two different languages or more, a simultaneous exposure which makes him naturally bilingual and sometimes equally proficient in the two languages. Such bilingual acquisition is to be distinguished from learning a second language later on, which results in another type of bilingualism. It is important to note that these two types of bilingualism do not affect education in similar manners.

It is believed indeed that the first language a baby is exposed to is not similar to another language they will be exposed to later on, neither in terms of cultural and psychological importance nor in the manner it is acquired. A second language is usually acquired more artificially than the first one, which means that the mechanism

of learning and acquisition are fundamentally different in the two cases; being exposed to a language for the first time is not the same as learning it at school or elsewhere and moving from the state of already knowing a language to learning another one is not similar to a brain receiving a native tongue during the early childhood.

Essential questions raised by scholars on this topic are about the extent of differences between the process of learning the grammar rules more or less consciously in the case of second language acquisition and what happens in the brain when a child at an earlier age learns step by step in an unconscious way all the grammar of a language. Other important mechanisms that are proper to first language acquisition and not to other languages learned later on are the evolution of learning from speech sounds to correct sentences. The mother tongue a baby learns to imitate when exposed to it is not like a second language he might learn only for a few hours at school or in contact with those who speak it. In other cases, the urgent need to communicate plays an important role in the learning process; in the case of a second language or a language learned at school, the need for communicating for a grown-up child or an adult is not as urgent as a baby's need as he knows no other way to communicate his basic needs with the environment around.

Research has gone further by explaining that the brain doesn't receive an L1 the same way it receives an L2. The first one is called FLA (first language acquisition) and the other is SLA (second language acquisition). Some recent research has shown that L1 is genetically triggered at a critical age of the child's cognitive development, which means that baby children are genetically programmed to learn a given language at a certain age and their brain starts to be ready for this type of acquisition. This is why the process of acquiring an L1 can be different from learning a language artificially later on. Linguists also think that children develop a complex rule-governed linguistic system in an unaware manner, which means the language system is learned unconsciously at an early age. L1 is usually acquired at a crucial period that matches cognitive development, when other life skills are learned which makes its learning more natural and more reinforced. Another important and crucial

difference between an L1 and an L2 is that children show no resistance to the mother tongue acquisition; it is as natural and unconscious and necessary as learning to walk, no wonder why these two processes happen similarly at the same time. However, since it is not 'vital' to learn a second language, the learning process is different. L1 is an essential biologically driven process that touches all members of society, even the brain-damaged or retarded children learn the full grammatical tools of L1 while they usually cannot learn an L2 so easily. In general, the learning of the L1 varies from L2 learning in the sense that it is more vital and essential.

Learning a second language is usually a different process in which it is not genetically triggered unless the child is bilingual which is in this case not really a second language. The syntax of the L2 is usually not acquired unconsciously which means it is not as rooted in the learner's mind as an L1 might be, and learners demonstrate less insight in a language learned consciously than they do for a mother tongue. The acquisition of a second language might happen at any possible age which means it is not usually at a precocious age where it can be associated and stimulated by other life skills development; it happens when the person already has a language and a system sustaining it in the brain. Learners of a second language might have some conscious or unconscious resistance to it and it will never be learned and mastered the same way as an L1 as it is not biologically triggered and a vital tool. Learners of a second languages as skilled as they can be, they will fail to develop a full generative competence.

Differences between acquiring a native language and learning an L2 are obvious and significant, without even taking social and cultural factors into account alongside with attitudes and identity that can enhance the importance of L1 for the speaker. All this gives rise to the question of education and learning, and for scholars those differences in the nature of L1 acquisition and SLA and their respective psychological and social impact on the individual will naturally have an impact on the nature of formal education, whether it is done in the learner's native language or a second or a third language he might learn after a while.

Usually, for countries that are officially monolingual or have one language that is officially recognized by institutions, the media and in education, but is also spoken as a mother tongue at least for a good number of the people, the transition from home language to school language is very easy and natural. The process is different however in other countries. Indeed, countries that are bilingual or multilingual for multiple reasons, such as colonisation, proximity with a 'stronger' language or weakness of their own mother tongue, will experience a different kind of formal instruction as the mother tongue differs a lot from the language children are exposed to once at school. As expressed earlier, the brain treats L1 and L2 differently which means that the process of learning an L2 is never similar to L1 acquisition and this will clearly impact education in the mother tongue or in another language.

Researchers also insist on the fact that even if a second language is well mastered, it would not be similar and well implanted as a mother tongue. In Arab countries like Algeria, the official language used in most governmental institutions and formal education, is literary Arabic, *al 'arabiyya al fuṣħā*, today referred to as Modern Standard Arabic (MSA), which is fairly different from the Arabic colloquial forms acquired as native speech by children. At a certain level of primary education, French then English, and sometimes Spanish, are taught as foreign languages. French however, the language inherited from the long-term colonization of the country, has a specific status as it is socially and culturally present to a large extent and depending on many factors in the Algerian speech community. Yet, it is not the native tongue of anyone, although it is the dominant instruction language in some scientific university streams. The other foreign languages taught at school are either due to proximity in the case of Spanish in the west and Italian in the east.

3.2.2 Bilingual education

Bilingual education is usually associated with school as the overall aim of this approach is to prepare non-native children living in another country, usually immigrants, to cope with elementary studies to the same extent as their native peers.

This is the case of Hispanic or Asian children in the United States where such bilingual programme was started as an attempt to resolve the issue of high rates of dropouts in only-English schools. The assumption was that initial teaching in the native tongue of these children and then progressive immersion in English-speaking classes would help them acquire more proficiency. However, not all schools agreed on this premise and some preferred the 'sink or swim' approach.

One early successful experiment of bilingual education was undertaken in the mid-1960s in Montreal (Canada) where a small group of English-speaking children were enrolled in a kindergarten class for a French immersion programme, the aim being to make them fluent in French and share its cultural aspects while preserving their English language and associated culture. The programme was labelled *the St. Lambert Experiment* whose success was empirically evaluated in a book by Lambert and Tucker (1972) whose interest was to develop full bilingualism in the setting of Quebec. This immersion experiment was followed by a number of researchers who delved into the evaluation of programmes of bilingual education in which the children are native speakers of English, a predominant language, acquiring a second language but not to the detriment of their first language. Other types of bilingual education have been investigated elsewhere, as we shall see below, in particular in the US where non-English children are immersed to learn the majority language, often at the cost of losing their mother tongue, Spanish.

Various definitions have been put forward as a result of the different sociolinguistic and social settings where it is implemented. In an early definition, Cohen (1975:18) refers to bilingual education as "the use of two languages as media of instruction for a child or a group of children in part or all of the school curriculum." In a deeper description, Cummins (2009:161) writes:

The term *bilingual education* refers to an organized and planned program that uses two (or more) languages of instruction. The central defining feature of bilingual programs is that the languages are used to teach subject matter content rather than just the languages themselves. Bilingual instruction can be implemented at any grade or age level, ranging from pre-school through university or college.

Cummins' definition gives an idea about the forms that bilingual education can take and how it is planned in different contexts, according to various factors, including language status, colonial legacy, immigration, and so on. Paulston (1980) on the other hand states the following:

Bilingual education is the use of two languages, as mediums of instruction for the same pupil population in a well-organized program which encompasses part of the entire curriculum and includes the study of history and culture associated with the mother tongue.

However, attempts at implementing such bilingual education programmes have raised issues that are primarily related to political decisions, particularly in the United States where Hispanic immigrant communities have grown to be larger ever, needing English for intellectual development and social mobility, but wishing to maintain Spanish as the language of their culture and identity. The 1968 Bilingual Education Act, intended to solve the problem of schooling for non-native pupils, went through fluctuations at the political level, between those who encouraged the programme and those who were hostile to it, i.e., those who wanted to allocate funds for bilingual instruction and those who favoured immersion programmes, the 'swim or sink' approach! In the *New York Times* (March 3rd 1981), President Reagan is quoted to have said¹⁵:

It is absolutely wrong and against the American concept to have a bilingual education program that is now openly, admittedly, dedicated to preserving their native language and never getting them adequate in English so they can go out into the job market.

Baker (2001:188) says in this respect:

Reagan believed that preservation of the native language meant neglect of English language acquisition. Bilingual education programs were seen as serving to neglect English language competence in students. Reagan dismissed bilingual education in favor of submersion and transitional programs.

Such view clearly reflects monolingual education for Americans and immigrants alike, which betrays the US contradiction: "migrants from all over the world and

-

¹⁵ Quoted in Baker (2001;187-188)

widespread monolingualism", as expert on language policy James Crawford said. Later amendments of the Act (1994), however, reauthorized bilingual education for non-native born Americans, Hispanic children, for example, but there are still hot debates on the issue in political spheres and in the US media. As a matter of fact, Crawford (1998:50), writes in a pessimistic tone:

Since the mid-1980s, critics have won increasing support for the contention that this experiment, while well-intentioned, has failed to meet expectations. Now, in the late 1990s, policymakers are seriously considering demands to limit or even dismantle the program. [...] The future of bilingual education is suddenly in doubt.

In other countries, like the UK, France or Spain, different models of bilingual education have been implemented for similar reasons as in the US, varying from partial to total immersion into the language of the country, or the languages of autonomous regions like Welsh in the Wales or Catalan in Catalonia. But the overall picture favoured by the governments is the promotion of the dominant language, as opposed to a schooling programme in Canada referred to as DLE (Dual Language Education) which has long been implemented in various models of language immersion to respond to issues of social inequality and culture particularly in Quebec where Francophones felt somewhat debased in front of Anglophones.

Another objective of implementing bilingual education relates to the high status that the English language has enjoyed for decades; this is particularly the case of the Scandinavian countries where English is much more than a foreign language as it is embedded in school content areas and subject-related learning, a process that starts in the first grades of formal instruction.

As far as Algeria is concerned, it is sometimes wrongly thought that bilingual education is part of its formal instruction system, in spite of its being characterized with societal bilingualism with the pervasiveness of French. In fact, French is only taught as a foreign language at primary and secondary levels. At university level, there is no bilingual education either; while Arabic has been the language of humanities, law and economics since the 1980's after a long and slow process of Arabization, French is the sole language used in medical studies, 'hard' sciences and

technological streams. In fact, the issue raised in this thesis would have been different had the policymakers and ministry of education implemented a real bilingual language programme in pre-university schooling with both Arabic and French as languages of content areas and subject-related learning; and thus today's students of medicine, physics or architecture would not be faced with the problem of lack of competence in the French language and would not fail because of the foreign language in which they are taught.

Likewise, our research work would not need a reason for existing if the Arabisation process in Algeria, started in the early 1960s, had not been interrupted by the early 1980s, for socio-political reasons, and certainly not for linguistic reasons. Even the decision not to continue the process of Arabizing for the so-called 'scientific' streams at the university was not official, which means that if a teacher decided to use Arabic, French or a mixture of the two languages, no official ministerial text would prevent them from doing that. The idea that laypeople have about the use of Arabic and French in the education system certainly comes from the confusion between societal bilingualism, a particularity of the Algerian society, and bilingual education for academic purposes.

3.2.3 Bilingual acquisition and bilingual education

Bilingualism is not a process that is only described and studied as the individual's capacity to be able to comprehend and use two languages. One of the most important questions that scholars are interested in is bilingual acquisition and the process that learning two languages goes through and its similarities and differences with the acquisition of one's native language. As already mentioned, bilingualism is not an exception and there are more bilinguals in the world than monolinguals in the world, which means that there might be more bilingual educational systems around the world than monolingual ones, which of course will also depend on the language planning and policies of each country.

A good example that we shall deal with at length in the next chapter for its basic relationship with this research is the development of bilingual education in Algeria during and after the French colonization, one consequence being today's issue for freshmen to have to study in some university streams in French, including medical studies, technological and 'hard' sciences, while general education before university is fully arabized today.

Bilingualism is described in an overall way as the capacity to understand and use two languages, to different extents of course, depending on individuals' aptitudes and speech communities' linguistic profile. A language can be understood or spoken more than the other depending on the level of proficiency or simply on situations, but bilinguals usually share the similarity in unconsciously incorporating two languages in their everyday linguistic behaviour. As a matter of fact, bilingualism can vary in terms of degree of understanding and use. Balanced bilingualism is the perfect type of bilinguality as it refers to an individual almost equally competent in both languages. However, this can be a very rare situation since it is more common to find a bilingual who is more competent in one language than in the other, which is referred to as unbalanced bilingualism.

Bilingualism also varies in terms of acquisition; two languages are rarely acquired simultaneously. In most cases, mother tongue acquisition precedes the other when a child's parents have a language that is different from that of the community where they live. But soon, the child will necessarily acquire the other language during the first years of socialisation in the neighbourhood or at school, sequential bilingualism, as it is referred to. But is it acquisition or learning an L2 second language?

Linguists often distinguish between language acquisition and language learning (Krashen 1981) in the same way they distinguish between the processes that the mind undergoes while acquiring two languages and the process it goes through 'learning' two languages via education. Bilingual acquisition may occur at an early age and is thus characterized by the natural process of acquiring two languages unconsciously while the child is unaware of the grammar rules. Obviously, children learn the two languages by imitating their bilingual parents or the bilingual society they live in. Usually, simultaneous acquisition of two languages at an early age is

unstructured and motivated by the will to communicate, an element which makes the whole difference from learning a second language at a more advanced age which is undertaken at elementary school. In the case of bilingual education, the two languages go through the process of structured learning directed by the teacher in an environment where grammatical and linguistic rules are learned consciously.

Neuroscientists agree that conscious and unconscious learning are processed in different ways in the brain, both for a monolingual and a bilingual. Learning or acquiring two languages is different and presupposes different purposes. Therefore, while acquiring two languages, mainly at a young age, is a natural process that supposes no learning or education to be achieved, bilingual education is wholly structured, controlled and supervised by teachers, a programme and grammar books. Also, what distinguishes natural acquisition of two languages from bilingual language education beside their different processes of learning is that the latter is part of a language planning.

3.2.4 Types of bilingual education

As already touched upon above, different types of bilingual education exist around the world having different purposes depending on political, social and historical reasons. Regardless of the multiple reasons that cause bilingualism to flourish, even if this phenomenon is primarily psychological, it has social implications and social and institutional dimensions. This implies that bilingualism is not only a natural psychological phenomenon; it is also used and institutionalised by the government according to factors such as global needs of the country, its linguistic situation and component and types of its speakers and national identity. The actual application of bilingualism at the official level can vary from the degree of use in official media, advertisement and education, the latter being indeed our concern in this research work.

It goes without saying that each country has its own history, linguistic situation and in cases of being a bilingual country, each government is going to direct its language educational policy according to its national identity but also its needs and relations with the outside world. For those reasons, the term *bilingual learner* can vary and be applied differently according to different countries. As defined by linguists, it is used in its broad sense to describe settings where a student who uses a language (L1) at home and a second language (L2) as a medium of instruction (MOI) at school. Most African countries, previously colonized by Europeans (mid-19th to the mid-20th centuries) fall into this category as children have to go through formal instruction in English in Nigeria, for instance, or French in Senegal and Algeria, though each country has its language-of-education configuration on the basis of various circumstances and historical events.

However, in other situations, as described by some linguists and educationists, a bilingual education programme can imply the use of two languages at the same time in the school curriculum which is the case of some bilingual countries today like Canada in Quebec or Denmark; for others each language is matched to a specific topic. In many of these countries, L1 is used at primary lower level – on the basis that the mother tongue is the best medium to start education –, and further grades are given in the colonial language in the case of previously colonized countries, or in a prestigious high-status language like English today. This type of bilingual programme is referred to as transitional (Siegel 2003). In all these cases, the mother tongue is in a diglossic relation with the learning language as they have distinct functions in Ferguson's view (1959). We will see in chapter 4 that the linguistic setting in Algeria is quite different from these in many respects. Bilingual education around the world has been simply summarized, in the following definition by Cambridge Dictionary, as "the use of two or more languages as media of instruction for content subject such as science or history." Therefore, it is not learning a second or foreign language, but studying non-language subjects like, for instance, history and geography in L1 and mathematics and physics in L2.

A multitude of models and approaches of bilingual education exist all over the world and differ to various extents. As commonly agreed, "bilingual education is the use of two languages as media of instruction for a child or a group of children in part

or all of the school curriculum" (Cohen, 1975:18). But the causes of bilingualism and other factors such as national identity and attitudes toward a given language and how a language is perceived by the native population can shape the nature and the attitude adopted towards bilingual education. Each country has some specific type of bilingual education that depends on its linguistic background. In the USA, for example, bilingual education is related to minorities and socially-disadvantaged learners: Spanish is taught to primary school children in American Spanish-speaking communities, often more than the main language (English), which can be the cause of lower education quality and poor academic achievement. In Africa, the concept of bilingual education takes another shape, as it is indeed quite often related to excolonial languages used as media of instruction.

Therefore, bilingual education in each country is perceived in accordance with its history, sociolinguistic development, attitudes towards L2 and other languages and other factors that can be taken into consideration to distinguish the different types. For a better consideration of the diversity of forms in bilingual education in the world, Baker (2001:192) prefers an approach that categorizes these on the basis of the aims to be reached, reducing thus the types into three models:

- *Transitional bilingual education* which, as he says, "aims to shift the child from the home, minority language to the dominant, majority language."
- *Maintenance bilingual education* which "attempts to foster the minority language in the child, strengthening the child's sense of cultural identity and affirming the rights of an ethnic minority group in a nation."
- Enrichment bilingual education, also referred to as 'developmental maintenance' "seeks to develop a student's home language skills to full proficiency and full biliteracy or literacy." Baker (ibid.) says that it also aims to extend the individual and group use of minority languages, leading to cultural pluralism and linguistic diversity."

We shall see in the next chapter that bilingual education in the Algerian system can be viewed in terms of 'transitional', but the issue is not so simple unless we consider the underlying aims of the language policy right after independence, then the problematic implementation of the Arabisation process. In fact, it appears that

many countries are faced with some specific type of bilingual education certainly related to political, historical, socio-cultural, and even economic factors, as the aims of each nation may be diverse to a large extent. Ferguson *et al.* (1977) have gone deeper into the characterization of bilingual education, the varying aims being:

- (1) To assimilate individuals or groups into the mainstream of society; to socialize people for full participation in the community;
- (2) To unify a multilingual society; to bring unity to a multi-ethnic, multi-tribal, or multi-national linguistically diverse state;
- (3) To enable people to communicate with the outside world;
- (4) To provide language skills which are marketable, aiding employment and status;
- (5) To preserve ethnic and religious identity;
- (6) To reconcile and mediate between different linguistic and political communities;
- (7) To spread the use of a colonial language, socializing an entire population to a colonial existence;
- (8) To strengthen elite groups and preserve their position in society;
- (9) To give equal status in law to languages of unequal status in daily life.
- (10) To deepen understanding of language and culture. ¹⁶

Showing the complexity of the process, Baker (2001:193) argues that

Behind bilingual education are varying and conflicting philosophies and politics of what education is for. Sociocultural, political and economic issues are ever present in the debate over the provision of bilingual education.

He has indeed suggested a further typology of bilingual education with an attempt to make distinctions between the models proposed, and each model may involve numerous variations of 'weak' and 'strong' forms (Baker 2001:194), as shown in the adapted tables below:

Table 3.1 Weak forms of bilingual education

-

¹⁶ Quoted in Baker (2001:193)

Weak Forms of Bilingual Education *				
Type of Program	Typical Students	Languages used in the Classroom	Educational/ Societal Aim	Language Outcome
SUBMERSION (Structured immersion)	Language Minority	Majority Language	Assimilation	Monolingualism
SUBMERSION with withdrawal classes / sheltered English	Language Minority	Majority Language with pull-out L2 ** lessons [held in a different location]	Assimilation	Monolingualism
SEGREGATIONIST	Language Minority	Minority Language (forced, no choice)	Apartheid	Monolingualism
TRANSITIONAL	Language Minority	Moves from Minority to Majority Language	Assimilation	Relative Monolingualism
MAINSTREAM with Foreign Language Teaching	Language Majority	Majority Language with L2/FL ** Lessons	Limited Enrichment	Limited Bilingualism
SEPARATIST	Language Minority	Minority Language (out of choice)	Detachment / Autonomy	Limited Bilingualism

Table 3.2 Strong forms of bilingual education

Strong Forms of Bilingual Education				
Type of Program	Typical Students	Languages used in the Classroom	Educational/ Societal Aim	Language Outcome
IMMERSION	Language Majority	Bilingual with initial emphasis on L2 **	Pluralism / Enrichment	Bilingualism & Biliteracy
MAINTENANCE / HERITAGE LANGUAGE	Language Minority	Bilingual with emphasis on L1	Maintenance / Pluralism / Enrichment	Bilingualism & Biliteracy
TWO-WAY / DUAL LANGUAGE	Mixed Language Majority & Minority	Minority & Majority	Maintenance / Pluralism / Enrichment	Bilingualism & Biliteracy
MAINSTREAM BILINGUAL	Language Majority	Two Majority Languages	Maintenance / Pluralism / Enrichment	Bilingualism & Biliteracy

• Adapted from Baker (2001:194)

3.2.5 Benefits and challenges of bilingual education

As a linguistic phenomenon, bilingualism has certainly its effect on the brain. Some scholars have argued that the bilingual brain can reach a faster level of learning and be more flexible. In the past, scholars agreed that being a bilingual could damage or delay an individual's natural intellect and it was seen as a barrier to the normal functioning of the brain. However, modern investigations have shown the opposite and the majority in the scholar community agree that the very fact of being bilingual can help the brain manage multiple tasks at the same time, and have greater memory skills. Many studies (e.g., Bialystok 2003) have put forward the idea that children acquiring two languages early in life, even sequentially, "develop both linguistic and non-linguistic cognitive skills", as Bialystok (2003:) argues.

Alongside with that, a bilingual can easily learn another language and encompass other cultures quite rapidly. Beside the old belief that the IQ of a bilingual can be lower than that of a monolingual, modern research has shown indeed, even if the majority of scholars favour bilingualism, that sometimes the process might have its drawbacks. For instance, they argued that since the two languages are always active in the bilingual brain, it needs more processing for the brain which can lead to lower verbal skills. Another study showed how bilinguals know fewer words of any semantic category in comparison with people who speak fluently only one language, and that bilinguals might suffer from "the tip of the tongue" problem. These some few costs are less focused on and being a bilingual is in general perceived as better and more efficient for the brain.

The complexity of history has made many countries bilingual, and a large number of these are left with bilingual education as a natural consequence. Alongside with this, the global and multicultural aspects of the modern world is leading to a larger number of countries and individuals to become bilingual and include bilingual education in their daily lives to cope with modernity. Just as being a bilingual or a monolingual can both have benefits and drawbacks for the individual, linguists have speculated about the benefits and drawbacks in countries with bilingual education.

Much evidence has shown important benefits of bilingualism to individuals and societies (Skutnabb-Kangas 2000, Cummins 2003, Baker 2006). In the introduction of her article, Bialystok (2011:236) says: "Studies have shown that bilingual individuals consistently outperform their monolingual counterparts on tasks

involving executive control." There is also evidence (Baker 2001, Bialystok 2003, Cummins 2003, etc.) that bilingual education leads to increased mental flexibility, favours metalinguistic knowledge, an ability that "describes the capacity to use knowledge about language as opposed to the capacity to use language", as Bialystok says (2003:124). As a matter of fact, early bilingual education has a significant impact on the child's cognitive development. Furthermore, a long-term exposure to a second/foreign language certainly improves intercultural skills as well as opportunities for global exchange and trade in the society at large.

However, bilingual education around the world has faced multiple challenges that are specific to each country. At what age should bilingual education start? For whom should it be put into practice? These are among the main questions about the different challenges that revolve around bilingual education. Another problem, put forward by some linguists (e.g., Baker 2001; Cummins, 2001) is that bilingual education can start once the learner has reached complete competence in L2 while others suggest that bilingual education may take place during L2 learning.

This challenge might be related to our concern as we investigate a fluctuating type of formal instruction in Algeria following a long process of Arabization level after level since independence. The process was stopped at university level where instruction is offered in French in scientific, medical and technological streams. The issue is that many students, the proficiency of the used L2 is not enough to keep up with other peers who have greater control of it. Bilingual education is a serious matter as it has a direct consequence on the general' level of proficiency in different domains; and when applied to minimise the drawbacks and maximize its efficiency, it needs to be investigated as a linguistic phenomenon to know its exact effects as it needs designing an appropriate model, policy/planning and managing a true bilingual education.

3.2.6 Bilingual education in Algeria?

Education in Algeria has gone through tumultuous events during its occupation and afterwards. Having been under French rule for more than a century

(1830-1962), a colonization whose objective was not only to take the land and its resources, but also to 'civilize' its people and to transform the country into a French department. All that resulted in a strong impact which made Algerians almost lose their language, culture and identity. In fact, as soon as the French had settled down, one fundamental intention was to eradicate the Arabic language by confining it to Quranic schools and *madrasas*, and to implement French as "the only language of civilisation and advancement", as Bourhis (1982:44) ironically writes. It was the language of formal education, first for the French and the settlers' children and later on for Algerians who were forced to accept the rulers' assimilation policy. In this respect, Kh. Taleb Ibrahimi (1997:42-43) ¹⁷ says that

French, the language violently imposed on the Algerian people, constituted one of the fundamental elements used by France in its depersonalization and acculturation policy towards Algeria.

Therefore, Frenchification was on its way to success, ignoring all values, identity and language that related to the colonized country which was soon regarded as a province of France. In the meantime, Algerian literacy in Arabic started regressing dramatically. Phillipson (1992:112) disapprovingly reports that

According to French government sources, when the French arrived to 'civilize' Algeria, the literacy rate in urban Algeria was 40 per cent – far higher than in France at the time. When the French left after 130 years of colonisation, the literacy rate among Algerians was, according to an optimistic reckoning, 10-15 per cent.

Indeed, by independence, Algeria had become a bilingual country as administration, business and other institutions, including education, were achieved in the French language while Algerian Arabic was used in everyday communication, and MSA was taught at school, just as a foreign language would be taught. Such linguistic policy was labelled 'colonial bilingualism' by Benrabah (2013:36) who writes:

In colonies, French conquerors imposed their own language on subjugated peoples with the aim of eradicating their languages, customs, thinking and values. They also

.

¹⁷ My translation of the original French text: "Le français, langue imposée au peuple algérien dans la violence, a constitué un des éléments fondamentaux utilisés par la France dans sa politique de dépersonnalisation et d'acculturation à l'égard de l'Algérie."

stigmatized and marginalized socially, economically and politically the speakers of dominated languages. In fact, colonial bilingualism defined perfectly French Algeria, and the other North African countries, Tunisia and Morocco.

Nonetheless, the Algerians benefited from instruction in French, first when it was appropriated by fighters for freedom in the mid-1950s during the seven-year war of independence; then, French opened up the country to modernity and the European world as a whole, and today, most people, particularly in the northern parts of the country, understand French and use it in various situations, including reading newspapers, watching films and documentaries on French channels and undertaking scientific, technological and medical studies at the university in spite of the fact that pre-university instruction has long been totally arabized and French is only taught as a foreign language.

Algeria can be placed among countries with weak forms of bilingual education at a certain stage of the schooling development. During colonization, all subjects were taught in French while Arabic was regarded and taught as a second language until the 1970s when the new independent government initiated the policy of Arabization in education and other institutions. Then, during the process, there were periods in which some subjects, like mathematics, physics and natural sciences were still taught in French while the other subjects were in Arabic. Today, the French language is only taught as a foreign language, alongside with other foreign languages like English and Spanish, though French is the first one taught at school.

However, the real relation between Algeria's Arabic/French bilingualism and its bilingual education is not that simple, due to the presence of the French language in many other sectors alongside with education and the job market, and mainly its cultural presence and impact. Compared to other purely educational foreign languages, French is not just a foreign language; sociolinguistically speaking, it has the status of second language, though not officially acknowledged.

In Algeria, young pupils start learning Arabic (MSA) at school and after two years, they start their first year of French, only taught as a language, and this will last

till the end of high school. Then, once at university level, students who choose to follow higher studies in some scientific stream, such as 'hard' sciences, medicine or technologies, are no longer taught in Arabic; the language of instruction is then French, whatever proficiency the freshman has reached in secondary school. Success in their studies will obviously depend of the proficiency reached in learning French during the school years, which also depends on other factors including the family environment, the parents with their use of and attitudes towards French, the area where the child grows, i.e., urban vs. rural as French is not favoured and taught in the same way everywhere in the country.

A few questions have to be raised at this level as to the persistence of French in Algeria. What reasons are behind its maintenance in science university streams from the part of policymakers without a real bilingual education programme? Will Algerian students definitely accept French as the only language of sciences? What are people's attitudes, after six decades of independence, towards this language previously associated with pain? In an attempt to predict its future in Algeria, Benrabah (2007:209) puts forward a few reasons for its maintenance, one being that

the formidable high birth rate and the development of urbanization in postindependent Algeria have led to a reversal in attitudes towards French among the new generations for whom the 'bitterness' towards the ex-colonial language has diminished.

It is worth reiterating here the idea that, concerning the bilingual character of large portions of the Algerian society, a clear distinction must be made between 'societal bilingualism' and 'bilingual education'. If bilingualism pervades the Algerian society – though to a lesser degree of literacy and proficiency among the youth of today's generations as a result of a massive Arabization –, and Algeria is thus informally regarded as a bilingual society, the issue of instruction in the French language in scientific, medical and technological streams remains to be solved, for there is no preparation in content-related French instruction in pre-university levels, i.e., no real bilingual education is implemented at primary and secondary levels. As a result, many students of the so-called 'scientific streams' 'suffer' with French, as we shall see, during the lectures offered to them, though others might be satisfied

with the language for reasons such as parents' support, motivation or their attitudes towards French, often regarded as a language of science and modernity. In any case, it is important to attempt an investigation of students' attitudes toward the language and their motivation.

3.3 Language attitudes and language learning

Success, in second language achievement was previously believed to be determined mostly by learners' aptitude correlating with intelligence. Batteries of aptitude tests were applied to measure the development of language proficiency, but it was obvious that aptitude could not be the only factor involved in the process; and researchers suggested other variables that may be associated with aptitude, in particular learner's motivation which Gardner (1960) characterized in two distinct forms: 'instrumental' motivation which reflects the learner's "interest in acquiring sufficient knowledge of the language for its instrumental value in goal attainment", as Gardner (1960:13) says; while 'integrative' motivation makes learners enjoy the second language and "orients students to make social contacts with members of the cultural community and thereby learn those linguistic skills which characterize that group." (ibid. p. 18).

In fact, a complex of different variables is involved in the process of acquiring a second language. One factor that has been favoured by researchers was also taken into account by Gardner and Lambert (1959) to explain the degree of second language achievement: it is the factor of 'attitude', a concept borrowed from psychology and social psychology later on.

3.3.1 The concept of attitude

The concept of 'attitude' was first used in psychology to characterize people's emotions, beliefs and behaviour towards various types of objects including events, persons, social groups or anything that relates to everyday life and results from direct or indirect experience. Fabriga *et al.* (2000:80) say in this respect that "an overall

attitude toward an object might be influenced by evaluations of many specific attributes of the object or emotions associated with the object." Similarly, Eagley & Chaiken (1993:1) have defined 'attitude' as a "psychological tendency that is expressed by evaluating a particular entity with some degree of favor or disfavor", and thus, an attitude towards any object is either positive or negative and results in a corresponding behaviour. As a matter of fact, various models have been proposed trying to depict the complexity of people's attitudes; one of the most influential ones is the 'multi-component model' (Breckler 1984) which views evaluations of attitude objects as comprising three components: cognitive, affective and behavioural (see also Eagly & Chaiken, 1993).

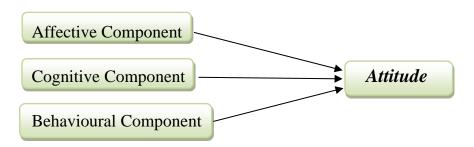


Fig. 3.1 The multicomponent model of attitude (Source: e.g., Eagly & Chaiken, 1993).

Hogg & Vaughan (2005:150) explicitly point out that an attitude is "a relatively enduring organization of beliefs, feelings, and behavioral tendencies towards socially significant objects, groups, events or symbols."

While the affective component makes you feel 'something' (good or bad) about the object which the cognitive component allows you to have certain thoughts and beliefs about it, your behaviour is determined by your overall attitude towards the object. If we consider, as an object in case, the French language in the Algerian sociolinguistic context as a whole, or in its education system, we will certainly find diverse attitudes resulting from people's knowledge about the language, their affect and their behaviour, particularly in learning it or using it in everyday settings; the overall attitude will be either favourable or unfavourable, maybe neutral for some. However, measuring an individual's attitudes has proved to be a hard task and may

better be obtained in an indirect manner, as people's responses might be affected by social desirability and thus will not reflect reality.

Social psychologists have insisted on the relationship between attitude and behaviour and shown that attitudes continuously impact people's behaviours and their views of the world, including, for instance, voting or not for a president, choosing one colour or another, learning a second language and even accepting of refuting and abstract idea. Working on personality traits, the American psychologist Gordon Allport (1935:810) proposed an early definition of attitude as a set of psychological reactions, regarding it as

a mental and neural state of readiness, organized through experience, exerting a directive or dynamic influence upon and individual's response to all objects and situations with which it is related.

Thus, after all, one might think that everything, all types of behaviour, can be explained in terms of attitudes. Our aim in this research will of course focus on students' attitudes towards the languages of instruction in the Algerian education system, at university level in particular. Nevertheless, researchers in social psychology of language have shown that, in addition to the concept of attitude, other affective factors may influence levels of second language proficiency, including motivation and language anxiety, as we shall see below.

3.3.2 Social psychology of language

Sociolingusitics has gone a long way in elucidating parts of the tight relationship between language and society and their mutual interference. The study of language use, variation and change has added a lot to the formal description of language in the Chomskyan paradigm which considers language as an innate capacity that human beings are born with. However, it is essential to explore language use and variation to have a better understanding of speakers' abilities of exploiting speech forms in various social contexts and making the most of their pragmatic manipulations to maximize the effects of meaning.

Language cannot be accounted for merely in terms of linguistic features on the one hand and socio-pragmatic factors on the other. Psychological aspects of language use are also important to understand speakers' linguistic behaviour. Attitudes towards languages and varieties of a language, accommodation to the other and degree of motivation play significant roles in characterizing people's use of language. Such aspects have been taken up by a multidisciplinary paradigm, an interface between language and social psychology, to unveil speakers' linguistic behaviour, their social interaction in various contexts and their attitudes towards the languages at play and their language users, too. Social psychology of language has emerged as a necessary paradigm to go deeper into the complexities of language use as a social behaviour and linguistic variation. Meyernhof (2002:148) claims that

any theory of language variation and language change must be equally well-equipped to articulate the effects of social and psychological factors as it is to articulate the effects of linguistic factors.

As a matter of fact, social psychological research on language has recently focused on the study of attitudes, beliefs and motivation over the few past decades providing a framework that attempts to understand sociolinguistic and social psychological processes affecting language attitudes and linguistic behaviours, particularly in mixed settings of various languages or ethnic groups. One important issue that social psychologists have dealt with is bilingualism,

Due to its complexity and importance in psychology as much as in human sciences, the study of language attitudes is investigated from many perspectives and in multiple fields. In fact, psychologists, sociologists and linguists tried to give an accurate definition of the term 'attitude', but as it appears it is not an easy task as the term varies according to the perspective taken, due to the fact that it has many levels and implications. In fact, in addition to the psychological component, speaker's attitudes toward other varieties have socio-economic, socio-political and cultural implications. It is evident that language carries much more than content and information, as Fishman (1971:1) asserts when writing:

Language is not merely a carrier of content, whether latent or manifest. Language itself is content, a referent for loyalties and animosities, an indicator of social statuses and personal relationships, a marker of situations and topics as well as the societal goals and the large-scale value-laden arenas of interaction that typify every speech community.

It is agreed upon that language is not only a means of communicating ideas and information but also a natural way that reveals the speaker's personal and social characteristics. In fact, willingly or unwillingly, a person's way of speaking reflects more than the actual shared verbal information; it reflects their social status as well or the region the person comes from and other information. Language might be, in some particular contexts, subject to either positive or negative attitudes, from other speakers and in some cases from the speaker of the same variety. Attitudes are a central theme in social psychology, as they are a decisive component that can dictate the linguistic behaviour of a speaker.

3.3.3 Language attitudes

Attitudes are indeed, a group of beliefs a speaker or a given speech community may assign to a given variety. In a general view of the term, Obiols (2002) defines attitude as the "mental disposition toward something", and Ryan and Giles (1982:7) see it as "any effective, cognitive or behavioural index of evaluative reactions toward different language varieties or speakers".

Speaking in the sense of expressing oneself, is not the only act that comes naturally. Having a positive or negative attitude toward a given variety is also a natural aspect of speakers. It is unlikely to find a speaker without a given attitude toward his/her or others' language or language varieties. All spoken varieties are therefore subject to being judged or measured positively or negatively. Indeed, language attitudes can simply be defined as "the feelings people have about their own language or the languages of others." (Crystal, 1992:215). Positive or negative attitudes towards a given language or a language variety may have multiple reasons: ethnical, religious, historical, social or regional ones are the most common factors that can shape an individual's attitude. Fasold (1984:158) asserts that

The evaluation of a variety is the fruit of experiences, products of a whole series of historical, social, economic, political and cultural implications that continuously interact with one another, turning the objective into subjective.

As individuals speak, their language, code choice, accents, vocabulary choice and speech patterns can be perceived by a listener as markers, and that listener may have a specific attitude based on these markers. Thus, a speaker might be 'detected' as smart, respectable, arrogant or friendly according to these markers, which a listener may portray intentionally or involuntarily.

Attitudes have also been studied in terms of two dimensions: 'status' and 'solidarity'; the term status refers to a group of beliefs a speech community may hold for a specific member of the society. For the sociologist Max Weber (1946), "People possess status in the sense of honour because they belong to specific groups with unique lifestyle and privileges." Thus, the concept of status can refer to an aspiration to assert a certain distinction and hold of power and it is usually associated with social aspects like wealth, important social class, intelligence, and power. In contrast, the feeling of solidarity usually does not seek power and prestige, but rather feelings like belonging to a common group, friendliness and closeness. In this respect, Brown and Gilman (1960:258) describe solidarity as follows:

Solidarity is a scale of perceived like-mindedness or similarity of behavioural disposition between a speaker and addressee deriving from their similar backgrounds, acquaintance, or personal characteristics, such as sex. In some languages, solidarity affects the choice of expressions of social deixis.

Socially speaking, the concept of solidarity is usually associated more with feelings like familiarity, intimate social interactions and politeness. As they speak, people are thus identified to belong to a specific social class according to specific markers in their speech which can either serve the purpose of asserting power or solidarity toward a given interlocutor.

Language attitudes, whether motivated by the sensation of power or solidarity, serve two main purposes, social identification and stereotyping. By listening to the way a person speaks, i.e., markers like accent, vocabulary use, etc, their social status

is immediately identified and recognized by a listener of the same community in a first place. Then, these markers will serve to 'stereotype' this speaker, associating traits according to the social class the speaker has been identified with. Thus, the listener's background will generate a positive or negative attitude toward the speaker, which can appear as judgments of status or solidarity.

The concept of language attitude is, also, strongly associated among scholars with behaviour, as already mentioned. It is common belief among sociolinguists and social psychologists that the possible attitude a speaker has towards a given variety will strongly affect his linguistic behaviour in a particular situation. Cohen (1964: 138) says for instance that "Attitudes are always seen as precursor of behaviour, as determinant of how a person will actually behave in his daily affairs." In fact, attitude is referred to as a factor that acts as a bridge between opinion and behaviour (Obiols 2002). Studies of language attitudes have therefore been given much importance as they can predict the linguistic behaviour of a given speaker. Giving utmost importance to the study of language attitudes in sociolinguistics, Obiols (ibid.) says it can "predict' a given linguistic behaviour: the choice of a particular language in multilingual communities, language loyalty, language prestige...".

As for Eagly and Chaiken (1993:2), they suggest that language attitudes are simply "a hypothetical construct which is not directly observable but can be inferred from observable responses." Indeed, a great number of scholars agree that attitudes are not directly detectable and speakers need to be put through various tests and indirect methods, in particular Lambert's *et al* (1960) 'matched-guise technique', to allow the researcher to possibly elicit responses that may reflect their actual attitudes. This is due to the fact that people are not always directly aware of their attitudes, and in other cases they do not always want to show them, especially if they are negative. For such reason, the obtention of the real attitude a speaker might have has been a debate in the scientific community, and it has been argued that indirect methods of testing speakers' attitudes are preferable.

The matched-guise technique

In all types of speech communities, speakers are always predisposed to have positive or negative attitudes towards a given language or language variety, or even an accent or style, especially in multilingual communities and multi-ethnic settings. Sociolinguists are interested in studying people's use of language in various social contexts, how their speech interacts with social variables, but also in how the extent to which their linguistic behaviour can be determined by their attitudes towards a given language or language variety and their users. However, language behaviour does not always reveal speakers' attitudes which are hard to measure directly.

Aiming at eliciting speakers' attitudes towards speech varieties and their users, Lambert and his colleagues developed, in the late 1950s and 1960s, a procedure referred to as the *matched-guise technique* to understand French Canadians' language attitudes. The procedure consists in making participants listen to short audio texts read out by the *same* person in different guises performing different accents or dialects, and the informants are asked to evaluate the 'speakers' on a number of personality traits like intelligence, honesty, leadership, kindness, etc. The researcher can then find out what characteristics are strongly associated with what accent or language. We have attempted the matched-guise technique in our research to try to elicit students' attitudes towards Arabic and French as languages of instruction.

3.3.4 Attitudes, motivation and language learning

Attitudes are considered to be a powerful tool that shapes the dynamics of linguistic interactions in a given social group; it is a tool whose purpose is to facilitate the detection and identification of different social categories. Furthermore, behaviour is not the only element to be analysed when it comes to language attitudes. Cognition and emotion are also basic components of a given language attitude. These three elements are always interrelated. In fact, a great number of scholars emphasise the fact that the affective component is an important element in language attitudes. The term cognition refers to the belief that speakers have about a given variety and basically, it is the act of 'knowing' that a given variety may offer a positive or a negative response. The affective component, however refers to the feelings involved concerning a given variety experienced during the act of speech. The same speech

can trigger a positive feeling or a negative feeling depending on the listener and their cultural background, needs or personal memories. The cognitive and emotional components can in fact depend on each other. The behavioural component, as mentioned above, serves basically to predict a particular behaviour based on a given attitude. It also refers to what leads to action, which reflects people's intentions (Eagley & Chaiken, 1993:12).

Language attitude, as a psychological phenomenon, occurs naturally in various linguistic settings and it can play a major role when it comes to language learning. In fact, many studies have shown that language attitudes and language learning are intertwined. The attitudes of a learner towards a given language and its speakers largely affect his/her motivation. The positive attitudes that learners might have for a language can dramatically decide the outcome of learning and therefore change that outcome, increasing the learning capacities and reducing the time dedicated for learning. Certainly, there is quite a difference between the mastery of a language and the attitudes toward a language, but in general, learners tend to master more quicky a language they favour. Dörnyei (2009) points out that attitudes make up an essential variable in the prediction of learners' proficiency and achievement. In the same line of thought, claiming the importance of language attitude as an input feature in language studies, Lambert (1981:3), says:

First of all, it seems to me that we are now in a good position to take a more comprehensive view of the roles that attitudes play both as determiners or predictors of the rate of skill amassment in a second or foreign language and as outcome effects attributable to the degree of skill or lack of skill attained in the study of the other language.

The concept of motivation is fundamental in the language learning process. It is described as the reason for doing something, the combination of desire and efforts to attain a goal (Gardner 1985). In other words, motivation is the sum of the learners' needs and their attitudes toward the target language and its culture, and thus is therefore a key element in the achievement of any competency, especially in the acquisition of a language skill. Gardner and Lambert (1959) developed a motivation

and attitude test, in which the intensity of motivation to learn an L2 was measured by the attitude toward that language, which shows that positive attitudes toward a language and the motivation to learn it are always interconnected.

When motivation to learn a given L2 is external, it is referred to as 'instrumental motivation'. It can be the result of a specific goal a learner has set to himself to be achieved and the mastery of that language is necessary for such purpose. Language learning in such a situation can therefore be considered simply as an instrument factor to achieve a specific goal. This, for instance, can be observable in situations where a learner's goal is to get a job or to achieve a professional purpose, and learning that language is the only key to it. Motivation, however, can also be the result of internal desires, such as the feeling of well-being or personal development that is looked for. In fact, the mastery and the wish to learn a given L2, in this case, reflects personal attachment to that language and therefore is dependent on a very positive attitude toward this language. In these situations, the motivation is not a mere instrument but comes as a natural need from within, which, as already mentioned above, is referred to as integrative motivation. This type of motivation has a social and an interpersonal purpose can serve, for instance, as a reason to gain friendship or identify with speakers of that language, or it can serve a certain social distinction or empowerment. Having a positive attitude in this second type is quite necessary and relevant. It is in fact, more personal and plays a role in social identification. For such reasons, this second type of motivation is more likely to be found in multilingual settings where speakers of different languages/varieties are more in contact with each other.

3.3.5 Language attitudes in multilingual settings

The notion of 'attitude' involves acceptance or non-acceptance of a given language of language variety. Psychological or sociolinguistic studies are therefore concerned with determining the reasons for such favour or disfavour. It is obvious that the occurrence of language attitudes is more probable in multilingual settings. In

fact, the majority of studies related to language attitudes are conducted in settings where multiple dialects and/or languages co-exist alongside each other. Researchers usually focus their research target concerning attitudes on such matters as learning a new language, a specific minority language, language communities and minorities, the uses of a specific language, language preferences (Baker 1992: 29), as attitudes are generally measured in accordance with these variables. Moreover, the notion of attitudes and favourability or disfavour of a given variety or language, can provide an indication of the status of a language in society. McKenzie (2015:37) reminds us of the importance of attitudes in sociolinguistic investigation, asserting that

One reason that the study of language attitudes continues to be a key dimension in the building of sociolinguistic theory is because explanations of sociolinguistic phenomena are most likely to reside in sociopsychological processes [...]. A further reason for the importance of the study of language attitudes in explaining sociolinguistic phenomena, is that despite the complexity of the relationship and the influence of the wider social context [...], attitudes are considered to be a major determinant of behaviour.

In multilingual settings, various studies usually focus either on attitudes toward the variation of phonological items, or attitudes toward the whole language. (Garrett et al. 2003:13). Assessing language attitudes in multilingual settings helps the understanding of the multiplicity and complexity of these settings, just as the understanding of multilingual communities can help evaluating the different possible attitudes inside. In other words, attitudes toward varieties are important in understanding the nature of multilingual speech communities. For instance, studies of attitudes can determine which social group can be more or less successful in domains like labour market or educational system (Garrett *et al.* 2003:12). Therefore, the study of language attitudes is a powerful tool to understand the nature of societies, to begin with, but in addition to that, researchers aim to analyse the very reasons that lead to such attitudes in a given speech community.

Multilingual speech communities usually involve the use of several varieties in one common society. These varieties can be dialects, accents or distinct languages. In fact, it is not rare that more than two distinct languages co-exist with each other in

these multilingual communities. In the majority of these cases, each language usually plays a distinct role and is associated to a specific use in daily life or a specific given culture or a specific domain of use. These situations, therefore, naturally involve the use of code switching in these complex speech communities. In fact, in the presence of multiple varieties/languages, speakers are often led to constantly code switch, depending on many factors, and as explained in previous chapters, code choice is a vital element in such complex situations. It is important to stress that the notion of languages attitude is directly related to the notion of code choice and plays a vital role in multilingual settings. In other words, when we talk about bilingual or multilingual communities, chances are very high that each language would be 'perceived' in a different manner, which can lead to different social groups having different attitudes toward each of the existing varieties or languages. This has, therefore, an impact on the concept of code switching and code choice, to the extent that we can state that code choice, in these multilingual settings, will depend heavily on the attitude toward a specific code. Moreover, the act of code switching itself could be the object of positive or negative attitudes depending on different speakers who might have different cultural backgrounds, social beliefs, or a specific sensitivity toward a given variety. To say that code choice is highly dependent on the attitude toward a variety, means that knowing the attitudes different communities might have can facilitate the prediction of who will use which code, and to know which codes are stigmatised and which are not can give an insight into the linguistic nature of a given speech community and help in better understanding that community.

Basically, we can only acknowledge the huge importance of attitudes in any language study. The significance of this concept is even more salient in multilingual contexts where several varieties are spoken side by side, a factor that can multiply the possibility of the existence of various and very distinct language attitudes toward the extant varieties.

As we are concerned with the Algerian linguistic situation in this research, it is important to reiterate that, in such a complex multilingual setting, the different attitudes that exist toward different languages and varieties, mainly Arabic and

French, have had a great impact in the educational system and on the instruction process. In other words, the factor of attitude is significant for the domain of Algerian education as a whole, a fact that we will explore in the next parts of the chapter. Meanwhile, it is worth attempting to give a short account of language planning and language policy, though from the start, we have to recognize the lack of a deep reflection on language policy from the part of the Algerian institution.

3.4 Language Planning and Language Policy (LPLP)

Language use and language status are of central importance to any country. In fact, language is a matter of national identity as it largely contributes to the gathering of communities and is an important element that assembles and represents a country's culture and identity. This is why the government in place, scholars and intellectuals are always making, or contributing to, new decisions and changes to adopt new plans that can affect sectors involving the use of a given language and its maintenance, language status and language in education. Language policy and language planning have a direct impact on language maintenance and vitality and its place in a country. These political decisions have a powerful influence on each individual and on the structure of the whole society.

The term *language planning* was introduced by Haugen in 1959, though it had already been used by Ulrich Weinreich in a 1957 seminar. The idea of working on language planning and policy (LPP) was born out of the necessity to solve language problems, particularly in newly-independent nations and multilingual countries. An early definition proposed by Haugen (1959:8) considers language planning as "the activity of preparing a normative orthography, grammar, and dictionary for the guidance of writers and speakers in a non-homogeneous speech community". Such definition concerns what was to be known later on as 'corpus planning'. In fact, scholars in language planning studies (Haugen 1959, 1966; Kloss 1969; Fishman 1974*b*; Cooper 1989, etc.) have distinguished between three types of planning activities: *corpus planning*, *status planning* and *acquisition planning*.

In an often-quoted description, Cooper (1989:45) briefly characterizes the three branches when he writes: "Language planning refers to deliberate efforts to influence the behaviour of others with respect to the acquisition, structure, or functional allocation of their language codes." Thus, while language planning deals with conscious efforts for deliberate changes in the linguistic behaviour of a given speech community, language policy has the power to officially decide the direction of the linguistic future of the country, in explicit or implicit terms.

- *Corpus planning*: It includes all actions that relate to the form of the language and its structure, and thus it may deal with some intervention on its spelling, script or grammar, from the part of experts in linguistics who believe changes in the form of a language would be appropriate or adequate for certain functions. It is the branch responsible for the development of lexis and terminology of a language. Standardization is regarded a form of corpus planning action required for socio-political or economic reasons as well as nation unification under one standard language.
- Status planning: Its main role is to have control over the choice of a language and the relation the official language of a nation may have towards other languages as well as the political consequences of the choice of a given variety. Cooper (1989:1) views status planning as "the decision to confirm a language in its functions and its domains or to introduce a new language into these functions and domains." Such a decision will raise or lower the status and the importance of a language in that country.
- Acquisition planning: It is primarily concerned with education as it consists of studying the linguistic situation to decide which language is more fit to be used in formal instruction. It logically follows corpus planning and status planning, that is, when the corpus development of a language is achieved and its status is established. It also plays the role of making the population accept and acquire these changes, and all this is generally undertaken through the medium of education.

Gibson Ferguson (2006:191) suggests that these three elements of language planning are not necessarily linear, and that for a language to develop it needs to be used. This implies that in some cases the first step is the status planning which will affect the corpus. On the whole, as Redinger (2010:95) states,

LPLP can be defined as a complex network of activities which operate both on the linguistic level (corpus planning) as well as the social and political levels (status planning and acquisition planning)."

In the early 1990s, however, some LP scholars, in particular Haarmann (1990) - and later on Kaplan & Baldauf (2003; Ager (2005) - began challenging the dominant LP model by considering its productive implementation from a receptive perspective, that is, by taking into account people's attitudes towards, and acceptance or rejection of, governmental LP decisions and application. Such bottom-up approach to language planning is termed *prestige planning*. Haarmann explains that while corpus planning and status planning are productive tools, prestige planning is receptive and should be taken into account by policy makers in LP overall implementation.

As a matter of fact, the task of language planning is not exclusively attributed to the government. In some cases, the family is where language planning begins. Different families with different social and cultural backgrounds may have different attitudes toward what "language" is more fit to be used and therefore could be considered as an active element in the language planning process. The family is, as a consequence, regarded as the first influential element in the language planning process. Education at school comes as the next step after the family, but is regarded as a more crucial sphere for language planning and language policy, as the language of instruction is usually implemented by official governmental institutions. In this regard, G. Ferguson (ibid. p. 33) states that

Education in most countries is largely funded and thus controlled by the state; schools are one of the key agencies of socialisation; school pupils are a captive audience, and the curriculum affords the state unequalled opportunities to shape the attitudes and behaviours of the next generation.

Indeed, after the child socialization at home and the role of the family in influencing their language use, comes the role of the government through mass

education, the major tool that shapes the official language in a given society, though the issue is different in diglossic situations like the one characterizing Algeria where the language of instruction, MSA in our case, is nobody's mother tongue.

Education is, therefore, considered as a perfect application field in the hands of the government and the educational institution, for it can have a direct impact on children's language attitudes and language behaviour and consequently on the whole society. Such influence at school comes in two ways: the first one emerges from the fact that a specific language or variety is used as the main means of instruction, which will naturally exclude other forms and shape the idea that the language selected is more important and therefore acquires the high status that the system wants it to attain. In this sense, the schooling system is a way of deciding which language should be excluded or valued, and which language is seen as standard and official and which one is considered as non-standard or foreign. Redinger (2010:96) states that

the inclusion or exclusion of particular languages at school as well as decisions whether specific languages are employed as media of instruction or taught as foreign languages can considerably influence the status of a language.

In the Algerian setting, the matter seems to be clear enough following the first 1963 Constitution which stipulates that Arabic is the official language of the nation and thus is to be implemented as the medium of formal education, though the process of Arabization took a long time (almost 30 years) to reach its full execution at primary and secondary school levels and well into tertiary level, except for the problematic issue of medical sciences, scientific streams and technology which are still offered in the French language. Benrabah (2007:195) reminds us that "French is still the key language for studies in scientific disciplines and has remained the language with higher social status and prestige."

The second way of influencing children's language attitudes consists in conveying ideological messages constructed about a given language or a variety, either in its favour or disfavour. Redinger (2010:96) says: "which languages are mentioned or not mentioned at school as well as what is said about particular languages can have an important effect on children's language attitudes and language

behaviour." Indeed, in the Algerian school, teachers often refer to al Sarabiyya al $Fu\$h\bar{a}$ as the best language ever, given its tight association with the Qur'an, the Word of God, some even asserting its divine origin.

3.4.1 Language planning and education in multilingual settings

In the face of the multiplicity of languages, it is the role of the government to make meaningful decisions about the linguistic situation. The purpose of governments in these situations is to decide which language is the national one, i.e., which language is more fit to gather the whole nation around a single identity, and which will represent a nation's culture among all nations. It is also the role of the government to decide which language has an official status in cases where a given language is not national but plays an important role in society and administrations.

In multilingual settings, the matter of education is quite specific. Indeed, the presence of multiple languages in a country generally has a direct influence on its educational system. As mentioned earlier in the chapter, corpus, status and acquisition planning are all interconnected, and certainly affect each other. When, to that complex network of interconnections, is added the complexity of multilingual situations, the result is often a mutual impact of the multiplicity of languages on the educational system and of the educational system on the languages used outside and on the general linguistic situation. In such settings, the role of education is even more crucial. Conserving a nation's identity by choosing the language that fits, and promoting a foreign language as the language for the benefit of development and sciences is a good example of the dilemma these multilingual settings witness. Education is tightly related to language policy and it is one of its key elements. In multilingual settings it plays a decisive role that can promote a language and discard another. It can therefore have a direct impact on the linguistic scene of the country. However, the nature of the multilingual setting and the changes that occur therein has to be taken into consideration to achieve better education. Language planning in this context can simply be defined as the political decisions that take into account the different linguistic variables outside the domain of education and re-arrange them in a way that benefits education.

In a multilingual setting, attitudes toward the different existing languages play a crucial role, not only in everyday speech but as well in educational life. Positive or negative attitudes toward a given language are the elements that favour or disfavour the use of that language. Consequently, this has a direct impact on language use in the education environment. For instance, a language that has more positive attitudes among a great majority of the population has a greater chance to be a better means of instruction, with possible outcomes as the facilitation and improvement of the learning process. For such reasons, factors like attitudes should be strongly taken into consideration when it comes to language planning, especially in multilingual settings. In fact, education is a key element in the domain of study of language attitudes, since the nature of these attitudes would have a direct impact on students' achievement and carries opportunities. Lewis (1981)¹⁸ eloquently expresses this equation between language policy, attitudes and education as follows:

Any policy for language, especially in the system of education, has to take account of the attitudes of those likely to be affected. In the long run, no policy will succeed which does not do one of three things: conform to the expressed attitudes of those involved; persuade those who express negative attitudes about the rightness of the policy; or seek to remove the causes to the disagreement. In any case, knowledge about attitudes is fundamental to the formulation of a policy as well as to success in its implementation.

In most multilingual settings, the mother tongue, acquired by the majority, is favoured to be the language of instruction; but in some cases, due to some specific political reasons or inadequate language policies, the mother tongue might be discarded at least to some extent or partially at some educational levels. This may have a negative impact on education and on the learners. This is the case of immigrants like those living in the US or the UK where real bilingual education is not implemented according to the requirements of minority communities' children.

_

¹⁸ Lewis, E. G. (1981) quoted in Baker, C. (1992:9-10)

3.4.2 Language planning and diglossia

In a diglossic setting, however, particularly in the Arab world, the school language is never the native tongue, a dialectal local form, but always the standard form referred to as MSA, which is not acquired by anyone as a mother tongue. Many studies have considered the issue of 'mother tongue as a medium of instruction' and approved the views long proposed by the UNESCO (1953) which promotes the inclusion of native languages as media of formal education, particularly in multilingual and multicultural communities. A recent statement, made in the 2016 UNESCO Global Education Monitoring Report, raises the issue of children's literacy and knowledge acquisition and the necessity of teaching them in the language they understand better, their mother tongue:

To ensure that children acquire strong foundation skills in literacy and numeracy, schools need to teach the curriculum in a language children understand. Mother tongue based bilingual (or multilingual) education approaches, in which a child's mother tongue is taught alongside the introduction of a second language, can improve performance in the second language as well as in other subjects.

However, if the UNESCO recommends that primary formal instruction be implemented in the child's mother tongue in a host country, perhaps along with the majority language, like English in the US for Latino communities, for instance, that medium of instruction would be the standard language of the community's country, or a close form of that standard. But in a diglossia situation like the one in Algeria, the medium of instruction *cannot* be children's mother tongue which consists of a multitude of Arabic or Berber dialects. The idea of teaching in primary school in dialectal Arabic has been proposed by the ex-Minister of National Education (2015), but it was faced with hostility and rejected by the government policy and the whole community, mostly because of the inappropriateness of dialects for knowledge and science in front of the power and prestige of MSA, but also because of the great diversity in the varieties of Algerian Arabic that does not allow a target choice.

This state of affair adds to the complexity of formal education, the two varieties H and L having separate functional distributions, being used in different

contexts. What consequences would we have if primary education was offered in a dialectal form of the pupil? Or would things be better if formal instruction were offered in some diglossic form or in some type of dual-variety teaching? In this respect, Dendane, Z. (2015:136) observes that

mother-tongue based instruction, is practically impossible to realize as it requires the homogenization of the various dialects which can only be obtained by means of the selection of *one* form of Arabic over the others and its standardization with everything that the process involves, including the formulation of a written form.

One solution to the issue, as we also believe, would be to start making children acquainted with the standard form Arabic earlier in life, in particular in kindergarten programmes for at least three years before school-age (Dendane, Z. 2015). Such immersion into MSA use, predominantly in its spoken form, starting with a kind of middle variety and by means of playful lively exercises, including audio-visual means, pictures and songs, will certainly make children feel gradually accustomed to a form of Arabic that would allow them to be ready for a smooth transition to school language and thus for better linguistic and cognitive development when they reach school age.

3.5 Conclusion

In this chapter, we have attempted to depict the linguistic situation in Algeria in relation to formal education, taking account of language attitudes on the one hand and language planning on the other, with the aim of characterizing students' linguistic behaviour towards the two standard languages, Arabic and French, in relation to intellectual development. In an earlier article, Dendane, A. (2011:75) says that

One important outcome of such co-existence of two prestigious languages in the Algerian society and the persistent bilingualism lies in the contrasting and sometimes conflicting attitudes towards these languages.

To gain a better perspective on the nature of linguistic interactions and language use in education among students of different branches, many factors need to be taken into consideration. A multilingual setting like that of Algeria offers a good

example of the diversity of students' linguistic behaviour and attitudes due to the linguistic diversity. In the first place, it is important to understand that the process of acquiring a mother tongue and learning in a secondary language is quite different. Consequently, researchers have found that pupils' learning in the mother tongue might be more efficient. In Algeria, it is natural that a child will acquire the mother tongue during the first years of his life, and once at school he will be learning MSA, years later at university, after a long process of MSA mastery, some students, especially in some scientific branches, will have to get accustomed to the fact that the French language is the only means of instruction. Indeed, due to the complexity of the linguistic situation, involving diglossia and bilingualism, some students find themselves trapped in a constant change of the language of instruction, which affects their skills and cognitive capacities. For such reasons, it is important to understand the different types of bilingualism, and the nature of bilingual education for an optimal use in context like the one in the Algerian system.

What is certainly interesting is to assess the mutual influence that language attitudes and education have. In fact, the way students value a given language of instruction has a direct impact on their capacities as well as their achievements. Once again, due to the multiplicity of languages and language varieties, it is only evident that as much multiplicity exists too when it comes to language attitudes. One of the objectives of our study has been to understand how much different language attitudes can affect students' linguistic behaviour and cognition. It is also necessary to understand the reasons for these differences and how they can be overcome with the perspective of a better educational system where every individual can benefit equally. It is unfair that access to knowledge depends simply or randomly on their positive or negative attitudes toward the French language, for instance, or Arabic in some cases. It is indeed the role of language policy to find solutions to such issues. The link between language policy and education is quite evident, just as the connection between education and language attitudes. For such reasons, language attitudes towards a given language have to be taken seriously into consideration in any step of a language policy whose purpose would be the development of the educational system.

Chapter 4 Methodology and Data Analysis

4. Methodology and Data Analysis

4.1 Introduction

This last part of the thesis is dedicated to the analysis of the collected data and the fieldwork investigation. We will then try to confirm or reject our main hypotheses based on a methodological work. The ultimate aim behind this work would be, to some extent, a reflection upon the sociolinguistic reality of university students and an investigation of their attitudes towards the language of instruction in relation to their personal proficiency. It is on the one hand an investigation of the social profile of the Algerian student, in general. We suggest that the social background of each student is, to some extent, responsible for their respective different attitudes and linguistic behaviour. On the other hand, it is also a reflection on the linguistic choices of the current educational system in terms of language use in the classroom and language planning in education and the efficiency of this latter in reflecting and enabling the real student's capacities.

Our sample population consists exclusively of university students and mainly from Tlemcen University, to the exception of some teachers and some other students from other Universities. The preceding part of the work includes the theoretical background that are necessary to the understanding of the main linguistic phenomena these students may experience. Furthermore, the historical and linguistic setting dealt with in the chapters are also a key element in the analysis and the study of the present subject. We believe that the present linguistic situation in Algeria is not understandable without the knowledge of the different historical events that have made it what it is. Besides, we also believe that the nature of the present educational system is not detachable from the linguistic situation in Algeria. In other terms, we can state that the educational system is a reflection of broader sociolinguistic realities of the country, and the language policies undertaken in the educational system reflect the higher linguistic issues that concern the whole country including its identity.

In the first part of the chapter, we shall expose a brief introduction to the theoretical backgrounds concerning methodology in sociolinguistic research; then, we describe the research instruments used in our work explaining how they serve our current research. The second part will be dedicated to the analysis of the collected data and their interpretation in accordance with the theoretical background and our current hypotheses, based on the collected data, hoping to obtain patterns and information that are significant enough to sustain our suppositions.

4.2 Methodology

More than any other branch of linguistics, sociolinguistics is the one that needs evidence and experimental work within the field. Indeed, after its emergence, sociolinguistics started to take shape influenced by its predecessors, sociology, anthropology and dialectology, resulting thus into an interdisciplinary branch. As a matter of fact, it developed out of theoretical and methodological influence which led to Dell Hymes' anthropological studies, John Gumperz' interactional ethnographic research, Joshua Fishman's work in sociology of language and William Labov's variationist linguistics. Sociolinguistics, then is the branch that studies language in relation to social interaction and, evidently, it needs most experiment conducting in everyday social life and people's language interactions in natural contexts, that is, real-world linguistics, a methodology that is far different from armchair linguistics favoured by formal linguists. For such reasons, quickly after its emergence, sociolinguistics witnessed the development of several fieldwork methods that aimed at studying the many complex phenomena that result from language being affected by social factors.

Though fieldwork research and data collection go back to rural dialectology studies, Labovian methods have developed into investigations that are appropriate for urban areas like New York City (Labov 1966) with the aim of determining how linguistic variables correlate with social variables such as social class, age or gender, and how eventually linguistic variation leads to language change.

Labov (1975) was one of the pioneers in sociolinguistics and affirmed that analyses in this field, unlike prior methods used by formal linguists, should not rely on introspection but rather on observation, experiment and constant use of tools within the social life to obtain significant data. He states, indeed, that a researcher, himself being a speaker, may tend to make an introspective assumption but experience, once again, proved that way to be wrong. Moreover, in a domain like sociolinguistics, theories are strictly the result of empirical observations of language use within a real social interaction context.

Today's sociolinguistic research has gained much advancement when compared to older times, when the Saussurean and Chomskyan belief to set aside the 'performance' and 'parole' dimensions for their complexity were the most dominant ideas. In fact, it is the complexity of language in use that is the real nature of human languages, as no society is really linguistically homogeneous and variation leading to change is the rule. Moreover, it is that complexity that offers much to be studied. This has led pioneers like Labov and Bernstein to advocate the consideration of social factors in the study of speech communities. As this field developed, the techniques and methods used in the field have evolved consequently, to the point where modern research in sociolinguistics have offered a large number of research tools and methodologies that can guide them for results with optimum significance. In fact, methodology and research instruments and direct work on the field are the pillars of any sociolinguistic research.

In our present research, we have used some adequate tools that are adapted to our work and can provide answers to our primary questions. In fact, our study is basically concerned with students' language attitudes and the impact these can have on their linguistic skills in education. Our research methodology will be a triangulation, where several instruments would be used to obtain results that converge into some main ideas. A series of questionnaires that differ in form and purpose will be attributed to different people in terms of age or branch of study, in combination with structured interviews addressed to teachers and students from different branches.

In addition to that, classroom observation and speech recordings will also serve as combined tools to obtain the needed data.

Research traditions vary in sociolinguistics depending on the needs and the tendencies. The variationist model for instance, proposes to analyse data based on large amounts of statistical information, i.e., statistics that would be interpreted to have a significant sociolinguistic meaning. For social constructivists, however, it is understanding the nature of societies and social categories that permits a better understanding of language use in social context. For this reason, the focus in this tradition is on what people believe about a language or a dialect and their attitude, judgments and reaction to a given variety. It takes into account the subject's personal view and not only perceive it as significant statistics. In our research, we consider the use of techniques and ideas from both models, i.e., we shall have questions that require statistically significant answers. At the same time, we propose questions that reveal the attitudes students have toward the different languages that are concerned, in addition to interviews that reveal the subjective point of view of the interviewee.

Research in fieldwork is undertaken under into two kinds: qualitative, which does not take much into consideration the number of answers as much as the quality of the answers, and quantitative, which instead tends to quantify the results obtained with quantity as a significant element in the research. Our work includes the two approaches, both being necessary for a complementary outcome. Indeed, some questions will be of quantitative nature where the number of answers is significant and other types of questions, especially in interviews, will rather tackle the attitudes and positions of each individual.

4.2.1 Research instruments

4.2.1.1The Questionnaire

Questionnaires are probably the most well-known and most often used tool in sociolinguistic research and human sciences in general. This is due to the fact that it is the most direct technique to obtain a maximum amount of information in a very

short time. For our research, a series of questions was administrated, most often to students, as our goal requires to, with the aim of obtaining direct information. The questions were, for the major part in our work, of the closed type.

Two sets of questionnaires were administered to students enrolled in the first years of medicine or biology in Tlemcen University: The first variant of the questionnaire was sent to the students in paper form to fill in; then, at a later date, we devised a slightly different variant to use on *Google Forms* sent to Facebook groups including again students in medicine and biology but in Oran University, in addition to a FB group of architecture students here in Tlemcen. The questionnaires were directed to students of different branches with the hope of detecting their respective different attitudes towards the two languages, Arabic and French, and their language use in higher education settings. The questions used in our work fit into two categories: questions with the purpose of determining the skills of the informants and their use of Arabic and French. On the other hand, there was the purpose of revealing students' attitudes towards the languages used in formal education. Some of the questions have also the purpose of determining the social backgrounds and tendencies. Further in the analyses, we hope to relate these social backgrounds with these student's skills and attitudes in order to put them into different categories which might explain their code choice in the educational context as well as outside.

4.2.1.2 The Interview

The interview is a powerful tool in research, but its contents have to be designed according to the objective to be reached. The sociolinguistic interview protocol in the Labovian framework (Labov, 1966; Labov, 1972, etc.) considers a number of linguistic variables to be correlated with external factors such as socio-economic class, age, gender, ethnicity, level education, etc., with the aim of observing speakers' styles and linguistic variation to elicit their spontaneous vernacular speech. Another outcome that Labov (e.g., Labov 2001) reached was showing that language change may originate from above – consciously triggered by speakers from higher classes to sound more dominant but also used by lower classes to imitate higher status people and to sound more educated – or from below the level of consciousness,

usually from within a vernacular and partly originating among lower class people, particularly younger ones and females.

In our research however, the aim of the interview is not to investigate speakers' language variation or speech styles; it is done as a complementary device with the questionnaire as it adds additional information intended to be more specific at a personal level, by collecting some of the respondents' feelings about and opinions on the language issues in Algeria, and to attempt to elicit their attitudes towards French, the language of instruction in medico-scientific university streams, as opposed to MSA, the language of formal education in pre-university schooling and in other streams at the university.

Interviews are divided into three major types: structured interviews, where the interviewer has a well-defined and well-ordered series of questions in mind and the interviewee is allowed to select their answers from a specific list. The freedom is rather restricted in this type of interview but the advantage lays in obtaining the exact needed data. Semi-structured interviews offer some freedom; the questions are still predetermined but the interviewee can answer in his own words. This method offers at the same time the possibility to have qualitative-like answers where the respondent expresses deeper and more personal thoughts, more freely, yet in a structured manner predetermined by the interviewer. Unstructured interviews, however, promote total freedom of interviewee and the interviewer with the goal of gathering deeper and personal stories that help understanding the topic. It is rather informal, spontaneous and based on open discussions.

In our work, we shall have both structured and semi-structured interviews, as we think, for some questions the interviewee should be guided by limitations and for others offered the freedom to express themselves, with the prospect of obtaining statistically well-defined data on some basic elements like language preference at the university and language skills, and an in-depth insight on people's opinions, attitudes. At times, an unstructured interview shall be used as it usually adds valuable information. The interviews are conducted with a number of respondents, taking into consideration variables like age, level of education, in addition to social backgrounds:

freshman or senior students at the university, teachers or medical doctors in order to obtain data about language use and language attitudes, in particular towards French, the language that sciences students are confronted with at the university.

4.2.1.3 Classroom observation

Evidently, all sociolinguistic factors, added to language planning, result in particular language use and language attitudes inside the classroom. Therefore, classroom observation is a necessary tool in our case as it helps in the study of language phenomena related to education. It involves the act of observing the teacher's performance with students' interaction which helps us obtain a well-defined set of information. In our case, it is not the lecture itself or its structure that is investigated, but rather how language is used and different language attitudes towards French and Arabic in different branches at the university. The goal is to observe who among students have positive and who have negative attitudes toward the French language, and how this can affect their skills and consequently their academic performance. The goal is also to see whether teachers deal with the lack of skills in the needed language in a specific field. The observations will be held especially in science-oriented classrooms, basically at the university of Tlemcen.

4.2.1.4 Audio-recording and note-taking

Audio-recording and note taking is the last tool used in a complementary way with other research instruments mentioned above. The purpose in recording live discussions between students or students and teachers, inside or outside the classroom is to have a live representation of actual skills/attitudes, language use/language difficulties when using French. Notes were taken from the recordings for analysis, but one thing we weren't able to do was to tell the people that I was recording them. However, the recordings will remain anonymous.

4.3 Participants and setting

As in all sociolinguistic research, the participants in our work can be distinguished into those to whom a questionnaire was administered and those who were interviewed. The questionnaire was performed among university students: one hundred participants on the internet and thirty participants in real life, then around fifty respondents on Google Forms. Although the method of administering the questionnaire was not the same, we see no difference in terms of results and needed data. All groups, i.e., via internet, in Google Forms or in real paper answered the same way to similar questions. The use of internet was mainly done for the purpose of facilitating and making the process of data collection faster; in addition, it served to reach distant students (Oran, Algiers, Annaba, Bechar) whose participation can be valuable in data interpretations. Other complementary questionnaires have been added to obtain more data on specific questions, like language attitudes, language skills, language planning in addition to geographical location and how this factor can impact students' language attitudes. The participants are from different places, different social backgrounds and different in terms of age and academic level. These students are exclusively enrolled in scientific branches, for the majority at Tlemcen University, but also from other universities in parts of the country as well.

In the interviews, the respondents were mainly students of medicine, chemistry, physics, architecture, but also teachers in architecture and medicine. The interviewees were contacted directly or via internet. As mentioned earlier, the purpose was to collect further data that come to complement the series of questionnaires and to have a more personal way to approach students and their belief and knowledge on the matter. The interviews were conducted mainly at the university of Tlemcen, but some students and teachers were interviewed outside.

In classroom observation, students and teachers of medicine and architecture were observed, both at the level of Tlemcen university. Recordings, happened in different places in an unstructured manner at the university targeting basically students of scientific streams and their random natural conversations outside the classroom, yet talking about their specific studies.

4.4 Data collection and analyses

4.4.1 Structure of the questionnaire

We shall start our analysis by discussing the results gathered in the distributed questionnaires. The first item serves to distinguish female and male respondents, a detail that can affect code choice. Gender is not a central part of our work, but we preferred to mention it as a side factor that can affect other results in our work. In fact, 60% of the informants are females and 40% are males. In the second part of the questionnaire, students were asked to state their birth place. We hypothesize that both language use and language attitudes can be affected by the geographical origin of the student. The next questions are dedicated to know students' branches and their level at university. This helps in distinguishing scientific branches from non-scientific ones and relate it to their respective answers. We suggested to point out the year of education for students since being a freshman and an experienced student might result in different skills in the language of education.

The first and the second question aim to determine the differences in terms of basic competence in the French language and MSA, particularly in the skills of speaking and understanding; the purpose behind this is to verify the extent to which language use in the classroom and language attitudes are affected by it. The series of questions that come afterwards have the purpose of discovering the possible different attitudes toward the two languages at play, by asking students about the language they favour during their leisure and entertainment time as well as on social media. Students, then are asked to determine their level in the two languages, but also in English given its overall presence as a global language gaining more and more ground in the Algerian society. Students are also asked to determine the frequency of use of expressions in Standard Arabic and French in their everyday dialectal conversation. This helps us distinguish their natural tendencies, attitudes towards the languages and the skills in each one, which might have a direct effect on the student's proficiency and language use in the educational context.

The questions that come next are dedicated to determine the extent to which students agree on French being the language of instruction in scientific streams while Arabic is the official language in which they had all their pre-university schooling. We thus ask them if they have difficulties in their studies in French, a central question in our work to which, as we believe, all cultural backgrounds, attitudes and regional factors converge. To what extent can the lack of competency in the French language affect students' capacities and academic success in the scientific domain they have chosen to achieve? And what is the position of language policy in this matter?

A matched-guise-like question comes next with the purpose of seeing how students who are good in the French language are perceived. This tries to elicit attitudes toward those who are proficient in French and those who are not, and by extension towards the language itself. We hope to explain the reasons behind the different positions that students might have vis-à-vis those who are fluent in the French language. The last question, which asks the students whether their parents use French and MSA often use in casual settings, will serve to determine the link between cultural backgrounds and linguistic proficiency and consequently language attitudes and approval in education, and how these elements can be linked. Then, by means of *Google Forms*, an online survey platform, we have been able to create questionnaires to be sent to students on Facebook groups, a method that has helped us obtain data quickly and from various universities and targeted departments.

4.4.2 Data Analysis

4.4.2.1Primary analysis

In this investigation, we aim to shed light on a research problem that can be summarized as follows: All across the country, students doing scientific branches are faced with a total switch of the language of instruction. Indeed, as already mentioned, the only language of instruction for all pupils, without exception, before university studies is Arabic in its standard form, referred to as MSA. Once at university level, the language of instruction diverges basically in a manner that MSA is used for all human and social sciences and the French language for all other scientific streams: natural sciences like biology and chemistry, formal sciences like mathematics and computing and applied sciences which include medical branches and engineering.

Although French is compulsory during cycles that precede university, it is only taught as a language, and often not in the right manner which does not offer all students equal chances to get along with the courses offered exclusively in French in scientific fields, a decision of sudden shift that can hardly be understood in the western world or even in eastern societies. In reality, given the inability of providing the necessary means for an upper-level Arabization, it's a tacit decision as there is no official text that prevents or allows these university science streams to be taught in French. Consequently, this can be disadvantageous for a large category of students, mostly those of the Sahel regions and the Sahara.

The purpose of this analysis is to define the profile of these disadvantaged students and shed light on the sociological factors that differentiate them from those who do not seem to have language problems. We will also try to shed some light on the language attitude factor that, in the absence of a well-structured language policy vis-à-vis the problem stated above, can seriously affect students' academic achievement during their whole education curriculum at the university. The results for the first question obtained from different departments are as follows:

Qu. 1: Which language do you speak better (Standard Arabic/French)?

The answers are represented in the following pie chart:

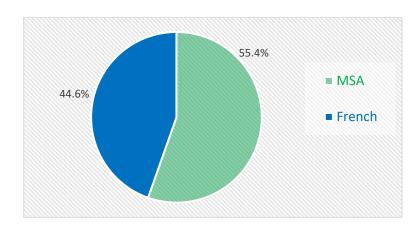


Fig. 4.1 Speaking skill in MSA vs. French

The pie chart clearly shows that Arabic is mastered more than French for a slightly greater number of students. This is normal, as, regardless of their personal

proficiency in the French language that differs from one student to another, all students were educated in Modern Standard Arabic before university. In addition to that, Arabic being the national and official language of the country, it makes students' proficiency quite a natural fact. This being said, the data represented in the chart can lead to two main suggestions: First, for a country where Arabic is the national and official language, it seems to be abnormal that, in this sample population, 44.6% think they master French more than MSA. This might suggest that other extra-educational factors are responsible for their language proficiency and by extension among the population. What would have been normal for an officially Arab country, would be to expect that the majority of students speak Arabic better in the first place, while competence in French comes only as a choice and in a second position. But we have to remember the diglossic character of Arabic: MSA is not anybody's mother tongue in the community and is only practiced in restricted domains and thus almost never used in casual conversations. We will come back to this part of the issue in later sections. Second, we suggest that some socio-cultural aspects and factors, such as language attitude towards French, have definitely a decisive role to play when it comes to language proficiency in general and in the context of education in particular. In other words, if all students had the same Arabic-based education, they should have all said they master Arabic better; but it is not the case, as almost half of the sample (about 45%) said they are more competent in French which can be explained by their desire to succeed in their studies and thus their positive attitude towards French.

Furthermore, we wonder why all students having had the same lessons in French as a second language in their pre-university schooling, yet their proficiency in French does not seem to be shared by all. One can suggest that language proficiency in either Arabic or French might be the result of a tendency towards the former or the latter; it may also be due to the degree of teachers' competence in French or Arabic, but this doesn't rule out the suggestion that students' differences in proficiency can be due to the complexity of the Algerian speakers with different attitudes and socio-cultural backgrounds, reflected in their language proficiency.

Another problem raised in this chart can be put in the form of a question: As most students who participated in this questionnaire are in scientific branches, and a slightly greater number said they master Arabic better, and yet they still have a good level in French, there must be a category for whom mastering Arabic and being in a scientific stream offered in French can be a serious problem. In fact, if the majority think they master Arabic better while having all their studies in the French language, then we can say that the problem lays in the language policy that does not act on the current linguistic situation for the benefit of the majority.

The second question, in which students were asked to describe their understanding skill in both languages, reveals that again the gap is not so wide between students who think they understand Arabic better than French and those whose comprehension is better in French.

Qu. 2: Which language do you understand better (Standard Arabic/French)?

The results are shown in the chart below.

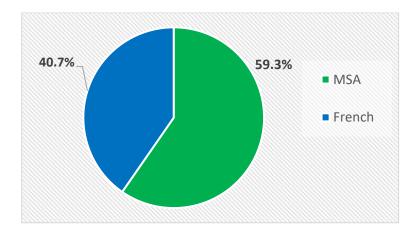


Fig. 4. 2 Language comprehension in MSA vs. French

In fact, the same observation we have made on the first chart applies for the second one. In an Arab country, it is odd that a significant number of students still understand French better than Arabic. It is certainly not a disadvantage for these students to have university lectures given in the French language. On the other hand, Fig. 4.2 says that 59.3% of the respondents feel they understand Arabic better, a

number that is higher than half and quite significant. For an Arabic-speaking country it is quite normal, yet for a group of students whose success in their studies is entirely dependent on understanding French is quite alarming. Understanding is obviously the critical skill in any language and crucial when it is the language of instruction. The results represented in this chart indicate that for a number of students, those who say they understand Arabic better than French, there are difficulties in understanding the lectures. The verification of other data would help us confirm the truthfulness of the information. Yet, the rates of both skills, speaking and comprehension, indicate that probably many students in scientific streams are not fully ready to have their lectures only in the French language. With a higher level of proficiency in basic skills in Arabic among the majority, it makes more sense to think of lectures offered at university level in MSA or at least in the form of bilingual courses.

The data collected about the skill of reading are represented in the next chart. Qu. 3: In what language do you prefer reading (Standard Arabic/French, both)?

The results are portrayed as follows:

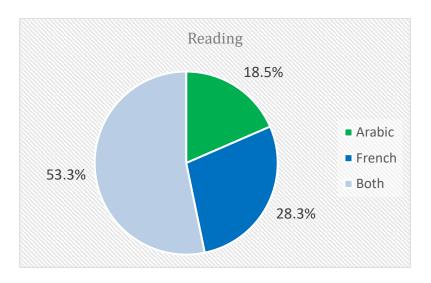


Fig. 4. 3 Students' language preferences in reading

Preference in reading, in a given language, can be an indicator of two main aspects: First, it reveals that those who prefer reading in Arabic will certainly find difficulties or discomfort in reading their written lectures in French. It is noticeable

here that few students (18.5%) prefer reading in Arabic and some of these also said they have better understanding and speaking skills in Arabic. Knowing that these students are enrolled in scientific streams, they still have the right to study in a language in which they prefer to read understand and speak better. The second aspect that can be concluded from the data represented in this chart can be stated thus: attitudes toward a language play an important role in the choice of reading books or newspapers in that language, but again these students are somewhat at a disadvantage compared to those who have the aptitude to read in French.

However, the presence of French can also be explained by the factor of positive attitude toward that language among a certain number of students. The first and second chart show very well that Arabic is more understood and spoken than the French language, yet a lesser but still significant number affirms understanding and speaking French better, and we can conclude that the reasons of the significant rates, portrayed in the two charts, can only be explained in terms of language attitude. In other words, knowing that all respondents have had more or less the same education in Arabic as a language of general instruction and French as a foreign language up to the end of secondary school, the education factor alone cannot explain the significant competence in the French language.

4.4.2.2 Language attitudes and sociocultural factors

In the fourth and the fifth questions, students were asked to reveal their linguistic preferences when watching movies, series or social medias and the web. Again, it is the two competing languages, Arabic and French, that students are asked about, but we have decided to add English as a possible choice, given its character today as a global language and its pervasiveness at international levels and in virtually all fields of knowledge and research, trade and business, internet communication and all types of entertainment. The students' replies are shown in the charts below.

Qu. 4: In what language do you prefer watching TV programmes?

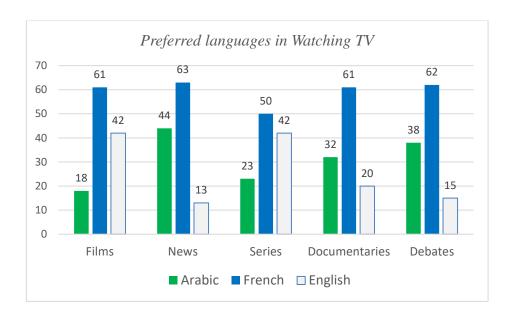


Fig. 4. 4 Language preferences in watching TV programmes

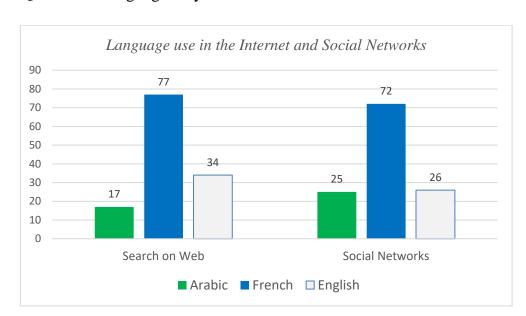
At first sight, the chart reveals the predominance of French as a preferred language in all items: more than 60 tokens for each, except for watching TV series with 50 (note here that some respondents ticked more than one box for some items). This shows the impact that French has on the students, which can be explained first by their desire to succeed in their studies, but also by the pervasiveness of French in the society. On the other hand, the quite low rates of preference for Arabic can be explained by the lack of interest in Arabic movies and series, seemingly for the low quality in film-making and the scarcity of Arab TV production, except for religious films and documentaries translated into Arabic. The domains of news and debates are somewhat preferred in Arabic by some students since it is the national language and people are interested in watching political and economic matters in Arabic.

But what is undoubtedly evident in the first place is the higher number of users of French for all the different kinds of leisure (movies, news, series, documentaries, etc.). This confirms the continuous strong presence of the French language in the Algerian linguistic scenery, or at least at the level of the media and entertainment, almost 60 years after independence.

As for English, it is clear here, as well as in the chart below (Fig. 4.5), that it is significantly present alongside Arabic and French, most likely for the importance

that it plays in TV production, particularly in films and series. We will come back to the increasing importance of the English language today in Algeria.

Let us consider now students' use of the internet (*Here again, some respondents have made more than one language choice in using the internet).



Qu. 5 What language do you use on the internet and on social media?

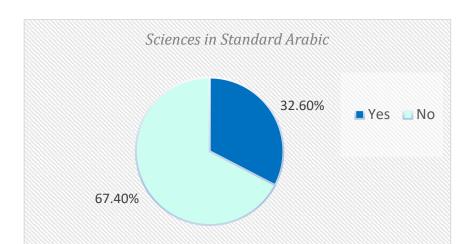
Fig.4. 5 Language use on the web and social networks

The two charts can be analysed at two levels, the first being the apparent one, where the results are described directly from the charts and interpreted on the basis of the divergences in the students' language preferences as to the languages proposed in the questionnaire. The second level of analysis, on the other hand, includes the interpretation in accordance with other questions. A whole new range of information emerges in doing so by comparing the results obtained.

Another important element to be observed is the presence or arrival of English language elements in the linguistic profile. A few decades ago, the English language was not as much favoured here in Algeria, but today, its undeniable presence in movies and series is predictable, as the majority of biggest movies and series are in English in their original versions. The presence of English along with Arabic and French, especially in the domain of leisure, might suggest the possible replacement

of French with English in the long run when it comes to watching movies or series and even surfing on the net. Also, students are aware that English is far more used in international journals and conferences which makes them feel interested in this global language at least as an instrumental motivation for academic reasons.

On the other hand, the interesting question to answer in our study is not what language is used for such activities, but rather who prefers using a given language in their leisure and why. In other words, we try to look at the linguistic profile of each individual trying to link their choices to other of their answers in the questionnaire. Indeed, the second level of analysis consists in linking these answers to other answers in the questionnaire, namely question 8 where students are asked if they would like higher education to be in Arabic (MSA).



Qu. 8. Would you like higher studies to be offered in Standard Arabic?

Fig.4. 6 Higher education studies in MSA

We have observed, through individual analysis of each respondent, that the majority of those who favour watching films, series etc., and surfing on the net as well, in the French language, are in general, those who are not in favour of a possible shift from the current language of instruction to Arabic. In fact, we hypothesize that one reason for wanting to keep French in higher education is that watching TV and Internet use are extremely influencing cultural elements. For the majority of the

informants, the French language is not just a means of practicing leisure; it is also a language that is associated in their minds with modernity and scientific advancement. As a matter of fact, most TV programs were in the French language during their childhood which has led them to have a more positive attitude toward the language and consequently mastering it easily while compared to their peers who favour the use of Arabic for entertainment, news or internet. The presence of such socio-cultural factor seems to explain the strong presence of the French language among these students' choices.

On the other hand, the majority who have chosen Arabic as a language for their entertainment and internet have also expressed the desire to study any scientific stream in Arabic. This simply suggests that it is the language that these students are accustomed to, in the mass media, television and on the internet; they have always heard it more often and practiced it the most outside the classroom, which has probably made it more favoured. This language that students are surrounded with and exposed to can quickly become part of their 'culture' and consequently direct their attitudes toward languages.

What is interesting to notice here is that, the fact that MSA is not the language of instruction in all branches does not seem to be a linguistic problem for everyone. It is a problem mainly for those who have not been influenced by the culture that encourages the learning of French and, as a consequence now, these are neither proficient in it nor have a positive attitude toward it. In fact, another conclusion we can draw is that the reason of inequality in French proficiency among students, once they get to the university, is not only due to the schooling system or the difference in the teaching they had. The main reason why some students feel disadvantaged and others well equipped for scientific streams is that this sociocultural environment plays a role which is sometimes more efficient than the school itself.

What we can hypothesize too, is that the choice itself between French and Arabic for activities like entertainment and the web is not just a facultative random language choice; it reflects the social backgrounds each individual is set in. Similarly, the choice to practice entertainment activities or surfing the net in French or Arabic

reflects simultaneously the proficiency or lack of proficiency students might have visa-vis these two languages and their positive or negative attitudes towards these languages, which is in turn affects their choice and their language aptitude. If the sociocultural background and positive attitudes allow some students to be more proficient than others at university level, it becomes a language planning and language policy issue. If the authorities have not been able to resume Arabization for all university branches for whatever reasons, at least an adequate training should be given to students who are quite disadvantaged in the French language, particularly those who come from rural areas or the Sahel towns and the Sahara where French has a much lower influence on the people. Many of these students had high grades and excellent results in secondary school and succeeded in obtaining the baccalaureate degree which allows them to choose to study medicine, architecture or other scientific streams; yet, they feel disadvantaged because of the language of instruction, and some even drop out during the first year and decide to do other studies which they might not like, the only reason being that they are offered in Arabic.

Therefore, the social background, but also the place of residence, play a crucial role in students' success at the university. The choice of watching movies and news in French, for instance, might suggest that for some people, the cultural impact associated with this language since their youth has shaped that tendency to deal more often with that language. Hence, we believe that if the education system is responsible for students' unequal outcomes because of the language of instruction that is not suitable for all, and perhaps because of teachers' French-oriented performance, sociocultural factors too, including residence and family environment resulting in language attitudes, play an important role in shaping students' future. These facts allow us to confirm our first hypothesis suggesting the various degrees of bilingualism attested in the Algerian society depending on the individual's level of education, residence and sociocultural factors, particularly parents' use of the French language.

Another section in the questionnaire had the purpose of identifying the cultural and linguistic environments in which students have grown up.

Qu. 11 To what extent do your parents use the French language?

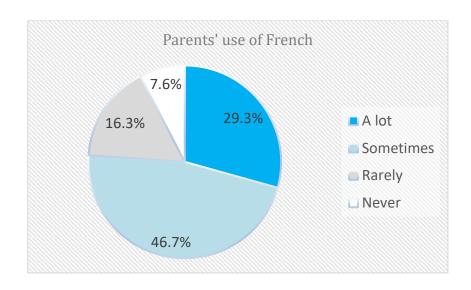


Fig. 4. 7 Parents' use of French

We hypothesize that parents' neglect or use of a given language has a direct impact on the proficiency of their children and also in the perception they will have of that language. First, the constant use of French, though often mixed with Algerian Arabic, among parents at home and in everyday contexts will consequently increase the level of exposure of children to the language. Another consequence to that exposure is the positive attitude children will have towards the French language. We suggest that the probability of having positive attitudes towards a language is higher when, as a child, a speaker is more often exposed to it and views his/her parents as a model to imitate. In an overall manner, those who claim that their parents use French 'a lot' or 'sometimes' in everyday conversation show a more positive attitude toward that language than those who claim that their parents never use it or just 'rarely'. We also hypothesize that those whose parents use more French in their everyday conversations have a somewhat different sociocultural background, often associated with the lifestyle and even a cultural identity inherited from the French during the

colonization and afterwards. We must never forget that, during the propagation of the French language by the new rulers, following the eradication of Arabic as a language of instruction, the Algerians were subjugated and eventually forced to accept their language for the sake of education and, consequently, they increasingly emulated the

French ways of life and identity. Of course, such emulation occurred progressively and to various extents depending on the proximity of the people's residence to the French settlers, particularly in big cities and urban areas. Today, sixty years after the departure of the French, and the efforts made by the Algerian governments to recover the Algerians' language(s) and cultural and religious identities, the French language remains deeply-rooted in the lives of many people, as it seen as an instrument of knowledge and development, and hence the positive attitudes it receives from the part of those students affected by their parents and grandparents.

What is interesting though, is that the majority of the students who answered 'a lot' and 'sometimes' are often for the proposition of keeping French as a language of instruction and do not show any particular need to have it exchanged with Arabic. These also prefer using the French language on the internet, the social media and for movies, series, news and other entertainments. In an overall manner, we can conclude that the use of some French among parents, even mixed with their mother tongue, is a clear indicator of some foreign socio-cultural traits, and the constant exposure of speakers to French in childhood and adulthood in the environment is a crucial element in shaping the positive language attitudes and language proficiency in that language.

It can also be observed that the majority of students who said that their parents often used French in casual conversations in the form of borrowing and code-switching, also claimed they face fewer or no difficulties in having French as a language of instruction. In contrast, among those who declared that their parents do not use often French – except for cultural borrowings by necessity or even core borrowings used under the cultural pressure –, a great number state that they find difficulties in having French as means of instruction, as shown in the chart below.

Qu. 9 Do you find difficulties in French as a language of instruction?

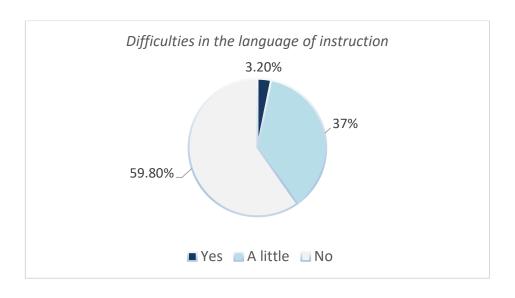


Fig.4. 8 Difficulties in the language of instruction

Moreover, we can affirm that parents' use of French has an effect on students' proficiency. In the sixth question, students were asked to describe how good they are:
- Qu. 6. How can you qualify your level in the three languages?

The results are as shown in the figure below:

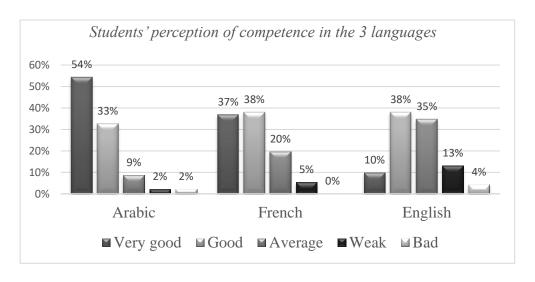


Fig. 4. 9 Students' perception of competence in Arabic, French and English

The first observation this graph reveals is the claim of the majority to have a good level in the Arabic language (54+33=87%). With such a high number of students excelling in Arabic, even if they might be good in French, the government and language policymakers should consider the implementation of MSA in medical

and scientific branches. Besides, for some students, being good in Arabic might suggest that they are not equally good in other languages. In this case, studying in the French language can be a real handicap and it would be better for their sake to propose a linguistic solution.

The other trait that can be observed is that the high proficiency in the French language is usually associated to aspects like the sociocultural background and language attitudes. Indeed, as suggested earlier, the sociocultural background that results in a higher proficiency in French for some students is indeed a great help to these students but a handicap for those who do not have similar sociocultural background, exposure to and admiration of the French language. These unjustified differences should be treated by language policy makers.

Another important observable trait is that the number of students claiming that they are good in the English language is oddly equal to the number of those who think they are good in French, combined to the results exposed in other graphs. This suggests that, at some level, English competency in the Algerian society is seemingly becoming closer to that of French, at least at the level of people's aspirations, knowing that, about three decades ago, English was only taught as a foreign language for a few hours a month in the Algerian school, with no encouragement from the part of the authorities in spite of its being an international language of wider communication. Today's ambition of learning more English among the youth might lead to the possibility of a shift in foreign language dominance in the future of Algerians. If this is allowed to occur and considered by the government, the substitution of French with English will be a future reality. Moreover, suggesting the implementation of the English language little by little, or even side by side with French in scientific domains, seems to be the ideal solution for those who are competent in the French language and those who are not.

Another salient element that reflects students' sociocultural background, and at the same time the type of attitudes they might have, is well portrayed in question N°7 in which students were asked about the extent to which they use some expressions in Standard Arabic and/or French in their everyday conversation.

Qu. 7 Do you use some MSA or French expressions in everyday communication?

The results obtained are shown below:

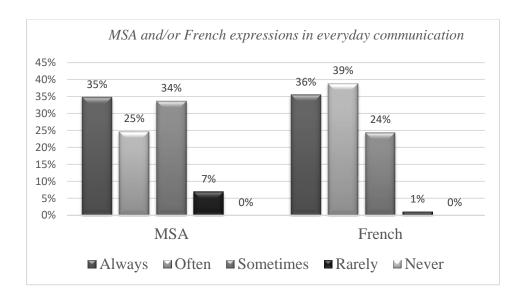


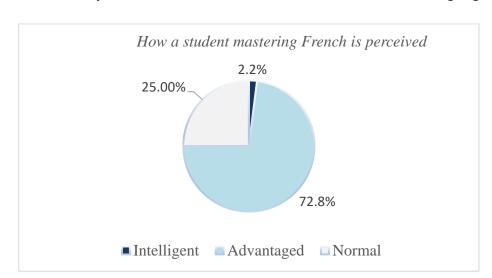
Fig. 4. 10 Students' use of MSA and French expressions in AA

There is certainly a significant difference between a speaker who has some proficiency in a given foreign language for instrumental purposes, or is motivated to achieve some level of language aptitude for educational purposes only, and those who have communicative competence in that language and use it in all walks of life, even if mixed with their mother tongue (Algerian Arabic). In other words, using French and/or MSA outside the studies denotes a certain cultural background divergence. That is, the fact that the students in our investigation do not have the same cultural background, which is reflected in their everyday linguistic reality, can strongly affect their education, educational choice and their educational level, in addition to the fact that using MSA or French often in everyday life is an indirect indicator of language attitudes, either positive or negative.

We have also concluded that the majority who said they often use French expressions in their everyday life usually have a more positive attitude toward it and claim they have no problem in the language of instruction. However, those who said they use expressions from MSA, a great number among them claim that they are not

at ease with the current language of instruction, and thus are in favour of replacing it with Arabic in scientific studies.

Although, in some previous questions, the element of attitude toward languages was hinted at, and appeared quite clear sometimes, the question about attitudes was not addressed in a totally direct manner but inferred alongside other linguistic behaviours. In the tenth question, students were asked to directly describe their perception of a student who uses or masters well the French language.



Qu. 10 How do you consider a student who masters the French language?

Fig. 4. 11 Perception of a student who masters French

Very few students (2.2%) seem to think that those who master the French language well are smart. In sharp contrast, it is obvious that the majority of students (72.8%) believe that mastering French carries advantages. This simply shows that the general opinion is that having a good level in French means having a good academic level which may lead to success in scientific streams and medical studies. Associating the French language with intelligence is thus the view of a tiny number of students, which may mean that French is not necessarily the language of sciences and medical fields, but it does open doors in higher education given that these streams are only offered in that language. The ideal, however, would be for students to have the choice of doing their studies in one of the two languages or even in a bilingual programme, both MSA and French being used by teachers who would be competent in the two

languages, with even perhaps some terminology rendered in English, as students show interest in the global language.

It is worth noting, at this level, an important element that will be further examined in the interview analyses: students' replies in the questionnaire suggest the probable link between competence/attitude in French and MSA and the geographical location. Indeed, the great majority of students living in the southern parts of the country have expressed a more favourable attitude towards Arabic and rather negative towards French, particularly in relation to internet use and entertainment language choice. Obviously, these students claim having far more competence in MSA. In contrast, lower use of MSA on the web and other entertaining means and positive attitudes towards French are observed among students living in northern parts of the country. These responses may not be definite but can be seen as an indicator alongside other social factors, on the correlational nature between competence/attitude in French and MSA and regional location.

The next section deals with another questionnaire which targeted specific Facebook groups of Architecture, Medicine and Biology.

4.4.2.3 Online questionnaire on Google forms

To obtain more data from students on the issue investigated, two online questionnaires were created on Google Forms and sent to three Facebook groups, selected on the basis that French is the language of instruction in the departments: Architecture and Biology at Tlemcen University and Medicine at Oran University. Many questions are quite similar to the ones in the previous questionnaire. What is innovative in the Google Forms version is the insertion of questions that concern short audio clips presented to the informants; the one-minute audio consists of a short passage with some content that relates to a certain extent to the lectures of the students and is performed by teachers' voices that students are asked to listen to and react. Each passage is read in the two competing languages, Arabic and French, and students are asked about their degree of comprehension of each version, then about some speaker's personal traits like intelligence, creativity, open-mindedness, etc.

But before analysing the outcome of this pseudo matched-guise technique whose aim is to attempt to elicit students' language attitudes, we will have a look at the informants' replies on some questions that concern their proficiency in MSA and French and their views on the language of instruction that would suit better. One question concerns the degree of difficulty (or ease) that students feel during the lectures given in French.

• Qu. 1: Do you find any difficulties in understanding the lectures in French?

The data obtained from the Architecture FB group (20 respondents) combined with that of Medicine/Biology (46 respondents) reveal that almost two-thirds of the students (62.11%) do not really find difficulties in understanding the lessons in French (i.e., 'very little' > 31.81% and 'not at all' > 30.30%) while just about 15.15% claim they have difficulties in comprehending the teachers (i.e., 3.03% > 'enormous' and 12.12% > 'a lot'). The answers of the rest of the respondents (about 22.72%) are in a mid-position claiming that the lessons in French are 'partially' difficult.

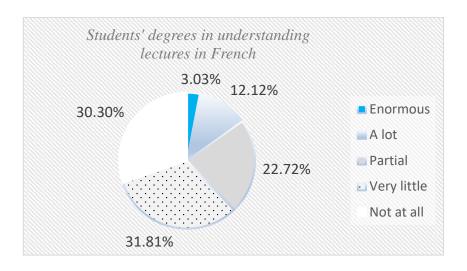


Fig. 4. 12 Students' degrees of comprehension of lectures in French

The pie chart clearly suggests that most students have no trouble in following the lectures in the French language, but at this level of university studies, there should *not* be *any* problem with the language of instruction if we want them to be focus only on the content, which must be an important issue for the students who find

'enormous' or 'a lot' of difficulties during the lectures. The graph below seems to better represent this gradient slope of difficulty from 'enormous' to 'not at all'.

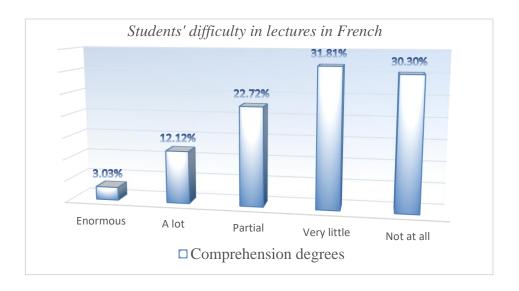


Fig. 4. 13 Students' difficulties in understanding lectures in French

We believe that if scientific and medical streams were offered in MSA, the language in which the students learned all contents for 12 years before moving to university, no-one would find difficulties in understanding their teachers explaining the lessons, and thus would concentrate more on the contents of the lectures, not the language! The next question tries to find out the extent to which students believe they master the languages at play.

• Qu.2 What language do you master best (apart from your mother tongue)?

This question is intended to elicit students' proficiency in Standard Arabic and French, but also English to know the degree of awareness about its global character and its necessity today in the world of science and research. Indeed, the pie chart below shows equal ratios of mastering French and English (40.42% each) as opposed to Arabic with much less skill (19.15%) or opportunities in using it, though it was the language of instruction in their pre-university education.

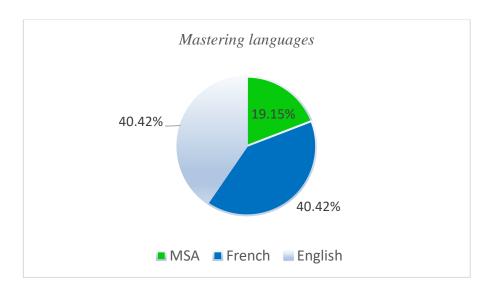


Fig. 4. 14 Students' mastering languages

What seems to be striking in the results above is that students claim they master both French and English to the same extent and better than Standard Arabic. But in fact, there's no surprise at that if we remember that we are in a diglossic situation where MSA, al Ω sarabiyya al Ω fuş Ω , is not practiced in everyday speech among Algerians, apart perhaps for some words and expressions that have slipped into the colloquial forms of Arabic, like [Ω uqsim] when someone wants to swear by God.

But French is indeed used by many people, even plain French, without mixing it with Arabic or Berber in certain contexts. In addition, we might wonder why students said they were more proficient in MSA and understood it better than French (Qu. 2 and Qu 3 in the questionnaire paper form). One explanation lies in the difference between perception and production in language acquisition/learning. It is commonly accepted among researchers in SLA that productive language skills are more difficult to achieve than receptive skills for their passive character. Ellis (2015:104), for instance states that "receptive knowledge precedes productive knowledge for grammar, just as it does for vocabulary." As a matter of fact, understanding a second or foreign language generally precedes the act of speaking it, which is also true for mother tongue acquisition.

As for the respondents' claim of mastering English to an equal extent to French (40.40%), the only explanation we can provide is that young Algerians have positive attitudes towards English and are eager to speak it, knowing its importance in most areas in today's world. Many young people are effectively in contact with it, particularly through the internet and various types of entertainment, social platforms and online video channels like YouTube and other sites, but also on TV channels like the BBC or CNN for the news, MBC2 for movies in English with Arabic subtitles and innumerable other TV channels. We have seen in another section (Fig. 4.4) that most students aspire to become fluent in what is referred to as a global language, and thus they believe or claim they are good at English even if, in reality, they are more proficient in French, given its omnipresence and practice in the Algerian society.

The next question was meant to know how students behave linguistically in everyday settings in various contexts: at home, with friends and with teachers.



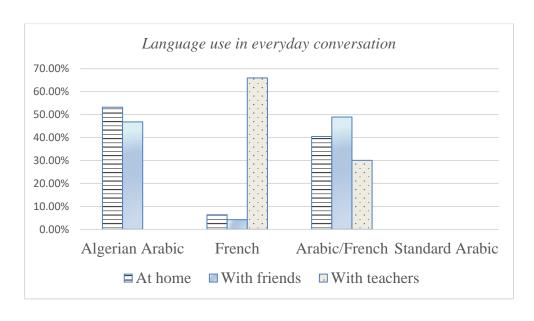


Fig. 4.15 Language use in everyday conversation

One aim in asking this question is to find out how much French students use in some contexts; the results reveal that they use it to a large extent with their teachers (almost 66%) even outside the classroom, given that it is the medium of instruction. They also use some French at home and with friends, but far less than with teachers. It is rather

Algerian Arabic mixed with French borrowings and expressions that they use more in these settings, which is the ordinary form of speech among most Algerians in the society. As for MSA, just as it was expected, no-one uses it in day-to-day speech which reminds us again of the diglossic character of Arabic where the High variety is only used in formal settings like education, the mosque, the news, etc.

In education settings, it is Arabic (MSA) which has long been implemented as the teaching medium, except for scientific streams and medical studies, a practice that might bear some handicap to students who have chosen these branches, and so we have asked our sample population in this questionnaire about their wish as to the language of instruction, as represented in the following pie chart:

Qu. 3 In what language would you like the lectures to be given?

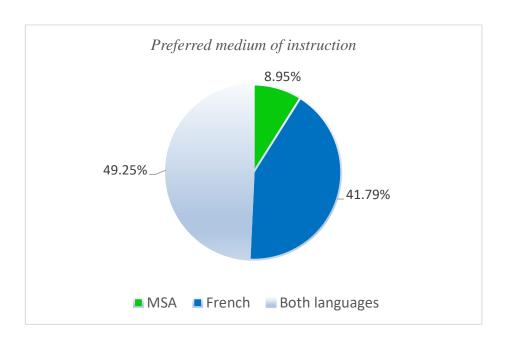


Fig. 4.16 Preferred medium of instruction

This question, addressed again to FB groups from the three departments, architecture, biology and medicine, had the aim of checking the extent to which students accept French as a medium of instruction, and thus three options are proposed: MSA, French and both languages. The results clearly show that just about 9% of the respondents say they would like the lectures to be given in Standard Arabic which seems to be a

logical choice following their pre-university education accomplished in MSA while French was only taught as a foreign language. However, almost 50% would like to have teachers explain the lessons in the two languages, a bilingual choice that would satisfy the majority which would probably allow better success for everybody, particularly if the exams too would be in Arabic and French. A little more than 41% still want French to remain as a teaching language in these branches.

4.4.2.4 Online matched-guise technique

The next four items in the Google Forms questionnaire are devised on the basis of an experimental technique said to elicit people's feelings about, and attitudes towards, a given language or language variety or even an accent. As already mentioned in 3.3.3, it was introduced by Lambert and his collaborators in the 1960's coining it the 'matched-guise technique' whose aim was to observe bilingual French Canadians and to attempt to infer their attitudes towards English and French, two competing languages in Quebec, Canada. The technique consists in making candidates listen to seemingly different speakers performing a passage in two or more languages and asking them to evaluate the speaker in the distinct guises on personal traits such as intelligence, self-confidence, kindness, sociability, etc. The listeners, referred to as 'judges', are supposed to evaluate two speakers, not one speaker in two guises, and their evaluation represents in fact attitudes towards the two languages.

However, we haven't been able to use Lamberts' guise technique in its original form as the passages were performed by two different speakers. In an attempt at checking students' language attitudes, a short passage relating to their field of studies was inserted in the questionnaire in the form of an audio file read by two speakers, in Arabic and French. The text addressed to the students of architecture is about some specialties including architectural technology and design, urban planning and infrastructure. The passage sent to medical students and those of biology is about the cardiovascular system and how vessels transport blood. The respondents are asked to listen to the audios and state their level of comprehension of the audio passage in the

two languages, Arabic text first, then French. Then, they are required to express their feelings about some of the speakers' personality traits.

Qu. 3 Will you please listen to the audio; then mention your level of comprehension.

• Architecture group: Here are the two versions for students of architecture:

Ar. > https://tinyurl.com/33jkamm5 vs. Fr. > https://tinyurl.com/2mctypbp

The charts below show the students' claim about their comprehension of the audio:

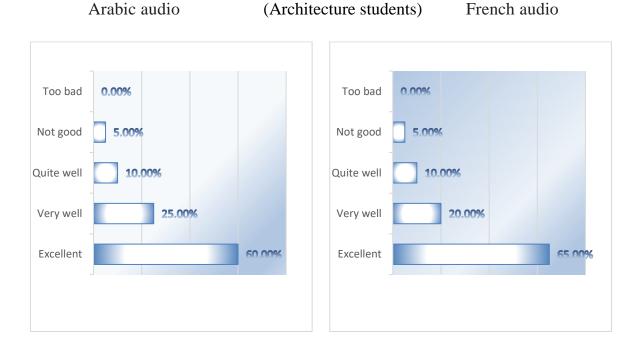


Fig. 4.17a Comprehension of Arabic audio Fig. 4.17b Comprehension of French audio

The results show almost no difference in the degree of comprehension of the audio passages performed in the two languages, MSA and French, but what is interestingly surprising is that the majority of architecture students have understood the two versions very well, which means that they would be capable of achieving good results even if their lectures were given in Standard Arabic.

As for the personality traits, students find both teachers intelligent to more or less the same extent (about 70% for each) and creative (Arabic 60% vs. French 70%); but on the open-mindedness trait, the respondents find the French guise a

little more flexible. Would all this reflect students' attitudes, not towards the speakers, but towards the languages used, as undertaken by Lambert's experimental work using the matched-guise technique?

• <u>Biology/Medicine group</u>: Here are the two versions:

Ar. > https://tinyurl.com/382c3afb vs. Fr. > https://tinyurl.com/382c3afb

The charts below show students' claim about their comprehension of the audio:

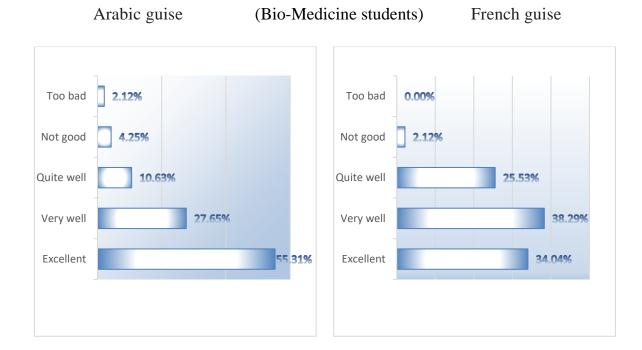


Fig. 4.18a Comprehension of Arabic audio Fig. 4.18b Comprehension of French audio

Just as for the architecture group, the students from the biology and medicine groups provided responses that confirm good comprehension of the text in the two languages, 82.96% for Arabic and 72.33% if we add up the two categories 'excellent' and 'very well', though the margin between the two is quite obvious. In contrast, those who said 'not good' and 'quite well' add up to almost 15% for Arabic and more than 27% for French. This may mean again that freshmen start up their university studies with a good level of proficiency in MSA and would certainly reach satisfactory academic achievement in sciences if the curriculum was implemented in that language, the medium of instruction for twelve years. Otherwise, the other option language policy makers could have opted for to avoid the inconsistency students are

faced with – particularly for those lacking adequate aptitude in French but having to do their studies in French¹⁹ – would have been to implement an Arabic/French bilingual programme of instruction, at least at secondary level before university.

If bilingual education were implemented in pre-university schooling, there's no doubt that, at university level, students would not be faced with the issue of French, the sole language of instruction. The next question, addressed to students of Medicine and Biology (N 47), considers this issue by making participants listen to another audio passage performed in the two languages:

Qu. 7 What do you think of this lesson in Arabic and French?

After listening to the passage, https://tinyurl.com/5zxecwdc, the students are asked to react in terms of level of comprehension. The chart below shows the results:

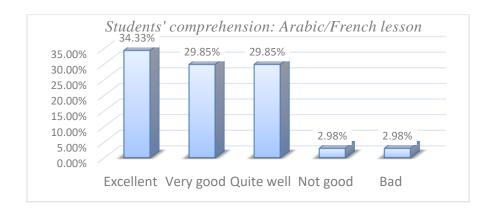


Fig. 4. 19 Levels of comprehension: Audio text in Arabic/French

The data obtained reveal clearly that students feel at ease when the lesson is explained in the two languages. More than 64% of the respondents have qualified the Arabic/French mixed lesson 'excellent' or 'very good', and if we add those who are satisfied to a large extent ('quite well' 29.85%), we obtain a percentage of +94% of students who are pleased to have lectures in MSA and French. The remaining 6% must be weak in the two languages or do not accept the translating switch during

_

¹⁹ In reality, there is no official ministerial decree or decision of the implementation of French as a language of instruction in medical and scientific streams at university level, which means that if a teacher opts for offering the lectures in Standard Arabic or using the two languages, nothing prevents that decision.

the lesson, and thus are not aware of the advantages of mastering the two languages. In fact, there is a double advantage in a bilingual type of lecturing: students who are competent in Arabic but rather weak in French will compensate for that weakness by resorting to the language they have mastered during their pre-university instruction; and students whose proficiency is higher in French will benefit from the terminology in Arabic.

The next two questions were meant to elicit students' views on the language of instruction for hard sciences subjects, like mathematics, physics and sciences: French before the Bac and Arabic at the university.

Qu. 8 Would you like the lectures for sciences to be in French before the Bac? Given the language difficulties that many students are faced in doing some scientific or medical branch, particularly those who come from rural areas or the Sahel and the Sahara, we wanted to know the participants' opinion on French being implemented as the language of sciences in secondary school up to the BAC

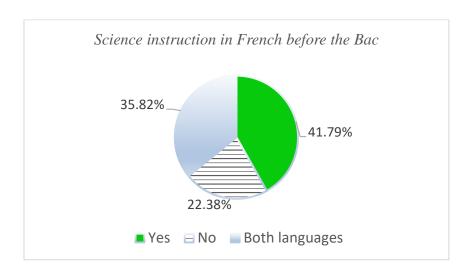
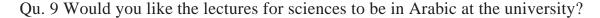


Fig. 4. 20 Lectures in French for sciences before the Bac

The results shown above, (Fig. 4. 20), reveal that only about 22% of the students do not agree on having the lectures given in French for scientific subjects, most likely for their fear of failing as they are not proficient in the language, or perhaps they have got used to Arabic since their first years at school and feel at ease with it in all subjects. However, the majority of respondents, more than 77%, would

like French to be used in secondary school as a content language for sciences, though 35.82% of these would prefer a bilingual form of teaching these subjects. Now, what do students think of an opposite alternative, i.e., MSA for scientific university streams?

The next question deals somewhat with an opposite possibility, an option that might solve the language problem of many students, though it remains almost a utopian solution for the time being.



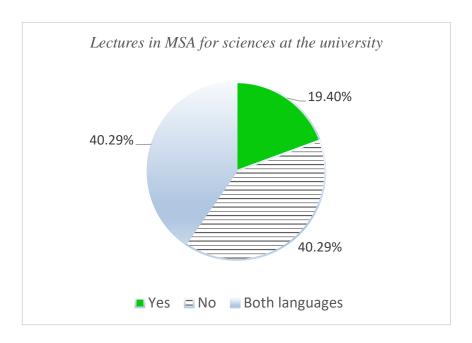


Fig. 4. 21 Lectures in Arabic for sciences at the University

Surprisingly, more than 80% of the respondents wouldn't like Arabic to be the language of instruction in medical and scientific branches at the university. Just a little less than 20% of the students believe that lectures in their streams should be in MSA which would be probably help them obtain good academic achievement and, in any case, would not feel 'out of place' as their previous studies were in Arabic in primary and secondary education. However, among the 80%, half the number of informants (40.29%) agree on the alternative of using Arabic and French, a bilingual

education programme, which is perhaps a solution for the moment if the ministry in charge and the language policy want these students to reach better achievement.

The next question attempts to probe students' view on success in their studies had the system implemented Standard Arabic as a medium of instruction. We often hear that some students enrolled in one of the scientific, technological or medical streams fail in their studies because of their weak level of aptitude in French, the language of instruction in these branches (e.g., Benrabah 2007; Cortier *et al.* 2013, etc.). Failure and dropout are attested particularly in the first year and more particularly among freshmen who come from rural areas or remote Saharan towns whose socio-cultural background has not been impacted by the French language as much as people in urban areas and big cities where French is still omnipresent. These would certainly succeed better if courses continued in MSA at university level.

Qu. 10 Do you think the success rate in your studies would be higher if university lectures were in Arabic?

The question of success with Arabic as a medium of instruction in sciences, medicine and technology has yielded the following results, shown in the pie chart below (Fig. 4.22) which reveals plainly that more than half of the respondents (51.06%) believe in success at university level if scientific, medical and technological branches were offered in the standard form of Arabic, which is an obvious logical belief as these students had all their pre-university education in Arabic while French was only taught as a foreign language. We may even add to these 51% the respondents who said 'I don't know', for they probably feel some linguistic insecurity in a language they are not ready to cope with in their studies.

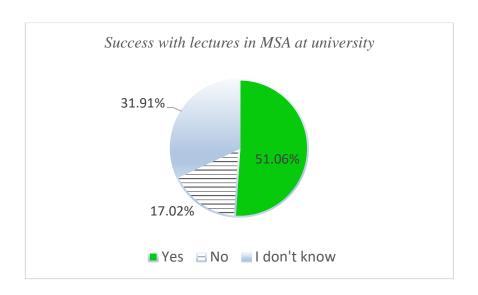


Fig. 4. 22 Success with lectures in Arabic for sciences at the university

Many students have certainly heard of the difficulties encountered by students who 'suffered' in their first years and those who have changed the branch just because it was in French. In a report from the AUF (Agence Universitaire de Francophonie 2016) on the issue of Algerian students' failure in branches taught in French, Kada-Ksouri *et al.* (2016:31) attest that

Some brilliant students in their disciplinary field (physics, math or science) fail at university because they do not master the mediation tool that is French. [...] In a recent interview with the Minister of National Education, the newspaper *Le Temps* indicates that the failure rate of students in the first year of university is 80% for certain technical and mathematical fields. ²⁰

In our investigation, only 17% of the informants say they don't think they would succeed better in their studies with Arabic as a medium of instruction. These might think they are good at French and feel confident they will not have linguistic problems in doing their studies in that language. But their negative answer might result from their negative attitudes towards Arabic, often mistakenly thought of as

160

²⁰ My translation o of the original text in French: « Certains étudiants brillants dans leur domaine disciplinaire (physique, maths ou sciences) échouent à l'université parce qu'ils ne maîtrisent pas l'outil de médiation qu'est le français. [...] Dans un entretien récent avec la ministre de l'Éducation Nationale, le journal *Le temps* indique que le taux d'échec des étudiants en première année universitaire s'élève à 80 % pour certaines filières techniques et mathématiques. » (Kada-Ksouri *et al.* 2016 :31).

inappropriate for scientific studies and only as a language of literature and social sciences. But they seem to forget that they did all scientific subjects in Arabic before they came to the university, French being only taught as a foreign language. In fact, this is the problem that Algerian students are confronted with after the Bac: Wishing to choose a scientific branch or medicine but having to study it in French, an issue that the government's language policy and the ministry have not been capable of solving up to now.

However, in spite of this issue which students are aware of, such results may be considered as evidence to confirm our second hypothesis which suggests the strong impact of French on these students' language behaviour and its use even outside the classroom, though very often mixed with Arabic, as opposed to students of other branches where courses are offered in Arabic. In fact, this hypothesis may be tightly associated with the third one as students' linguistic behaviour is determined by their positive attitudes as opposed to those of other streams that do not use French as a medium of instruction.

Nevertheless, this does not mean at all that these scientific streams students have negative attitudes towards Arabic, as reflected in the results obtained in previous questions, as, for instance, their degree of comprehension and reading in MSA as opposed to French. We may perhaps view their positive attitudes towards Arabic in terms of association with the reverence that Algerians, and Arabs in general, often express for this language and its sacredness; but this does not prevent students from having a kind of 'instrumental' positive attitude towards the French language as they consider it an advantage for their studies or a language of modernity and opening to the world. Using again Gardner and Lambert's terms (1972) for motivation, we may refer to positive consideration of Arabic, *al lugha l Ṣarabiyya l fuṣħā*, from the part of students as an 'integrative' attitude. Both types of attitudes, what we have referred to as 'integrative' and 'instrumental', are also revealed in the few interviews realized in the next section with a number of students and teachers in scientific fields.

4.4.3 Focused interviews

As already mentioned, the interview in sociolinguistic research is an easy way of collecting a large amount of speech data, the aim of which is to elicit different language styles and variation following Labov's traditional interview. However, an interview can also be devised for other purposes, and any other type of information can be obtained from the interviewee, including, for example, social problems, politics, internet use and social networks, etc. In this research, the aim in interviewing people does not consider the use of language style or variation of the interviewee. It tries to obtain information about the issue at hand, namely the use of French as a language of instruction in scientific university studies, and thus our interviews were done in a targeted manner; i.e., specific social profiles were chosen according to some basic traits that would help in gathering significant information: students at different stages and teachers. The interviews were conducted in a semi-structured way, while participants had the possibility to add pieces of information they thought were valuable. Some interviews were recorded directly after the interviewee's acceptance; others were recorded on the web using some platform and for some others, notes were taken during the interview.

• Interview 1: A pharmacist

The first interviewee, a thirty-one-year-old pharmacist specialist head of a laboratory from Constantine who lives in Algiers. Her proficiency in French is better than in Arabic as she claims. She also claims that her use of French is far better than the use of Arabic in everyday life conversations but her parents do not use it as much as she does, though, as she affirms, her grand-parents were francophone speakers, most probably strongly influenced by the French during the colonization. Obviously, the respondent seems to have a highly positive attitude toward the French language which appears in almost all her daily activities like talking to friends, family, colleagues or watching movies, series and so on. She seems to think that the mastery of French is just a skill though, but she affirmed that in the past she used to associate well-spoken French to a certain social class. She obviously thinks that a student who does not master the French language is going to suffer in a field where French is the

only mean of instruction. Moreover, being herself a teacher, she affirms that the level and competency in French has declined over the years, claiming that students of the new generation may write medicinal pathologies terms in Arabic letters, and they have a tendency to learn English.

This first interview leads us to believe even more that there is a possible connection between the place where a person grows and the attitude and use of the French language. Certainly, the environment of metropolitan cities enables more the possibility of French use than southern areas, a factor that might play an important role. Moreover, in this first profile we have another proof that the domains of sciences are thought of as usually related to the use of French. This participant, in contrast with other profiles, admits using and understanding French even better than Arabic. This might show that what really distinguishes a francophone from an Arabicspeaking person in Algeria, is certainly the cultural environment where people grow up. This leads us to believe that the environment where people grow and the linguistic values in which they believe are the main elements that shape the attitudes and linguistic skills in an individual. Consequently, this has an impact on peoples' education and orientation. This is reflected in the language people choose to watch series and movies, and the language they use more often on the net. We can state that attitudes towards a language play a major role in the choice of the linguistic behaviour to adopt. Indeed, the issue of attitude affects so many aspects in the individual's speech and has control over so many choices, including education and fields of studies. The respondent suggests that they grew up watching French television, one of the strongest tools shaping language skills and language attitudes and therefore leading to some cultural attachment to that language. The participant, being a doctor in medicine, knows that a student who does not master French is not qualified for medical studies, which makes sense. Only an adequate linguistic policy might solve the issue of language of instruction by proposing what suits all students whose desire is to do some scientific studies, not only those who master the French language.

In the last part, the interviewee, being herself a teacher, emphasizes the low level in the French language among the young generation of students registered in medicine. This might reflect some aspects: firstly, it can be due to the fact that newer generations are losing contact with the mainstream French media and the 'older' French school, making the ex-colonial language becoming more and more foreign. Secondly, it can be suggested that the English language is gaining more and more ground in the Algerian society as a whole and among students, making its place among the younger generation, as the doctor suggested too. Thirdly this all reflects the students' need of a 'closer' language, the one they have learned since primary school, Standard Arabic or MSA, the language in which they have received all their knowledge in all subjects, including sciences, physics and mathematics.

• *Interview 2:* A resident in medicine

This second interview was carried out with a student in Medicine who, at the age of twenty-seven, is going to start his residency here at the CHU hospital of Tlemcen, after his seven-year medical studies, in the French language of course. To the first question concerning his feeling when he first started studying at the university, the interviewee said he remembered that during the first lectures, he and most of his classmates could not understand anything from the teachers! He was 'shocked', as he said, for he did not expect the matter to be so difficult, though he knew everything would be in French. He said he was 'lost' during the first sessions; but it was logical "after thirteen years of education in Arabic". The interviewee mentioned two of his friends for the language problem was so acute that they decided to change the branch of studies: one was enrolled in geology, but quickly left for Economics, not because he liked it, but just because it is done in Arabic; the other one, a brilliant pupil at secondary level, was eager to study architecture, but again because of the French language, he had to do something else that has nothing to do with architecture, but it was in Arabic.

To a question about the teachers' behaviour as far as the language is concerned, he said they did not try to find a way to facilitate students' comprehension. They just gave their lectures in French and left without worrying about the students. So, those who did not want to abandon during the first semester and change altogether, used a strategy to be able to start understanding the lessons: they asked for handouts from

their teachers and did their best to read them again and again trying to assimilate some parts of the lecture and they translated into Arabic what they could not understand.

Perhaps not all students used the translation strategy – most probably those who had support from their parents or other means to reach an acceptable level in French –, but this is what the student did himself to cope with the difficulties he was confronted with, and it was the only way for him and his mates to continue their medical studies. Then, he pointed out that they felt a little better in the second term, then gradually better in the second year, particularly because the French used was relatively simple in medicine with a lot of technical terms and medical terminology.

To another question, concerned with the utopian option of doing medicine in Arabic, the interviewee attested that in this case, students would focus on the content without wasting time trying to understand the language. He said "we would be ready to go into the field as we did all scientific subjects in Arabic before the baccalaureate." Then, he recalled that they did not have a good syllabus in French in primary and secondary education, which means nothing was done to prepare students who would like to do some scientific, medical or technological branch. Then, he ended up the conversation saying that language planners could have done one of two things: either enhancing studies in French before university by including programmes or topics in sciences and technologies, or switching to Arabic as the language of instruction in all university streams which would be the ideal, and in this case the academic level would be much better.

• *Interview 3*: A doctor in medicine

The third interviewee is a fifty-two-year-old doctor in medicine. For some methodological reasons, we thought that the factor of age could shed more light on some questions. Moreover, the participant was a teacher of medicine, a fact that can add valuable information from the perspective of teacher-student relationship. The doctor said that most scientific subjects a few decades ago were done in the French language before and after university, adding that French was more present in the educational system at the time of his studies, and that it was spoken and written more

properly. He said that he felt a loss of competence in French among students of the new generations, confirming the necessity of the language in their domain. Yet, he suggested that it was just a tool and showed an interest himself in learning the English language, explaining that it was necessary in their domain to a certain degree.

The comments of this doctor on the linguistic situation in education suggests three main things: firstly, that the status and importance of French is changing from a generation to the other. While in the past generations French had such importance, especially in the domain of sciences, today, such prestige is ready to be challenged. Indeed, the new generation has broken the link that tied the older generation to the French schooling system. Secondly, indeed, the older generations had their schooling entirely or partially in the French language and this since primary school, a factor that played an important role in making the majority of today's teachers in scientific domains perceive education only in French. This means that the degradation of the French language competency in newer generation was inevitable, and the calling out for Arabic is a necessary requirement, perhaps with English as a supporting language, particularly for scientific research. Todays' new generation have a weaker link to French and no obligation to perceive it as "the only language of instruction fit for sciences". Finally, the outgrowing need for the English language among newer and even older generations is an undeniable fact and possibly a sign of crossing from a linguistic era to another.

• *Interview 4*: A student in Sciences and Technology

The fourth interview involved a nineteen-year-old student in the department of Sciences and Technology at Tlemcen university. He declared that all modules were in the French language, but he had a quite average level in that language. Furthermore, he expressed that the majority of his friends and classmates had similar difficulties. He also revealed his parents' low level in French. Then, he strongly agreed with the idea of having MSA as the main language of instruction. He even claimed that his friend and himself are quite better in the English language as it was, according to him, an international language that all the Algerians want to learn. He

eventually claimed that English is used much more than French, inside and outside the classroom, particularly watching movies and on the web as well.

This fourth interview is another confirmation that parents' use of a language and the environment are influencing factors, as to the competency in the language, its use and the attitude. The interview with this participant confirmed that scientific branches are very difficult for those who do not master the French language. The participant's answers suggest that, for a non-negligible number of students, the use of MSA can be of great help in their studies. On the other hand, his answers suggest that the youth today have a higher esteem and interest in the English language, a fact that can be a symptom of language shift from French to English in specific domains.

• Interview 5: A student in Economics

This last interviewee was from a lady in Bechar city aged twenty-seven years old. To a question about the use of French, she claimed that she never uses it in everyday conversation, but uses MSA a lot and even writes in it. When asked about her parents, she replied that they never use it either, to the exception of some adapted borrowings that are found in Algerian Arabic and used by everyone. She expressed her total discomfort toward the use of French in the office and said that people usually associate it with development. She also said that her family do not use it and they are rather arabized due to the fact that they are from the Sahara, and there, according to her answers, they don't think of the French language as having a higher status. She thinks that it is a boring language and shows openly her dislike toward that language. Her perception of French users has always been negative and she describes them as being too much into appearances. She claimed that a language is only a means of communication and she doesn't feel at ease with a French speaker while an MSA speaker is perceived much more positively, more exactly as being polite and humble, just like a user of English who is also perceived positively. She declared that she would abandon studies that use French as the main language of instruction and would choose a field that does not imply the use of French, claiming furthermore that the lack of competency has been a real handicap for her while she was looking for a job. She also claimed that Bechar and the Saharan regions in general do not use the French

language because, she suggested, that the French occupation started very late in the Sahara and therefore French was not deeply-rooted in the communities as much as it is in cities in the north. She also declared that students of scientific streams from Bechar adapted quite well in their studies but still would prefer to have MSA as a means of instruction.

We noticed that the respondent was not willing to answer the questions in French compared to other respondents. We felt a link between the birthplace and the competency in the French language with the respondent's attitudes towards it. Such a claim is even further confirmed by the participant's own declarations when she suggested that the lack of interest in the French language was due to her origin and that, in general, people from the same region usually have the same attitude towards French. We found out that the competency and use of French is almost inexistent for her parents. We can observe too, that in that family environment, French is not used at all compared to other families. The respondent seems to have a particularly negative attitude toward the French language and claims explicitly that one of the reasons of her choice not to do a scientific stream was the difficulty and the negative attitude toward French. These claims might further be confirmed in comparison with other participants' answers.

• Overall remarks on interviews

An interesting outcome that results from the contents of these interviews is that there are some points of convergence. For instance, subjects from the northern urban areas and south or Saharan towns suggest that, in a general manner, the geographical factor plays an important role in the linguistic orientation. Indeed, the attitudes toward French and people's competence in it are linked to their residence. The direct and indirect information collected from these interviews suggest that northern areas, especially big cities are more open to the use of the French language in everyday conversation, and thus, it is very likely to find there more positive attitudes towards the language while, on the whole, the change in attitude towards a less positive one and the decrease in its use can be felt in the south. That is understandable when we realize the fact that metropolitan northern cities were the

first to be invaded by the French occupation wanting to settle there forever, which indeed made their language a permanent element in the linguistic scenery much less than in the south which remained unaffected to a certain extent.

The other common element reflected in some of these interviews is the undeniable impact of parents and the surrounding linguistic environment. We can safely state that the parents' level of French use and their attitudes toward it usually determine the linguistic profile of their children and their attitudes. Interest in the French language, competence in its use, even when mixed with Arabic, and attitudes seem to suggest that there are some cultural background differences between people which are decisive in impacting language use and language proficiency. To the exception of those who are skilled in French due to the helping environment, the continuous weakening of French, in an overall manner, is easily observable today. Indeed, the lack of competency and the lack of interest in the French language is becoming an evidence in recent generations in comparison with the generation that had all its education in French and was culturally attached to that language, especially through entertainments and television, reading books and newspapers, etc. These have left the place to a generation where French has less room in the society, especially as a means of communication, though we have to acknowledge that it continues to function in many domains, including business companies, some administrations and part of the written media; in addition, we note that the Algerian dialects are still full of borrowings and expressions from French and code-switching is commonplace in many settings.

The dominance of the French language in scientific domains, justified for some and seen as a barrier for others, is felt in these interviews. The need for MSA in scientific fields, for those who do not master French and wish to study in it, becomes increasingly felt as a national language policy issue that must be dealt with. Such views can be considered as validating our last hypothesis, which we actually consider as a recommendation for better academic achievement in scientific streams. The action to take must be either implementing Arabic/French bilingual education in high school, or resume the Arabization process for all university branches.

4.4.4 Classroom observation

Classroom observation was carried out at the level of the faculty of medicine in Tlemcen, and in the department of Technological Sciences in Maghnia University Centre. As already mentioned, the means of instruction is French in both cases. In medicine, students who were at their fourth year of studies, seemed to be accustomed to the use of the French language, and once the lecture started some of the students who were talking with each other in dialectal Arabic with some code switching, seemed to be ready to start using French only.

The teacher started his lecture summarizing concepts from the previous lecture and the majority of students seemed to be at ease with it while listening to the teacher, without any apparent trouble. The teacher gave the lecture in French, yet uttered a few words in Arabic, mainly to introduce the passage to another part of the lecture. The few students who were participating seemed to have a good mastery of French. A few students were observed to switch to dialectal Arabic to make themselves clearer.

In the Technology Department, however, the students observed were in their first year, and seemed to be more open to the use of Arabic. In a global manner, the lecture in that class was also, in its totality, in the French language; yet, the teacher seemed also to be more flexible in using some Arabic at times to make himself clearer and codeswitched a few times to translate some words.

Clearly, the interpretation of classroom observation can only be significant when associated with the other tools, the questionnaires and the interviews. In an overall manner, the observation led to think that the use of French is considered as a common fact, but discussion with some students and the observation of the dynamics of the classroom might suggest that participation and a better level of understanding could be reached for some individuals if the lecture was done in the language that they understand better, MSA in which they received all their pre-university education; or else if they had a greater training in French, not only as a subject, but also as a language for scientific content in the secondary school.

The main phenomenon observed in recorded audio among university students of scientific branches was the systematic switch to the French language when discussing matters related to their studies. Almost all interaction of this kind was the perfect representation of what Fishman (1971) called 'domain of use'. Students from different branches seemed to have a special verbal repertoire that includes switching to French, especially when it comes to the use of specific scientific terms or when talking about studies or class-related information in general. They seemed to be conditioned to link the French language with scientific domains as they knew some scientific terms only in the language of instruction. Those who master French quite well seem to have no issues in their courses.

However, as everyone should get a similar chance to access education, for some of the students who do not master the French language very well, especially in other domains, to the exception of the few technical words, we can suggest that the conditioning can be reversed in future generations in a way that technical vocabulary could be used in a language everyone has studied and was exposed to equally from the first year of their schooling.

4.5 Conclusion

This last chapter has been dedicated to the collection and analysis of the obtained data by means of the various research instruments. At first, we started exposing some theoretical parts on the methodology needed in our work which we have exposed and the different research tools and instruments were explained alongside with the reasons of their use.

The data were collected from questionnaires addressed to a number of students, one on paper to be filled in and two others on Google Forms sent to a few Facebook groups of students of different scientific branches. Then, a semi-structured interview was devised and carried out with five respondents to obtain more data to exploit. Classroom observation and audio-recording were also used and yielded interesting

data. These research instruments were generally used in a combined manner for the discussion to make the results even more evident and significant. In fact, the combination of the collected data reveals many aspects and facts about the studied phenomenon.

Firstly, we concluded in our research that a geographical mapping can indicate the strong and weak presence of the French language. More use of French is usually concentrated in metropolitan areas and in big northern cities while the southern areas of Algeria have remained relatively Arabized, due to the fact that the French colonization did not have enough time to settle there to have a strong linguistic impact on it. In an overall manner, we can say that the place of birth or the region a person lives in has a direct impact on the use of French, attitudes and possible competency.

Secondly, the major element that distinguishes social and linguistic profiles, and the geographical factor is just part of it, is the sociocultural factor. Indeed, the term culture has a vast meaning and in a general manner, Algerians are characterized, to some extent, with a similar culture, yet so different in certain aspects. But it is not the vast meaning of culture that is discussed here, rather the daily activities and tendencies that define each individual. For instance, a child growing up under the French television influence or in an elementary French private school or in an exclusively French-speaking family and friend environment, is not going to have the same culture or at least the same perceptions as an individual who grew up in an Arabized environment where the French language is poorly considered and almost never used, except for borrowed words and expressions that have become part and parcel of Algerian dialects. What we have discovered in our research is that, linguistically speaking, the sociocultural background has an effect on students, an impact that can be compared to the effect an educational system can have on their language. A French-oriented sociocultural background (parents, TV, etc.) will appear in the student's language proficiency and therefore in their ease in studying in French. But if the social background is rather Arabic-oriented with negative attitudes towards French, then the off-spring will find difficulties in their scientific studies.

Each individual's linguistic orientation is formed on the basis of a profound influence by the environmental setting and the cultural background in which they find themselves. The resulting linguistic competence and language attitudes towards a given language is going to have a definite influence on the educational life of students once at the university. The major point to be underlined here is that, in the face of the dilemma that students in scientific streams are faced with, the sudden switch of the language of instruction, from MSA to French when moving from high school to university level, only those who have an 'appropriate' cultural background will be good enough at French to successfully carry on their studies. Other students suffer during the lecture because of the language, to the extent that some have moved to other branches taught in Arabic. But many gradually have been able to somehow catch up with the required level in French. Facing this inequality, politicians and language planners need to take this issue into consideration and rethink the form and language of teaching in medical, scientific and technological streams.

The third element discovered in our research is the progressive change in the status of the French language. Once again, apart from the people whose sociocultural environment encourages the use of French because of their positive attitudes towards the language, or by necessity as it is the medium of instruction, many of today's youth are generally moving towards the breaking of the links with that language, as children today do not go to French schools like their elders, nor are they influenced by French media and television like generations in the past. In addition to their awareness of Arabic, al lugha l fuș $\hbar \bar{a}$, as a prestigious language capable of conveying all types of knowledge and sciences, today's children are also open to English with increasingly more positive attitudes towards this global language. The use of this element by language planners can be a turning point linguistically speaking, especially in the domain of education. Moreover, although a large number of people suggest to keep French as a language needed in their scientific branches, another category of people, greater in number, express the urgent need to make Arabic the medium of instruction in scientific branches, since it is the language of education from primary school, or at least to urge the authorities to find a solution to the situation in scientific branches that suits everyone equally.

General Conclusion

General Conclusion

The present research work stems from the desire to raise an educational issue that has not been dealt with by the relevant institutions in the Algerian educational system, and more particularly in Higher Education. The problem is that formal instruction is offered in the French language in medical, technological and scientific university streams while pe-university education is undertaken in Standard Arabic, French being only taught as a subject for two or three hours a week. So, we have embarked in this research work to check the extent of awareness among university students who have chosen, or have been assigned, to continue their studies in one of these streams taught in French. We have argued that if some students succeed as best they could in these fields because they were prepared in one way or another to deal with the French language, others have not had the same opportunities and literally 'suffer' during their studies, and some even drop off or leave for other branches that are taught in MSA, the language of instruction in general education at the primary and secondary levels.

The problem was primarily engendered by the colonial rule which enforced education to be undertaken in the French language up to independence while Arabic was almost banned from public settings and education. After independence in 1962, one of the urgent things that the new Algerian government had decided was to recover the nation's identity and language, so they took the decision to begin a long process of Arabization as Arabic was considered as the only official language of the new nation. Most institutions were to be Arabized, but it was not an easy matter for formal education as it took almost two decades to finally implement instruction in Arabic up to the end of secondary school and the baccalaureate examination.

The Arabization process continued for a few years into higher education level where social sciences, law and economics started being offered in Arabic, the official

language of the country, known as MSA. However, the process was slowed down and stopped before reaching the hard sciences, medical and technological studies which are still taught in French at the university. Therefore, one aim of our investigation is to question this issue in the present educational system and the legitimacy of bilingualism in higher education. The objective is to attempt to depict the difficulties that fresh students are confronted with when they decide to continue their studies in one of these aforementioned scientific branches. It is unfair to see students fail because of their lack of proficiency in the French language and some even abandon their studies or, most often, miss the first year and move to another branch where contents are taught in Arabic. Such situation engenders of course negative attitudes towards French, except for students, particularly in big cities, who have been prepared by their parents or the environment to cope with the issue, and thus these display positive attitudes towards French.

To deal with this problematic issue, a number of research tools, including class observation, questionnaires and interviews, have been used to investigate students' linguistic behaviour in these medical/scientific branches and their attitudes towards the two competing languages. The results, analysed quantitatively and qualitatively, reveal a high degree of discrepancy as to students' competencies in French and their subsequent attitudinal behaviour towards the two languages. Further analyses of the obtained results suggest that students' competency and attitudes toward a given language are, so to speak, the systematic result of the sociocultural and societal environment backgrounds in which a speaker grows up.

Our research suggests that people with different socio-cultural backgrounds are simply the result of the way they lived and the way the lives of their parents affect them. Starting from childhood, the language that a child hears from the parents obviously affects his/her language development; then they are often exposed to it in the media, television and the social networks, which is going to contribute a lot in the building of the positive or negative attitudes towards that language which in turn will affect their linguistic behavior in the future. Indeed, these sociocultural backgrounds continue shaping people's attitudes and language skills till they create

different social categories once adulthood is reached. This is a truth that is certainly reflected in people's respective linguistic behavior and obviously will have an impact on students' education journey, particularly in scientific branches with French as the language of instruction. The point is that the sociocultural background is an extremely efficient 'schooling system' in relation to the learning of the French language. It is, without real intent, responsible for the positive or negative attitude toward the language that people might have. Therefore, language planners should invest to find a more appropriate way to offer those who master and those who do not master French an equal chance to succeed in a scientific stream. Successful education would have required better language planning, in particular teaching new fresh-coming students in Arabic, the language of instruction they have got used to for at least 12 years before university; and perhaps at least a real type of bilingual Arabic/French education.

In other words, the issue investigated in this work depicts the problematic fact that some students are somewhat better prepared for lectures in French but other are not, and such distinction is left to the random good will of their sociocultural backgrounds, their tendencies and positive or negative attitudes toward the language. Since education is a democratic affair, and good education in scientific domains concerns the whole population and not only those who are lucky to be skilled in the French language, we suggest that language policy makers and language planners should put such an issue among the most urgent linguistic and educational matters. Two options are to be considered by educational authorities and language planners: one option is to offer a bilingual type of education in scientific subjects, starting from middle school up to the end of secondary studies, which will provide a better preparation of pupils who wish to continue their studies at the university in one of these scientific or medical fields; the second option is obviously to resume Arabization to include scientific branches at university level, and in this case all pupils will have the same opportunity as they all do their pre-university in Arabic.

A further suggestion we would like to put forward is the implementation of the English language in scientific streams, but also in social sciences, law and economics, as almost everything in research today is first written in English. Students will need to be able to do their research in the international language as French does not offer similar opportunities to go deeper into scientific research.

Our research work also depicts the relationship between language behaviour and place of residence: the dichotomies south / north, Sahara / coastal towns, small interior towns / metropolitan cities can indeed explain, to a large extent, students' proficiency in the French language. We assume that attitude or constant use of language(s) will depend, in addition to other factors, on the geographical location a speaker comes from and the environment in which he/she has grown up. Moreover, as already mentioned, the well-spoken French that scientific branches count on is much more practiced in northern cities but is almost inexistent in southern and Saharan parts of the country, which ensues positive attitudes towards the language in the former context and negative in the latter. From the perspective that everyone on the Algerian soil should have equal education and equal chances to obtain such education, the authorities are urged to realise that this switch from Arabic to French is unjustified in the first place, and cannot satisfy the needs of all Algerians.

The other element that was investigated in this research was the evolution of the place of the French language. We wanted, in this research, to unravel the real position the French language holds in modern Algerian society in general and in the domain of education in particular and more precisely in sciences. We have discovered that we can label three generations that perceive French differently:

• First generation, just before and some years after independence, during which the French language was the dominant means of instruction at all levels. This resulted in todays' doctors and professors. One of the reasons that make French ultimately linked to sciences is that today's teachers at the university have known, for the most part of them, only French as a language of instruction. Moreover, those who specialised in sciences have never been Arabized since then. That generation valued a lot the French language and did not see the possibility of using another language as a means of instruction, especially in scientific domains.

- For the second generation, from the 1970s to the 1990s, we can explain the good level in French as due to its intense presence in the media and television. In fact, at that moment, the Algerians knew no other way of contacting the outer world, except for the French language. Its widespread presence in spoken and written media made a whole generation quite good in it. Yet, it was still unfair for a large number of people who were not good at it, particularly those living far from urban areas and big cities, those who have always settled in the south or in inland rural areas, and thus students did not have access to the French language and no equal chance when they wanted to study in a scientific stream. This points out a very serious matter. We believe that everyone has the right to grow in whatever culture they want; nevertheless, everyone should have the same level of education and the same chances to be educated including university.
- The third part is today's generation. Following the Arabization which started early after independence, we have observed that the link with the French language is almost broken, no child today has been in 'the French school'; they all have their studies in Arabic in primary and secondary school. Instead, today's children have lesser affective relation with French, but a stronger interest in the English language, apart from Arabic of course. It is not uncommon to hear a young speaker codeswitch, in a specific context of course, from Arabic to English rather than from French to English. A fact that was impossible to imagine two or three decades ago. The French language is, in other words, losing the grip little by little, and in scientific domains it might be replaced by English one day. Having no historical or affective attachment with the French language, the new generation may appeal for the Arabization as a normal phenomenon at all levels and in scientific domains too, with more importance given to English.

Meanwhile, the major problem for a lot of students remains the use of French in scientific branches and their total lack of competency in that language is nothing but a barrier to their future. In fact, a great number of students have explained that one of the reasons that led them to abandon a scientific branch was the French

language. As already mentioned, it is not fair that being at ease in a scientific branch is related to being good in the French language which is itself dependent on cultural backgrounds or regional origins. We reiterate some possible solutions and suggestions that have to be applied in the future.

The solution the majority ask for is the Arabization of all scientific streams. Indeed, any language is just a skill and the belief that one specific language is for sciences rather than another is a belief that is no more valid today. Some Arab countries in the Middle East, with a higher level of education, have scientific streams taught totally in Arabic without it being an issue. One of the solutions then is to continue the expansion of the process of Arabization to university level and scientific streams. We have established that the Algerian sociolinguistic situation is a complex one in such a manner that students once at university are divided into two categories, those who suffer the in scientific branches because of the French language and those who have been prepared to feel at ease with the use of French due to some practice of the language, including the sociocultural background. Nevertheless, it is the role of the educational policy to offer equal chances to all students. For this reason, we propose that if the French language is kept in medical, scientific and technological branches, at least a proper training should be offered to those who do not master the French language well, in such a way that even if sociocultural backgrounds and attitudes have created some differences in the mastery of French, that training will make up for the lack of competencies, offering the chance to those who are not skilled in the French language, yet skilled in math or medicine, to show their real potentials. Such a programme of language reinforcement already exists for some African students who study in Algeria but do not speak French. An additional resolution to be taken into account by Higher Education is, following the steps of globalisation, to realise that the real language of sciences and technologies today is English, and its gradual implementation at various levels of formal instruction may lead to a slow progressive replacement of the French language.

In an overall manner, there is no justification for the sudden switch to the French language in scientific branches which causes a lot of damage to many young

students. We believe in equal chances for all Algerian students, and therefore, it is an urgent language planning matter to find an adequate solution that fits all categories of students whether they master French or not, a solution that will certainly have a positive impact on the educational system as a whole.

Bibliography

References

- Allport, G. (1935). Attitudes. In *Handbook of social psychology*. Edited by C. Murchison, 798–844. Worcester, MA: Clark Univ. Press.
- Appel, R. and Muysken, P. (2005). *Language Contact and Bilingualism*. Amsterdam University Press. Published in 1987 at Edward Arnold, London.
- Aronoff, M. and Miller, J. (2003). *The Handbook of Linguistics*. Blackwell Publishers: Oxford
- Badawi, A. (1973). Mustawayat al arabiyya al muasira fi misr. (Levels of Arabic)
- Baker, C. (1992). Attitudes and Language. Clevedon: Multilingual Matters.
- Baker, C. (2001). Foundations of Bilingual Education and Bilingualism; 3rd.ed, Multilingual Matters Ltd. Clevedon, UK.
- Baker, C. (2006). Foundations of Bilingual Education and Bilingualism; 4th ed.
- Benrabah, M. (2007). 'Language Maintenance and Spread: French in Algeria'; in *International Journal of Francophone Studies*. Vol. 10, N° 1 & 2 (193-215).
- Benrabah, M. (2007). "Language in Education Planning in Algeria: Historical Development and Current Issues". In *Language Policy*. 6; 225-252. Springer.
- Benrabah, M. (2013) Language Conflict in Algeria: From Colonialism to Post-Independence. Bristol: Multilingual Matters, 2013, xiv + 199 pp.
- Bialystok, E. (2003). *Bilingualism in Development: Language, Literacy and Cognition*. (3rd. ed.) Cambridge University Press.
- Bialystok, E. (2011). Reshaping the mind: the benefits of bilingualism; in *Canadian Journal of Experimental Psychology*, 65 (4), 229–235.
- Blom, J.P and Gumperz, J.J (1972). 'Social meaning in linguistic structures: Codeswitching in Norway'; in J.J.Gumperz and D.Hymes (eds) *Directions in Sociolinguistics*. New York: Holt, Rinehart and Winston, pp. 407–34

- Bloomfield, L. (1933). Language. New York: Holt, Rinehart and Winston.
- Bourhis, R.Y. (1982). "Language Policies and Language Attitudes: Le monde de la francophonie". Ryan, E.B. and Giles, H. (1982). *Attitudes towards Language Variation: Social and Applied Contexts*. London: Edward Arnold. 34-62.
- Bourhis, R.Y. (1982). Language Policies and Language Attitudes: Le monde de la francophonie. In *The Social Psychology of Language 1: Attitudes towards Language Variation. Social and Applied Contexts*; Bouchard-Ryan and Giles (eds). 1982: 34-62.
- Breckler, S. J. (1984). Empirical validation of affect, behavior, and cognition as distinct components of attitude. *Journal of Personality and Social Psychology*. 47 (6): 1191–1205.
- Brown, K. & Ogilvie, S. (2009). *Concise Encyclopedia of Languages of the World*. Elsevier Ltd. Cambridge, Oxford, UK.
- Bullock, B. E. and Toribio, A. J. (2009) eds. *The Cambridge Handbook of Linguistic Code-switching*. Cambridge University Press; New York.
- Chomsky, N. (1957). Syntactic Structures. The Hague: Mouton.
- Chomsky, N. (1965). *Aspects of the Theory of Syntax*. The MIT Press: Cambridge; Massachussetts.
- Clyne, M. (2003) *Dynamics of Language Contact: English and Immigrant Languages*, Cambridge University Press, Cambridge.
- Cohen, A. (1975). A Sociolinguistic Approach to Bilingual Education. Rowley, Mass.: Newbury.
- Collinge, N.E. (2006). 'Indo-European Languages' in *Concise Encyclopedia of Languages of the World*. Pp. 528-31. Elsevier Ltd. Cambridge, UK.
- Cooper, R. L. (1989). *Language Planning and Social Change*. Cambridge University Press.
- Crawford, J. (1998). Language Politics in the U.S.A.: The Paradox of Bilingual Education in *Social Justice* Vol. 25, No. 3 (73), Crossing Lines: Revisioning U.S. Race Relations (pp. 50-69).
- Crystal, D. (1992). *Introducing Linguistics*. Penguin English Linguistics.
- Cummins, J. (2000). Language, Power and Pedagogy: Bilingual Children in the Crossfire. Clevedon, England: Multilingual Matters.

- Cummins, J. (2003). BICS and CALP: Origins and rationale for the distinction. In C. B. Paulston & G. R. Tucker (Eds.), *Sociolinguistics: The essential readings* (pp. 322-328). London: Blackwell.
- Cummins, J. (2009). Bilingual and Immersion Programs, in *The Handbook of Language Teaching*; Long and Doughty eds. (pp.161-181). Blackwell Ltd.
- Dendane, M. A. (2011). Bilingualism and Students' Attitudes towards Arabic and French in two Settings: The Islamic Sciences Department and the Faculty of Medicine, Tlemcen University. Unpublished Magister thesis; Tlemcen Univ.
- Dendane, Z. (2007). Sociolinguistic Variation and Attitudes toward Language Behaviour in an Algerian Context: The Case of Tlemcen Arabic. Unpublished Doctorate Thesis. University of Oran.
- Dendane, Z. (2015). Dialectal Arabic, MSA and Formal Education in Algeria; in *Revue Traduction et Langues*. Université d'Oran 2.
- De Saussure, F. (1915). *A Course in General Linguistics*. C. Bally and A. Sechehaye (eds.) Wade Baskin, trans. New York: McGraw-Hill. 1959.
- Djennane, T. (2014). Diglossia's stability in the Arab world: Algeria as an instance in *IOSR Journal of Humanities and Social Science (IOSR-JHSS) Volume 19*, *Issue 11*, Ver. VII (Nov. 2014), PP 52-56.
- Dörnyei, Z. (2009). Individual differences: Interplay of learner characteristics and learning environment. *Language Learning 59* (Suppl. 1), 230-248.
- Dörnyei, Z. (2019). Psychology and Language Learning: The Past, the Present and the Future; in *Journal for the Psychology of Language Learning*, pp. 27–41.
- Doughty, C. J. & Long, M. H. (2003). *The Handbook of Second Language Acquisition*. Doughty & Long eds. Blackwell Publishing Ltd.
- Downes, W. (1998) 2nded. Language and Society. Cambridge: CUP.
- Eagly, A. H., & Chaiken, S. (1993). *The Psychology of Attitudes*. Harcourt Brace Jovanovich College Publishers.
- Eastman, C. M. 1992 (ed.). Codeswitching. Clevedon: Multilingual Matters.
- Elis, R. (2015). Understanding Second Language Acquisition. (2nd ed.); Oxford.
- Ennaji, M. (1991). Aspects of Multilingualism in the Maghreb. *International Journal of Sociology of Language*, 87: 7-25.

- Ennaji, M. (2005). *Multilingualism, cultural identity, and education in Morocco*. New York, NY: Springer.
- Fabrigar, L. R., MacDonald, T. K. and Wegener, D. T. (2005). The Structure of Attitudes in *The Handbook of Attitudes* Routledge Accessed on: 27 Jul 2021. https://www.routledgehandbooks.com/doi/10.4324/9781410612823.ch3
- Fasold, R. (1984). The Sociolinguistics of Society. Oxford: Basil Blackwell.
- Ferguson, C. A. (1959*a*). Diglossia; in *Word*, Vol. 15. 325-40; in Giglioli ed. 1972: 232-51.
- Ferguson, C. A. (1970). The Role of Arabic in Ethiopia: A Sociolinguistic Perspective. In Pride and Holmes *Sociolinguistics* (1972: 112-24).
- Ferguson, C. A. (1991). Diglossia revisited; *Southwest Journal of Linguistics*, 10 (1): 214–34.
- Ferguson, C. A. and Gumperz, J. J. (eds) (1960) *Linguistic diversity in South Asia*. Bloomington; Research Center in Anthropology, Folklore and Linguistics; Ind. Univ.
- Ferguson, G. (2006) *Language Planning and Education*. Edinburgh: Edinburgh University Press.
- Fishman, J. A. (1965). 'The relationship between Micro- and Macro-sociolinguistics in the study of who speaks what language to whom and when'; in *Sociolinguistics* Pride & Holmes eds. 1972. pp 15-32.
- Fishman, J. A. (1967). Bilingualism with and without Diglossia; Diglossia with and without Bilingualism. in *Journal of Social Issues*, 23, 29-38.
- Fishman, J. A. (1968). Nationality-Nationalism and Nation-Nationism; in *Language Problems in Developing Nations*, pp. 39-51
- Fishman, J. A. (1970). *Sociolinguistics: A brief Introduction*. Rowley: Newbury House Publishers.
- Fishman, J. A. (1972) Domains and the Relationship between Micro- and Macro-sociolinguistics. in *Directions in Sociolinguistics*. Ed. John J. Gurnperz and Dell Hymes. New York: Holt, Rinehart and Winston, pp. 435-453.
- Fishman, J. A. (I974*b*). Language modernization and planning in comparison with other types of national modernization and planning. In Joshua A. Fishman (Ed.), *Advances in Language Planning*. The Hague: Mouton, pp. 79-102.

- Fishman, J. A. (1989). Language and Ethnicity in Minority Sociolinguistic Perspective; Clevedon, England: Multilingual Matters.
- Freeman, A. (1996). 'Perspectives on Arabic Diglossia'. Web article from Freeman's Web page: www-personal.umich.edu/~andyf/index.html
- Gardner, R. C. (1960). *Motivational Variables in Second Language Acquisition*; PhD thesis; McGill University.
- Gardner, R. C. (1985). Social Psychology and Second Language Learning: The Role of Attitudes and Motivation. London: Edward Arnold.
- Gardner, R. C., & Lambert, W. E. (1959). Motivational variables in second-language acquisition. *Canadian Journal of Psychology/Revue canadienne de psychologie, 13* (4), 266–272.
- Gardner, R. C. & Lambert, W. E. (1972). Attitudes and motivation in second Language learning. Rowley, MA: Newbury House.
- Gardner-Chloros, P. (2009). Code-Switching. CUP; Cambridge.
- Garrett, P., N. Coupland, and A. Williams. 2003. *Investigating Language Attitudes*. Cardiff: University of Wales Press.
- Grandguillaume, G. (2004). Country case on the language of instruction and the quality of basic education: Policy of Arabization in primary and secondary education in Algeria; in *Education for all Global Monitoring*, (pp. 1-57); UNESCO Report 2005.
- Grandguillaume, G. (2013). Les débats et les enjeux linguistiques ; in *Où va l'Algérie*, Mahiou, A. and Henry, J-R, eds. Published by IREMAM, Aix-en-Provence, France.
- Grimes, Barbara. F. (1992). *Ethnologue: Languages of the World*. Dallas: Summer Institute of Linguistics, 1992.
- Grosjean, F. (1982). *Life with Two Languages: An Introduction to Bilingualism*. Cambridge, Mass: Harvard University Press.
- Grosjean, F. (2008). *Studying Bilinguals*. Oxford University Press.
- Grosjean, F. and Byers-Heinleins, K. (2018). *The Listening Bilingual: Speech Perception and Comprehension in Bilinguals*; Wiley Blackwell.
- Gullberg, M., Indefrey, P. & Muysken, P. (2009). Conceptual and methodological

- considerations in code-switching research; in Bullock & Almeida eds. *The Cambridge Handbook of Linguistic Code-switching*. CUP; New York.
- Gumperz, J.J. and Hymes, D. (1972). *Directions in Sociolinguistics: The Ethnography of Communication*. Holt, Rinehart and Winston, Inc. New York, Chicago, Montreal...
- Gumperz, J. J. (1976). The sociolinguistic significance of conversational codeswitching; in *Papers on Language and Context* (Cambridge), pp 59-99.
- Gumperz, J. J. (1982). Discourse Strategies. Cambridge: CUP.
- Hamers, J. F. & Blanc, M. H. (2000). Bilinguality and Bilingualism. 2nd ed. CUP.
- Haarmann, H. (1990). Language planning in the light of a general theory of language:

 A methodological framework. *International Journal of Sociology and Language*, 86, 103-126.
- Haugen, E. (1950): "The analysis of linguistic borrowing". Language 26, 210–231.
- Haugen, E. (1953). *The Norwegian Language in America: A Study in Bilingual Behavior*. Philadelphia, University of Pennsylvania Press, 1953.
- Haugen, E. (1959). Planning for a standard language in modern Norway; in *Anthropological Linguistics*, 1(3): 8-21.
- Heggoy, A. A. (1973). Education in French Algeria: an Essay on Cultural Conflict; in *Comparative Education Review*; Vol. 17, N°2: The University of Chicago.
- Hogg, M., & Vaughan, G. (2005). *Social Psychology (4th edition)*. London: Prentice-Hall.
- Hudson, A. (1992). Diglossia: a bibliographic review; in *Language in Society* 21, 611-674.
- Hymes, D. (1972). 'Models of the interaction of language and social life', in *Directions in Sociolinguistics: The Ethnography of Communication*; in Gumperz and Hymes eds (1972).
- Kaplan, R. B. & Baldauf, R. B. Jr. (1997). *Language planning: From practice to theory*. Clevedon, U.K.: Multilingual Matters.
- Kerma, M. (2018). The Linguistic Friction in Algeria; in *Sociology International Journal* (134-140).

- Krashen, S. D. (1975). The critical period for language acquisition and its possible bases; in *Annals of the New York Academy of Sciences*; Vol. 263:1 'Developmental Psycholinguistics and Communication Disorders'; pp. 211-24.
- Krashen, S. D. (1981). Second Language Learning and Second Language Learning.

 University of South California; Pergamon Press Inc.
- Labov, W. (1966). *The Social Stratification of English in New York City*; Washington DC: Center for Applied Linguistics.
- Labov, W. (1972a). Sociolinguistic Patterns. Philadelphia; Univ. Pennsylvania Press.
- Labov, W. (2001). *Principles of Language Change: Social Factors*. Blackwell Publishers: UK; USA.
- Lambert, W.E., R.C. Hodgson, R.C. Gardner, and S. Fillenbaum. (1960). Evaluational reactions to spoken language. *Journal of Abnormal and Social Psychology* 60.1: 44-51.
- Lambert, W. E. (1975). Culture and language as factors in learning and education. In A. Wolfgang (Ed.). *Education of Immigrant Students*. Toronto: O.I.S.E.
- Lambert, W. E. (1981). The social psychology of language: A perspective for the 1980s; in Focus; N° 5.
- Lambert and Tucker (1972). Bilingual Education of Children: The St. Lambert Experiment Rowley, MA: Newbury House.
- Lenneberg, E. H. (1967). Biological Foundations of Language. Oxford, England: Wiley
- Lewis, E.G. (1981) Bilingualism and Bilingual Education. Oxford: Pergamon.
- Long, M. H. & Doughty, C. J. (2009). *The Handbook of Language Teaching*. Doughty & Long eds. Blackwell Publishing Ltd.
- Marçais, W. (1930) 'La diglossie arabe' in L'enseignement public 97, pp. 401-409.
- Matras, Y. (2009). Language Contact. Cambridge University Press.
- McKenzie, R. M. (2015) The Social Psychology of English as a Global Language: Attitudes, Awareness and Identity in the Japanese Context. Springer; London, N.Y.
- Meyerhoff, M. (2002) "Social psychology of language and language variation.," *University of Pennsylvania Working Papers in Linguistics*: Vol. 8: Iss. 3.
- Milroy, L. and Muysken, P. (1995). *One Speaker, Two Languages: Cross-Disciplinary Perspectives on Code-switching.* Cambridge: CUP.

- Mitchell, T. (1975). Some Preliminary Observations on the Arabic Koine. *Bulletin* (*British Society for Middle Eastern Studies*), 2 (2), 70-86.
- Morsly, D. (1986). "Multilingualism in Algeria"; in Fishman *et al.* eds. *The Fergusonian Impact Vol. 2: Sociolinguistics and the Sociology of Language*. Mouton de Gruyter: Berlin; New York; Amsterdam.
- Muysken, P. (2000). Bilingual speech: A typology of code-mixing. Cambridge, UK and New York: Cambridge University Press.
- Myers-Scotton, C. (1993a) Social Motivations for Codeswitching: Evidence from Africa. Oxford: Oxford University Press.
- Myers-Scotton, C. (1993b) *Duelling Languages. Grammatical Structure in Codeswitching*. Oxford: Oxford University Press.
- Myers-Scotton, C. (2002b). Contact Linguistics. Oxford: Oxford University Press.
- Myers-Scotton, C. (2006) *Multiple Voices: An Introduction to Bilingualism*. Blackwell Publishing Ltd.
- Obiols, M. S. (2002). The Matched Guise Technique: a Critical Approximation to a Classic Test for Formal Measurement of Language Attitudes. Accessed March 2019. http://www.cultura.gencat.net/llengcat.noves
- Phillipson, R. (1992). Linguistic Imperialism; Oxford: Oxford University Press.
- Poplack, S. (1980). Sometimes I'll start a sentence in Spanish *y termino en español*: towards a typology of code-switching; in *Linguistics 18* (7/8): 581-618.
- Pride, J.B. and Holmes, J. 1(972) (eds). *Sociolinguistics*. Harmondsworth, Penguin.
- Psichari, J. (1928). 'Un pays qui ne veut pas de sa langue' in *Mercure de France*; 63-121.
- Redinger, D. (2010). Language Attitudes and Code-switching Behaviour in a Multilingual Educational Context: The Case of Luxembourg; PhD Thesis; York University
- Richards, J. C. and Schmidt, R. W. (2002). *Longman Dictionary of Language Teaching and Applied Linguistics*. Longman Publishing Group. Pearson Education Ltd.
- Romaine, S. (1989). Bilingualism. Blackwell Publishers: Cambridge
- Romaine, S. (2000). *Language in Society: An Introduction to Sociolinguistics*; 2nd ed. Oxford University Press Inc.; New York.

- Ryan, E. B., & Giles, H. (1982). *The Social Psychology of Language 1: Attitudes towards Language Variation. Social and Applied Contexts.* London: E. Arnold.
- Saadane, H. & Habash, N. (2015). A Conventional Orthography for Algerian Arabic, in *Proceedings of the Second Workshop on Arabic Natural Language Processing*, pages 69–79.
- Sahel, M. (2017); The Algerian Post-Independence Linguistic Policy a Recovery of National Identity in *European Journal of Language and Literature Studies*. Vol. 3 Issue 2 (pp. 38-43).
- Sayahi, L. (2014). *Diglossia and Language Contact: Language Variation and Change in North Africa*. Cambridge: Cambridge University Press.
- Senouci-Meberbeche, F. (2016). What Education for the Algerians in Colonial Algeria? in *Maçadir*; Vol. 15, N° 27, pp. 11-18.
- Schiffman, H. F. (2007); Diglossia as a Sociolinguistic Situation; in *The Handbook of Sociolinguistics*. Coulmas, Florian (ed). Blackwell Publishing, 1998. Blackwell Reference Online (28 Dec. 2007).
- Siegel, J. (2003). Social context; in *The Handbook of Second Language Acquisition*. Doughty & Long eds. Blackwell Publishing Ltd.
- Skutnabb-Kangas 2000, T. Linguistic Genocide in Education or Worldwide Diversity and Human Rights? Mahwah, N.J.: Lawurence Erlbaum.
- Spolsky, B. (1998). *Sociolinguistics*. Oxford University Press.
- Stewart, W. A. (1962). "Functional distribution of Creole French in Haiti." Report of the Thirteenth annual round table meeting on linguistics and language studies.
 Monograph series on languages and linguistics, 15. Washington, DC: Georgetown University Press. Pp. 149-59.
- Sotiropoulos, D. (1977). Diglossia and the national language question in Modern Greece; in *Linguistics* 197, pp 5-31. Mouton Publishers.
- Taleb Ibrahimi, K. (1997). Les Algériens et leur(s) langue(s): Eléments pour une approche sociolinguistique de la société Algérienne. Les Editions El Hikma, Alger.
- Thomason, S. G. & Kaufman, T. (1988) Language Contact, Creolization, and Genetic Linguistics. Berkeley: University of California Press.

- Trask, R. L. (2007). *Language and Linguistics: The Key Concepts*. P. Stockwell editor; Routledge.
- Tucker, G. R. (1999). "A Global Perspective on Bilingualism and Bilingual Education. ERIC Digest. Clearinghouse on Languages and Linguistics Washington DC.
- UNESCO (1953) *The Use of Vernacular Languages in Education*. Report of the UNESCO Meeting of Specialists (1951). Monographs on Fundamental Education III. Paris: UNESCO.
- UNESCO (2003). Education in a Multilingual World: UNESCO Education Position Paper. United Nations Educational, Scientific and Cultural Organization; Paris. France.
- UNESCO (2016). Global Education Monitoring Report
- Versteegh, K. (2014). *The Arabic Language* (2nd ed.; 1st ed. 1997). Edinburgh University Press.
- Wardhaugh, R. (1998). An Introduction to Sociolinguistics. USA: Blackwell Publ.
- Wei, L. (2000). The Bilingualism Reader; ed. Routledge, London & New York.
- Weinreich, U. (1979) [1953], Languages in Contact: Findings and Problems. New York: Mouton Publishers.
- Whitney, W. D. (1881) On Mixture in Language; in *Transactions of the American Philological Association* (1869-1896), Volume 12.
- Winford, D. (2003). *An Introduction to Contact Linguistics*. John Benjamins Publishing Company.
- Wright, W. E., Boun, S. and García, O. (2015). Key Concepts and Issues in Bilingual and Multilingual Education; in *The Handbook of Bilingual and Multilingual Education* (eds. Wayne E. Wright, Sovicheth Boun, and Ofelia Garcia). Wiley, Blackwell.

Appendices

Appendix A. Questionnaires

• Questionnaire 1 (to Students)

Sociolinguistics research

As part of a sociolinguistic research, we kindly ask you to answer these questions. Thank you for your cooperation

Gender:	Man [men	
Hometown:		• • • • • • • • • • • • • • • • • • • •	•••		
Faculty:					
Academic year:					
1.What langu	age do yo	ou speak bes	st?		
Arabic (Fush'	a)		I	French	
2.What langu	age do yo	ou understar	nd better?		
Arabic (Fush'	a)		I	French	
3.In which language do you prefer to read (books, newspapers)					
Arabic (Fush'a) French					
4.In which language do you prefer to watch TV programs?					
	Films	News	Series	Documentar	ies Debates
Arabic					
French					

English									
			•		•			•	
5.What langu	age do y	ou use on th	e inte	rnet a	ınd o	n socia	al media	ı?	
	Sear	rch and read	on the	e web)	Social	l Netwo	rks	
Arabic									
French									
English									
6.How would	you rate	e your level i	in the	se lan	guag	ges?			
	Standa	ard Arabic	Fre	ench		Englis	sh		
Very good									
Quite good									
Average									
Low									
Very weak									
7. Do you use conversations	_	sions in Stan	dard A	Arabio	c and	l / or F	rench in	ı you	r daily
	Stan	dard Arabic		Fren	ich				
Always									

Often

Sometimes
Rarely
Never
8. Would you like higher education to be in standard Arabic language?
Yes No
9. Do you find difficulty in the language in which you are studying?
Yes A little No
10. How do you consider a student who has a good command of the French language?
Clever Advantage Normal
11. How much do your parents use the French language?
A lot Sometimes Rarely Never

Questionnaire 2 (to students)

Google Form: Medecine / Biologie

اعزائي الطلبة، كجزء من بحث الدكتوراه المتعلق بلغة التدريس في علوم الطب و علم الأحياء، نرجو منكم ملء هذا الاستبيان . وشكرا لتعاونكم.

Chers étudiants Dans le cadre d'une recherche doctorale concernant la langue d'enseignement en sciences médicales et en biologie, nous vous demandons de bien vouloir remplir ce questionnaire.

Merci pour votre coopération

1.	1. Quelle langue maitrisez-vous le mieux (à part	votre langue maternelle)? أيّ اللغة
	لنظر عن لغتك	* تتحدثها بشكل أفضل (بصرف ا
		الأم)؟
	Arabe Standard	
	لعربية 🔾	
	ا Français الفصحى	
	الإنجليزية Anglaisلفرنسية	

2. En quellle langue vous exprimez-vous dans le quotidien? أي لغة تستعمل في الحياة

	Arabe algérien	Français	Arabe/Français	Arabe Standard
	العربية الدارجة	الفرنسية	عربي/ فرنسي	العربية الفصحى
A la maison				
قي البيت				
Avec les amis				
مع الأصدقاء				
مع الأساتذة				
Avec les enseignants				

3. Je trouve des difficultés à comprendre le cours en Français أجد صعوبة في فهم الدرس باللغة الفرنسية

	Enormément ك ثيراجدًا
	Beaucoup کثیرا
	Partiellement جزئيا
	Très peu قليلا
	Pas du tout لا على الإطلاق
4.	Dans quelle langue voudriez-vous que les cours soient faits? بأي لغة تريد أن تكون
روس؟	* الدر
	En français باللغة الفرنسية
	En arabe باللغة العربية
	Dans les deux langues كاتا اللغتين
5.	Veuillez écouter ce passage; degré de comprehension? ى رجى الاستماع إلى
	https://tinyurl.com/382c3afb المقطعو الرددرجة ألفهم
	Excellent ممتاز
	Très bien جيدا
	لیس جیدا Pas bienم توسط Assez bien
	Mal لا أفهم
6.	Veuillez écouter ce passage; degré de comprehension? ى رجى الاستماع إلى
	* <u>https://tinyurl.com/4s27bu7z</u> المقطعو الرددرجة ألفهم
	Excellent ممتاز
	Très bien جيدا
	Assez bien متوسط
	Pas bien لیس جیدا
	کا افهم ۱ کا

7. Après écoute, comment trouvez-vous l'enseignant en arabe? كيف تجد الأستاذ بالعربية * بعد الاستماع إليه

?le Bac* هل ترغب في إجراء الدروس (العلمية) باللغة الفرنسية قبل البكالوريا؟

Oui نعم
○ Non Y
Dans les deux langues باللغتين
11. Souhaitez-vous que les cours (scientifiques) soient donnés en arabe à
!Université! هل ترغب في إجراء الدروس (العلمية) باللغة العربية في الجامعة؟
Oui نعم Non کا Dans les deux langues باللغتين
12. 10. Pensez-vous que le taux de réussite serait meilleur si les cours à l'Université والمعقد العربية؟ *étaient en arabe هل تعتقد أن معدل النجاح سيكون أفضل إذا كانت الدورس في الجامعة باللغة العربية؟ Oui
Non کا ادري الحدي Je ne sais pas کا ادري

This content is neither created nor endorsed by Google.

Google Forms

Appendix B. Interviews

Interview 1 (with a physicist/pharmacist)

Question: Age? Answer: 32 - Female

Question: Where were you born and where do you live right now?

Answer: Constantine – Algiers

Question: What do you do for a living?

Answer: Pharmacist specialist head of laboratory, and I give lectures to paramedics.

Question: To what extent do you use the French language in everyday life?

Answer: Unimaginably, I master the French language better than Arabic. I speak Arabic in a French accent. I practice English too, but I don't like it like all francophone speakers.

Question: To what extent were your parents using the French language?

Answer: Moderately, but my grandparents were francophone.

Question: In which language do you favour watching movies, series, news or debates?

accates.

Answer: In French

Question: Which language do you use with colleagues and why?

Answer: French, I feel at ease, even between friends and parents, I can't use Arabic properly, I don't find the words. We grew up with the French television.

Question: What do you think of a person who masters well the French language?

Answer: A skill, that's all, but I feel at ease in it. Before, I used to associate it to a certain social class, but some French users are not that good.

Question: What do you think of someone who doesn't master the French language and studies medicine?

Answer: He is going to suffer

Question: What do you think of the French level of new students?

Answer: The level has degraded; they write pathologies in Arabic letters

Question: Do you have any other information about new students, please go ahead!

Answer: They learn by heart a lot and they have an Anglophone tendency.

Interview 2 (with a resident in medicine)

Question: Age and field of studies, please.

Answer: 27 years old and I've finished my 7 years of medicine... Now, residency.

Question: First, could you tell us how you felt in your first lectures in French when you started studying medicine.

Answer: When I got my Bac and chose to do medicine, I expected the thing would be easier than what I was shocked with. I didn't think it would be so hard.

Question: ... and you knew that the language of instruction was French?

Answer: Yes, when we made our choice, we were told it would be in French.

Question: Tell me about your first lecture, please.

Answer: When we went in, I found out that it was really difficult... Just imagine, after 13 years of Arabic, then suddenly, first session in French! I found myself lost

Question: How about the teachers? How did they behave with you linguistically?

Answer: For them, it was normal to give the lecture in French. They didn't care... I suppose there are many things, words and technical terms that they themselves didn't know how to say in Arabic.

Question: So, how did you cope with this?

Answer: This is what I did: when I went home and read the handouts of the lecture again and again, and I translated what I didn't understand.

Question: So, you used to translate the lectures... and how long did you do that?

Answer: When you get used to the translation, progressively you start understanding better. So, depending on the will-power of the student, you can feel better with French after the first term, then the second...

Question: So, the following year, you understood everything?

Answer: Not really, but things became much easier...

Question: How about other students, those who didn't do what you did, translating?

Answer: Well, students who didn't try their best to understand preferred to change, and indeed, some left to study in other branches, taught in Arabic. A friend of mine, for example, a brilliant student in high school, started doing Architecture, but soon left because of the language. He started studying Economics because it is in Arabic and succeeded ... but his desire was to become a doctor in Medicine. Another friend left Geology (in French) to Economics, too. He said "Going into the classroom was like going into Hell! I didn't understand anything, so I left."

Question: So, you think that it all depends on the student's will...

Answer: Yes, because actually, the language used in Medicine or a scientific branch is not complex; no tenses like 'l'imparfait' or 'le passé composé'; you just need some French and you get used to it.

Question: Now, imagine... How do you think it would be if sciences and medicine were in Arabic?

Answer: That would be perfect, because from the start you would be ready, as we did everything at school in Arabic up to the Bac. The capacity of assimilation would be natural and then you would focus on the contents of the lecture, not on the language as we do with French.

Question: How did you study French at that time (at school?

Answer: French? To be honest, we didn't learn a lot. I learned some more by myself

A last question: What do you think should be done to solve this issue?

Answer: Either they do everything to raise the level in French before university... by changing the programmes to prepare students who wish to do some scientific branch; or they teach everything in Arabic at university, and in this case it'll be easier... though I'm aware that this is a solution that is quite 'far' (to realise)!

Thank you very much for your participation.

Interview 3 (with a gastrologist/teacher in medicine)

Question: Age and place of birth, please...

Answer: 54; Tlemcen

Question: What do you do for a living?

Answer: Gastrologist.

Question: How much do you use the French language in everyday life?

Answer: Sometimes, but more often with colleagues

Question: How much do you use the French language with students/ patients?

Answer: With patients as much as they understand me. With students all the time inside classroom and the majority of the time outside the classroom.

Question: What was the main language of instruction when you were a student?

Answer: The French language, but our generation was better in it than this one, partially because we had the French language as the main means of instruction before university too.

Question: What do you think of the modern generation of students?

Answer: They have difficulties, as they lack good competency in French, they tend to use Arabic and some of them tend to use the English language, a language I would like myself to learn as I need it at international conferences that are not held in France.

Interview 4 (with a freshman in Sciences and Technology)

Question: Age and University branch, please.

Answer: 19- Sciences and Technology.

Question: How many modules do you have in the French language?

Answers: All of them: Physics- Mathematics-Informatics...

Question: How do you evaluate your capacities in the French language?

Answer: 6/10; Average.

Question: Do you have difficulties in understanding lectures due to the French

language?

Answer: Yes, sure

Question: Do your friends show the same kind of difficulties?

Answer: yes, indeed.

Question: How much do your parent use the French language?

Answer: A little, about 5%

Question: Would it be better if all modules were taught in the Arabic language?

Answer: yes, surely.

Question: Do you think it would have been better if you had a French language training before starting the actual lectures?

Answer: Yes, sure, but it would have been even better if courses were in Arabic.

Question: Do you think your Friends and you are better in English and why?

Answer: Yes, surely, because it's easier, and an international language and a language that all Algerians want to learn.

Question: Do you think you use it more than the French language with your friends? And in which domains?

Answer: Surely, inside the classroom and outside of it, in video games, where people usually speak in the English language.

Interview 5 (with a student of Economics)

Question: Age and place of birth, please?

Answer: 27 – Bechar - Female

Question: To what extent do you use the French language in everyday conversations?

Answer: I never use it, except words in the colloquial but I use it at work to answer calls on the phone.

Question: Do you use MSA in everyday speech? and to what extent?

Answer: I use it a lot, and I love it. I write in it and read in it and like using it in my everyday conversations.

Question: To what extent do your parents use the French language in their everyday conversations?

Answer: They never use it at all, except that I want to point out, that we use some French words like ('bureau', or *cousina*) .. it's an inseparable part of our dialect.

Question: What about MSA? Do your parents use it sometimes?

Answer: No, just me.

Question: Do you think people use the French language in different environments around you like work, family, etc.?

Answer: Yes, at work. Unfortunately, people think it is a sign of being evolved.

Question: What about your family?

Answer: They don't use it, we are a family that hates the French language. We grew up that way.

Question: Why is that?

Answer: It's a boring language, and neither my father nor mother master it well. My brothers might do but don't use it at all, we are an 'Arabized' family and I am from the Sahara; we use French very rarely.

Question: What about the use of the French language in the Sahara? How is it compared to other places?

Answer: It is rarely used. Our society does not use it often. We don't see it as a language of a higher rank. In other places they link French to being developed.

Question: How do you perceive a person who uses the French language a lot?

Answer: He/she likes appearances. They think using it makes them classy, but it is only a means of communication.

Question: Do you feel at ease while talking to such a person?

Answer: Not at all.

Question: what about the one who uses MSA in their speech?

Answer: I think that can be nice, I see those who use it as humble people.

Question: What about someone who uses English?

Answer: I like it. It's cool, language of sciences.

Question: If your studies at university were in the French language, how would you

feel?

Answer: I would abandon my study and change to another field. When I got my

Baccalaureate degree, I started looking for a stream that doesn't use the French

language. I was excellent in all subjects, except French. French made my life bitter,

I wouldn't find a job because of it.

Question: How do you compare the use of French in upper and southern states?

Answer: In Bechar, the use French is quite reserved, I guess because the French

colonization came late into the South; for such reason French was not a lot.

Question: Do you know people in Bechar who are in a scientific stream and have

difficulties in it because of the French language.

Answer: Not really, they got used to it.

Question: Are they better in Arabic?

Answer: Much better.

Question: Do you think they would have preferred their studies to be in Arabic?

Answer: Yes, certainly.

Bilingualism and Language Attitudes in Algerian Higher Education: Arabic and French as Languages of Instruction

الملخص

يثير هذا البحث مسألة التعليم الرسمي المقدم باللغة الفرنسية في المجالات الجامعية الطبية والعلمية بينما يتم التعليم ما قبل الجامعة باللغة العربية الرسمية. أحد الأهداف الحاسمة هو التساؤل عن النظام التعليمي الجزائري الحالي وشر عية ثنائية اللغة في التعليم العالي. فنحاول اقتراح طريقة صالحة للخروج من المشكلة التي يواجهها طلاب الجامعات. يتم جمع البيانات للتحقيق في سلوكهم اللغوي ومواقفهم تجاه اللغتين المتنافستين فتكشف النتائج عن درجة عالية من التناقض فيما يتعلق بكفاءات الطلاب في اللغة الفرنسية وسلوكهم في المواقف. في الواقع، اعتمادًا على البيئة الاجتماعية والثقافية للطلاب وخلفيتهم التعليمية، يعتمد النجاح أو الفشل في دراساتهم على كفاءتهم في اللغة الفرنسية وهذا تتطلب تخطيطًا أفضل للغة وربما تعليمًا ثنائي اللغة حقيقيًا.

الكلمات المفتاحية: - از دو اجية اللغة - التعليم الرسمي - المواقف تجاه اللغات - التخطيط اللغوي.

Summary

This research raises the issue of formal instruction offered in the French language in medical and scientific university streams while pre-university education is undertaken in Standard Arabic. One crucial aim is to question this dilemma in the present Algerian educational system and the legitimacy of bilingualism in higher education and we attempt to suggest a valid way out of the issue university students are faced with. Data are collected to investigate their linguistic behaviour and attitudes towards the two competing languages and the results reveal a high degree of discrepancy as to students' competencies in French and their attitudinal behaviour. In fact, depending on the students' socio-cultural milieu and their educational background, success or failure in their studies depend on their competence in French; and this definitely requires better language planning and perhaps a real bilingual education.

Key words: bilingualism - formal education - language attitudes - language planning

Résumé:

Cette recherche pose la question de l'enseignement formel offert en langue française dans les filières universitaires médicales et scientifiques alors que l'enseignement préuniversitaire est assuré en arabe standard. Un objectif crucial est de questionner ce dilemme dans le système éducatif algérien actuel et la légitimité du bilinguisme dans l'enseignement supérieur et nous tentons de proposer une solution valable pour sortir du problème auquel les étudiants universitaires sont confrontés. Des données sont recueillies pour enquêter sur leur comportement linguistique et leurs attitudes envers les deux langues concurrentes et les résultats révèlent un degré élevé de divergence quant aux compétences des élèves en français et à leur comportement attitudinal. En effet, selon le milieu socioculturel des élèves et leur parcours scolaire, la réussite ou l'échec de leurs études dépend de leur compétence en français qui nécessite une meilleure planification linguistique et peut-être un véritable enseignement bilingue.

Mots clés: bilinguisme - instruction formelle - attitudes langagières - planification linguistique