

**LEARNING STRATEGIES OF LEARNERS  
OF ENGLISH AS A FOREIGN LANGUAGE**

By  
**Kamel KHALDI**

**Submitted in accordance with the requirements for the degree of Doctor of  
Philosophy , University of Leeds , Department of Linguistics and Phonetics**

**MARCH 1990**

**ABSTRACT**

The aim of the present research is to investigate the learning strategies which are used for the acquisition of English by graduate students. This research encompasses the strategies which are used during the acquisition process in general as well as the strategies used for the acquisition of specific areas of the foreign language. Before carrying out the investigation proper, we shall look at the students' previous learning experience of English as well as their beliefs about the foreign language itself and the leaning process in general.

Furthermore, in order to determine the extent to which these strategies could have been the result of previous teaching, we have included an investigation of their teachers' background and teaching practices.

Our study differs from the ones which have been carried out so far in this field in many respects. First, it is we believe, among the very few studies which investigates the strategies learners use for the acquisition of English as a Foreign language. In addition, unlike other studies, it will try to establish whether the strategies used are inherent to the learning process itself or are the result of previous learning experience.

. Since our concern is an applied one, we shall not limit ourselves to the theoretical side of the problem only. Instead, we shall look at potential applications in the classroom. Our investigation of the learners' strategies will primarily rely on the use of Verbal Report Data, i.e. the use of a Questionnaire and an Interview in which we have included different language learning tasks which will allow us to observe how learners deal with the various aspects of the acquisition process.

In addition to the Introduction and Conclusion, the thesis is divided into five main chapters. The first chapter gives a very brief description of the language situation in Algeria and explains the role English plays in the educational system. The next two chapters, two and three, look at the theoretical developments in Linguistics and Psychology which have gradually led to the present interest in learners' strategies. The fourth chapter discusses in great details the rationale and design of our experiment as well the items which have been included in our eliciting instruments. The last chapter analyses the results and in the light of these discusses our hypotheses .

Our findings suggest that learning strategies are inherent to the learning process itself and are used by all learners irrespective of their proficiency in the foreign language. Furthermore, they show that some strategies tend to occur more often with the acquisition of a particular area of the language than with another which itself will tend to be associated with another set of strategies.

Finally, we shall discuss the important implications these findings have for the classroom teacher This is why we conclude our study by making various suggestions for the incorporation of these findings in the foreign language classroom, which we are convinced will help less able students to perform better in the foreign language.

**ACKNOWLEDGEMENTS**

This study was made possible by a grant provided by the Algerian Ministry of Higher Education. I wish to record my gratitude to this body.

I would like to thank my supervisor Dr Patrick LEACH for his advice and practical suggestions which have shaped the present work and who despite his illness kept a sustained interest in the research. The weaknesses of the study are entirely my own.

My thanks are also due to my colleagues in the English Department at the University of Algiers without whose help most of the data for the present research could not have been collected.

I am greatly indebted to Mme AKAMATSU for her help and support particularly during the last stages of the research.

I would like also to thank Dr FOX for reading the last Chapter as well as the Introduction and Conclusion of the thesis and for the practical suggestions he made.

Finally, I owe a particular debt to my wife whose unflagging support and understanding amid difficult circumstances for her made the completion of this thesis possible.



## TABLE OF CONTENTS

### INTRODUCTION :

1. Statement of the Problem	1
2. Definition and Limitations	2
3. Review of the Literature	3
4. Objectives and Research Questions	7
5. Methods of Investigation	9
6. Presentation of the Study	12

### CHAPTER ONE

#### The Language Situation in Algeria and The Role of English in the Educational System

1.1. The Language Situation in the Past	14
1.2 The Language Situation Today	16
1.3. The Educational System	17
1.3.1. Primary and Secondary Education	
1.3.2. English in the Educational System	
1.3.2.1. English in Secondary Education	
1.3.2.2. English in Higher Education	19
1.3.3. The English Department	20

### CHAPTER TWO

#### Background to the Development of the Study of Learning Strategies: Issues in First and Second / Foreign Language .

2.1. First Language Acquisition Theories	25
2.1.1. Psychological Approaches	25
2.1.2. Linguistic Approaches	36
2.1.3. Other Issues	42
2.1.4. Conclusion	45
2.2. Foreign Language Acquisition Issues	45
2.2.1. Problems Involved in the Study of Foreign Language Acquisition	
2.2.2. A Role for the First Language ?	48
2.2.3. Areas of Investigation in Foreign Language Acquisition	



2.2.3.1. Study of Output	56
2.2.3.2. Study of Input	58
2.2.3.3. The Study of Learner Processes	61
2.2.3.4. Learner Differences	64
2.2.4. Foreign Language Learning Models	69
2.2.4.1. The Input Hypothesis	70
2.2.4.2. The Strategy Model	74
<b>CHAPTER THREE</b>	
<b>Theoretical Background to Learning Strategies</b>	
3.1. Cognitive Psychology	80
3.1.1. Historical Background	
3.1.2. Its Present State and Views	82
3.2. Cognitive Psychology and Language Learning	83
3.3. Cognitive Psychology and Strategies	85
3.3.1. Research History	
3.3.2. Clarifying Terms	86
3.4. Foreign Language Learning Strategies : A Survey Of the Literature	
3.4.1. Learning Strategies in the Learning Process	90
3.4.2. Learning Strategies and Language Skills	97
3.4.3. Learning Strategies and Students Beliefs	98
3.5. Eliciting Methods	99
3.5.1. Eliciting Methods in Cognitive Psychology	
3.5.2. Eliciting Methods in the investigation of Learning Strategies in Foreign Language Acquisition	
3.5.2.1. Classroom Observation	101
3.5.2.2. Verbal Report Data	102
<b>CHAPTER FOUR</b>	
<b>Rationale and Design</b>	
4.1. Rationale	105
4.2. Objectives and Research Questions	106
4.3. Design	107

4.3.1. Choice of Informants	107
4.3.2. Eliciting Instruments	108
4.3.2.1. Teachers' Questionnaire	109
4.3.2.2. Students' Questionnaire	110
4.3.2.3 Students' Interview	111
4.3.2.4. Classroom Observation	112
4.3.3. Organisation of the Eliciting Instruments	113
4.3.3.1. The Students' Questionnaire	113
4.3.3.2. The Students' Interview	117
4.3.4. Procedure	
4.3.4.1. Carrying Out the Experiment	123
4.3.4.2. Recording the Information and Exploiting the Data	
4.3.4.2.1. Recording the Information	125
4.3.4.2.2. Exploiting the Data	126
<b>CHAPTER FIVE</b>	
<b>Results and Discussion</b>	
5.1. Results	
5.1.1. Teachers' Questionnaire	127
5.1.2. Students' Questionnaire	
5.1.2.1. PART ONE : Assessing Students' Background	136
5.1.2.2. PART TWO : Assessing Students' Beliefs	143
5.1.2.3. Students' Use of Learning Strategies	150
5.1.3. The Interview	162
5.1.3.1. Procedural Points	162
5.1.3.2. Results for First-Year Students	163
5.1.3.3. Results for Fourth-Year Students	172
5.1.3.4. Productivity of the Learning Strategies	182
5.2. Discussion of The Research Questions	
5.2.1. First Research Question	187
5.2.2. Second Research Question	

5.2.2.1. Results	189
5.2.2.1.1. Procedural Points	
5.2.2.1.1.1. Language Skills	191
5.2.2.1.1.2. Language Learning Activities	196
5.2.2.1.1.2.1. Learning Specific Items	205
5.2.2.1.1.3. Language Learning in General	213
5.2.2.2. Discussion	
5.2.2.2.1. LS and Language Skills	220
5.2.2.2.2. LS and Language Items	223
5.2.2.2.3. LS and the Language Learning Process	224
5.2.3. Third Research Question	227
5.2.3.1. Procedural Points	
5.2.3.2. LS Use and the Stage of acquisition in the Target Language	228
5.2.3.3. LS Use and the Degree of Proficiency in the Target Language	229
5.2.3.4. Conclusions	230
<b>GENERAL CONCLUSIONS</b>	<b>231</b>
1) About Teachers	
2) About the Students' Background and Beliefs	
3) About Our Research Questions	
4) Implications for the Teaching of Foreign Languages	
5) Suggestions for Further Research	
<b>BIBLIOGRAPHY</b>	<b>238</b>
<b>APPENDICES</b>	



## LIST OF APPENDICES

Appendix 1	Stern' s list of learning strategies (1975)
Appendix 2	Naiman et al.'s list of learning strategies (1978)
Appendix 3	Rubin's classification of learning strategies (1981)
Appendix 4	O' Malley et al. 's learning strategies categories (1985)
Appendix 5	BALLI 's five main areas of investigation
Appendix 6	The Teachers' Questionnaire
Appendix 7	The Students' Questionnaire
Appendix 8	The Students' Interview
Appendix 9	Example of summary sheet for reporting the teachers' answers
Appendix 10	Example of summary sheet for reporting the students' answers to the Questionnaire
Appendix 11	Example of summary sheet for reporting the students' answers to the Interview
Appendix 12	Percentage Table for Teachers
Appendix 13-29	Results Tables for the Teachers' Questionnaire
Appendix 30	Percentage Table for Fourth-Year Students
Appendix 31-44	Results Tables for the Students' Questionnaire ( Part One )
Appendix 45-55	Results Tables for the Students' Questionnaire (Part Two)
Appendix 56	List of the individual scores obtained for the Questionnaire in the First-Year
Appendix 57	List of the individual scores obtained for the Questionnaire in the Fourth-Year
Appendix 58	Statistical Formulas used in the research
Appendix 59	List of the individual scores obtained in the Interview for the First-Year
Appendix 60	List of the individual scores obtained for the Interview in the Fourth-Year

- Appendix 61      Transcription tables of the students' answers to the open-ended questions and language-learning activities in the Interview
- Appendix 62      List of the new scores obtained by First Year students for the use of the learning strategies contained in the Questionnaire and the Interview
- Appendix 63      List of the new scores obtained by Fourth-Year students for the use of the learning strategies contained in the Questionnaire and the Interview
- Appendix 64      List of the scores obtained for the students' beliefs in the First-Year
- Appendix 65      List of the scores obtained for the students' beliefs in the Fourth-Year
- Appendix 66      Result Tables for metacognitive LS use in the Questionnaire
- Appendix 67 to 72      Result Tables for cognitive LS use in the Questionnaire
- Appendix 72 to 74      Result Tables for metacognitive LS use in the Interview (First Year)
- Appendix 75 to 82      Result Tables for cognitive LS use in the Interview (First Year)
- Appendix 83 to 85      Result Tables for metacognitive LS use in the Interview (Fourth Year)
- Appendix 86 to 93      Result Tables for cognitive LS use in the Interview (Fourth Year)

## LIST OF TABLES

Table 1.1	The language situation in Algeria	17
Table 1.2	The role of English and other foreign languages in the Algerian Educational system	20
Table 1.3	Example of the course content in the Weekly time-table for the first three years of the 'Licence'	22
Table 1.4	Example of the course content in the Weekly time-table for the Fourth-Year of the 'Licence'	23
Table 4.1	Types of questions included in the students' Questionnaire	113
Table 4.2	Distribution of metacognitive learning strategies in the students' Questionnaire	114
Table 4.3	Distribution of cognitive learning strategies in the students' Questionnaire	116
Table 4.4.	Areas of language acquisition investigated by the cognitive and metacognitive strategies included in the students' Questionnaire	117
Table 4.5	Distribution of the various types of questions included in the students' Interview	120
Table 4.6	Distribution of metacognitive learning strategies in the students' Interview	121
Table 4.7	Distribution of cognitive learning strategies in the students' Interview	122
Table 4.8	Areas of language acquisition investigated by the cognitive and metacognitive learning strategies in the students' Interview	123
Table 5.1	Appendix and Table Numbers corresponding to each question in the Teachers' Questionnaire	128
Table 5.2	Appendix and Table numbers corresponding to each question in the Students' Questionnaire (Part One)	137
Table 5.3	Appendix and Table numbers corresponding to each question in the Students' Questionnaire (Part Two)	145



Table 5.4	Summary of the total number of LS available in the Questionnaire and the actual number each student could use	151
Table 5.5	Frequency Distribution of LS Use in the Questionnaire in the First (GI) and Fourth Year (GII)	152
Table 5.6	Mean and Standard Deviation for GI and GII in the Questionnaire	152
Table 5.7	Example of the results obtained for the Use of the LS 'Self-Monitoring' in the Questionnaire	153
Table 5.8	Summary Table of metacognitive LS use in the Questionnaire	153
Table 5.9	Use of the LS 'Formal Practising' in the Questionnaire	156
Table 5.10	Summary Table of metacognitive LS use in the Questionnaire	156
Table 5.11	Summary of the total number of LS available in the Interview and the actual number each student could use.	163
Table 5.12	Distribution of 'good' and 'less good' students in each Year with their corresponding numbers	162
Table 5.13	Frequency distribution of LS use in the Interview in the First Year	163
Table 5.14	Mean and Standard Deviation for the two groups in the First Year	164
Table 5.15	Summary table of metacognitive LS use in the Interview (First Year)	164
Table 5.16	Summary table of cognitive LS use in the Interview (First Year)	167
Table 5.17	Frequency distribution of LS use in the Interview in the Fourth Year	173
Table 5.18	Mean and Standard Deviation for the two groups in the Fourth Year	173
Table 5.19	Summary of Metacognitive LS use in the Interview (Fourth Year)	174
Table 5.20	Summary table of cognitive LS use in the Interview (Fourth Year)	176
Table 5.21	Language learning areas covered by the open-ended questions and tasks in the Interview	182

Table 5.22	LS used in answering the various open-ended questions and performing the various tasks related to the acquisition of language skills acquisition of language Skills.	184
Table 5.23	LS used in answering the various open-ended questions and performing the various Tasks related to the Acquisition of Language Items 185	
Table 5.24	LS used in answering the various open-ended questions and performing the various Tasks related to Language Learning in General	185
Table 5.25	Summary of the LS which have been used in each area of the learning process	186
Table 5.26	LS used in connection with acquisition of 'Speaking' in the Questionnaire.	189
Table 5.27	LS used in connection with the acquisition of 'Speaking' in the various eliciting instruments	191
Table 5.28	Frequency of LS use in connection with the acquisition of 'Speaking' in the First Year.	192
Table 5.29	Frequency of LS use in connection with the acquisition of 'Speaking' in the Fourth Year	194
Table 5.30	LS used in connection with the acquisition of 'Writing' in the various eliciting instruments	196
Table 5.31	Frequency of LS use in connection with the acquisition of 'Writing' in the First Year.	197
Table 5.32	Frequency of LS use in connection with the acquisition of 'Writing' in the Fourth Year.	198
Table 5.33	LS used in connection with the acquisition of 'Listening' in the various eliciting instruments	199
Table 5.34	Frequency of LS use in connection with the acquisition of 'Listening' in the First year.	200
Table 5.35	Frequency of LS use in connection with the acquisition of 'Listening' in the Fourth year.	201



Table 5.36	LS used in connection with the acquisition of 'Reading' in the various eliciting instruments	202
Table 5.37	Frequency of use of LS use in connection with the acquisition of 'Reading' in the First year.	203
Table 5.38	Frequency of LS use in connection with the acquisition of 'Reading' in the Fourth Year.	204
Table 5.39	LS used in connection with the acquisition of 'Grammar' in the various eliciting instruments	205
Table 5.40	Frequency of LS use in connection with the acquisition of 'Grammar' in the First Year	206
Table 5.41	Frequency of LS use in connection with the acquisition of 'Grammar' in the Fourth year.	207
Table 5.42	LS used in connection with the acquisition of 'Vocabulary' in the various eliciting instruments	208
Table 5.43	Frequency of LS use in connection with the acquisition of 'Vocabulary' in the First year.	209
Table 5.44	Frequency of LS use in connection with the acquisition of 'Vocabulary' in the Fourth year.	210
Table 5.45	LS used in connection with the acquisition of the 'Sound System' in the Interview and Tasks	211
Table 5.46	Frequency of LS use in connection with the acquisition of 'the Sound System' in the First year	212
Table 5.47	Frequency of LS use in connection with the acquisition of 'the Sound System' in the Fourth year	212
Table 5.48	LS used in connection with learners' 'Learning Styles' in the Questionnaire and Interview	213
Table 5.49	Frequency of LS use in connection with the learners' 'Learning Styles' in the First year	214
Table 5.50	Frequency of LS use in connection with the learner's 'Learning Styles' in the Fourth year	215



Table 5.51	LS use in connection with students' 'Dealings with Errors' in the Tasks	216
Table 5.52	Frequency of LS use in connection with students' 'Dealings with Errors' in the First year	217
Table 5.53	Frequency of LS use in connection with students' 'Dealings with Errors' in the Fourth year	218
Table 5.54	Summary of LS use in connection with the learners' dealing with 'Memorisation' in the Tasks	218
Table 5.55	Frequency of LS use in connection with 'students' dealing with 'Memorisation' in the First year	219
Table 5.56	Frequency of LS use in connection with students' dealing with 'Memorisation' in the Fourth year	219
Table 5.57	LS use in connection with 'Notes-Taking' in the Tasks	220
Table 5.58	Mean and Standard Deviation for all First and Fourth-Year students' in the Interview	228
Table 5.59	Value for t in the Questionnaire and the Interview between the First and the Fourth-Year	229
Table 5.60	Value for t between each group in the First and the Fourth Year	229

## LIST OF ABBREVIATIONS

CS	:	Communication Strategies
FL	:	Foreign Language
GI	:	First-Year Students
GII	:	Fourth-Year Students
GIA	:	Group of 'Good' students in the First Year
GIB	:	Group of 'less Good' students in the First Year
GIIA	:	Group of 'Good' students in the Fourth Year
GIIB	:	Group of 'less Good' students in the Fourth Year
IL	:	Interlanguage
L1	:	Mother Tongue
L2	:	Second Language
LS	:	Learning Strategies
TL	:	Target Language
TG	:	Transformational-Generative

## INTRODUCTION

### 1. Statement of the Problem:

The aim of the present research is to investigate the learning strategies which foreign language learners use during the acquisition process in general, and more specifically while they are acquiring various language skills (Speaking, Reading, Writing, and Listening) and language items (Grammar, Vocabulary, the Sound System). In addition to the strategies proper, we have also included a thorough investigation of the factors which we think will determine the extent to which these strategies will be used. These include (i) the learners' previous learning experience of the foreign language and their beliefs about the foreign language itself and the learning process in general, and (ii) their teachers' background and teaching practices in order to determine the extent to which, if any, the strategies learners use are the result of previous teaching.

Our interest in learners' strategies stems primarily from our dissatisfaction with the explanations which are usually put forward to explain learners' differences in achievement in the foreign language. These explanations usually try to account for learners' differences in terms of their intelligence, aptitude or motivation. Such explanations, if true to some extent, do not nevertheless provide a comprehensive and satisfactory answer because, as our own teaching experience has shown, among less successful learners many are highly intelligent and sometimes strongly motivated. Nor do we accept the theory that these differences in achievement are the results of the teaching methods and teaching materials which are used since such a difference can be encountered in every foreign language classroom irrespective of the teacher or the teaching materials.

We strongly felt that what was needed thus, was an approach that would encompass all the learners' cognitive abilities which come into play in the acquisition process and which would explain these differences in terms of a difference in the cognitive abilities of the learners. Such an approach emerged from the various works carried out by many researchers who, inspired by the findings of cognitive psychologists in the investigation of the cognitive processes involved in the acquisition of the mother tongue, have pointed out the importance of learners' learning strategies in determining to a great extent, success in the acquisition process. We found in this notion of 'Learning Strategy' a workable concept which can satisfactorily account for the learners' differences in achievement. These studies have originally concentrated on the strategies which 'good' language learners use and compared them with the strategies used by less able students. Their findings have convincingly shown that these strategies



contribute greatly in enhancing the former overall performance in the foreign language. Gradually however, the emphasis on the dichotomy 'good' Vs 'less good' students has come to be less crucial than the investigation of the learning strategies themselves which all students use, as well as the extent to which they are used. In addition to their identification there was also an attempt at providing a classification framework for these strategies. It is against this general theoretical framework that our research will be conducted. Before discussing the research proper, we must emphasise however, that our principal motivation in undertaking it is to address the concerns of the classroom teacher, because ultimately, our purpose in studying learners' learning strategies is an applied one: We hope to determine which strategies are used most effectively by students in acquiring various areas of the foreign language and how these can be incorporated in future teaching materials and methods.

## 2. Definition and Limitations:

The task of providing a workable definition for the term 'strategy' did not prove an easy one, since like many other concepts in Applied Linguistics, the term has come to mean different things to different people: Depending on whether the researcher is more inclined on the linguistic or psychological side of the problem, the definition varies accordingly. This has led to a conceptual and terminological confusion which is not made to help the researcher. As Naiman et al. (1978:22) point out: "a consensus on a definition of the term is lacking." For instance, many researchers who study learners' errors refer indiscriminately to strategies as encompassing both learning and communication strategies, confusing thus, strategies which are meant for 'learning' (i.e. acquiring the foreign language) and 'communicating' (i.e. using it). Another confusion which has been made is between 'strategy' and 'processes', the latter being used to mean 'linguistic rules.' As for the 'Learning Strategies' proper, they have been variably defined as "techniques or devices which a learner may use to acquire knowledge". (Rubin 1975:8), or alternatively as "...activities in which the learner may engage for the purpose of improving TL competence ". (Bialystok 1983:101)

We think however, that the most comprehensive definition, which we shall use as our workable definition because it encompasses all the parameters involved in the concept 'strategy', is provided by O'Malley et al (1985:557) who define learning strategies as "operations or steps used by a learner to facilitate the acquisition, storage and retrieval of information".

In addition to the lack of agreement on a common definition there has also been a disagreement among researchers about how best to tap these strategies: some rely on classroom observation which other researchers reject in favour of students' retrospective



accounts of their learning procedures, while others suggest combining both methods. These points will be discussed in further details below. In undertaking this research we were aware that, because of the nature of the work, we would meet some limitations which would prove beyond our control. Thus, in the course of carrying it out we encountered three major restrictions. First, the size of the student population itself: ideally we would have liked to include in our investigation all the students of English who present the same profile as the ones we selected in Algiers, but for practical reasons this was not possible. Second, in trying to cover most of the strategies involved in the acquisition of English we were bound sometimes because of the amount of eliciting materials involved, not to deal in great depth with some areas of the language. Finally, because of the various problems which we shall mention in due time, it proved impossible, despite our strong desire to do so, to carry out any classroom observation.

### 3. Review of the Literature

Our review of the literature is primarily aimed at showing how relevant theories in Linguistics and Psychology have developed from Behaviourism, which has rejected the study of learners' cognitive processes on the ground that it was, by its very nature, 'mentalist' and therefore beyond its scope, to present-day cognitive views which have shaped research in learning strategies. Our discussion of the theoretical background will thus be carried out into two main sections each of which will be dealt with in a different chapter.

First, we shall discuss the inadequacies of behaviourist views in accounting for the language learning process in general (mostly the First Language), and see why they cannot encompass learning strategies in their analysis. These inadequacies will be highlighted by our discussion, although very brief, of the criticisms formulated against them by the transformational-generative school and its followers. We shall also mention some of the related issues, such as the role of Input, Maturation, and so on, which have been raised by the generative (and post-generative) views.

We shall then look at how these views have determined the approach towards the various issues involved in foreign language acquisition which researchers have dealt with, paying particular attention in the process, to the role of the learners' mother tongue and to the psychological and affective factors which come into play in the acquisition process. All these arguments will help us establish and discuss the two foreign language acquisition models which we think are most relevant to our study, the Input Hypothesis (formerly known as the Monitor Model), developed by Krashen (1977a, 1977b) and the Strategy Model, developed by Bialystok (1978).



In the second section, the most important one in our review of the literature because it deals mainly with the learners' learning strategies, we shall look at the origins of the investigation in learning strategies as well as discuss all recent works which have been carried out in this field. Research on learners strategies is closely linked to the development of cognitive science which after decades of neglect re-emerged in the 1950s as a valid field of study.

The impetus behind this renewed interest towards a cognitive analysis of human behaviour was the result of several theoretical concerns which we shall review very briefly: Linguistics, Anthropology, Information Processing Theory, and Computer Science. One main purpose of cognitive psychologists is to understand how human thinking operates, and to discover the cognitive processes and strategies involved. We shall mainly concentrate our discussion of cognitive psychology on its views about the role of strategies in the learning process in general, and how researchers in foreign language acquisition have used both its conceptual framework and its eliciting methods in order to probe into the learners' learning processes and strategies.

We shall first look at the research work which has concentrated on the learning strategies used in connection with the acquisition process in general and which was originally mainly concerned with the strategies which successful learners use - by 'successful' learners, it is meant better results in achievement tests. Research efforts have concentrated on identifying the strategies 'good' language learners used (Rubin 1975, Stern 1975, Naiman et al. 1978). The aim of these studies was (i) to identify the strategies, and (ii) to provide a classification framework in which the strategies they found could fit. The main problem with these studies however, is that they have concentrated solely on the learning behaviours of 'successful' students. This has led them to put together strategies which should have been kept separate. For instance, they put together strategies which reflect learners' psychological characteristics (such as risk-taking, tolerance for ambiguity, and so on), with learners' communication strategies (use of gestures, circumlocutions, and so on), learners' social strategies (seeking opportunities to use the foreign language, empathy) and learners' cognitive strategies (monitoring, inferencing, and so on).

Bialystok (1978) was among the first researchers to put forward a model of second language acquisition which attempts to account for the discrepancies both in individual achievement and achievement in different aspects of foreign language acquisition, thus accounting for both learning and communication strategies within a comprehensive model of foreign language acquisition.



These findings were incorporated by Rubin (1981) in her study which she has been conducting since 1975 and in which she has attempted to identify the major cognitive processes used by adult learners of a foreign language. Her findings led her to establish a fundamental distinction between 'Cognitive processes' which she defines as "the general category of actions which contribute directly to the learning process" (Rubin 1981:118), and 'Cognitive strategies' which she defines as "the specific actions which contribute directly to the learning process" (ibid). In other words, cognitive strategies represent the actual execution of cognitive processes in specific situations.

Based on this fundamental distinction other researchers (Wenden 1983a, O'Malley et al. 1983) have proposed to refine the classification of learning strategies suggested by Rubin on the basis of the findings which various researchers, particularly in cognitive psychology, had carried out (Brown and Palincsar 1982, O'Malley et al. 1983) and who have come to recognise two major types of learning strategies: (i) Metacognitive strategies, and (ii) Cognitive strategies. Starting from the generally accepted definition of cognition as being those processes and strategies through which an individual obtains knowledge or conceptual understanding, O'Malley et al. (1983) characterise cognitive strategies as being

often specific to distinct learning activities and would include using operations or steps in learning or problem solving that require direct analysis, transformation or synthesis of learning materials.

(O'Malley et al. 1983:24)

As for metacognitive knowledge which is a new concept borrowed from cognitive psychology and introduced in the study of learning strategies in foreign language acquisition, it has been variably described as "knowledge about cognition, or the learner's naive psychology of learning", (Wenden 1987:574), or, as Brown and Palincsar point out, it is a knowledge that involve

Conscious access to one's cognitive operations and reflection about those of others; It is a form of declarative knowledge about the domain 'thinking'

(Brown and Palincsar 1982:1)

On the basis of these characteristics thus, metacognitive learning strategies are defined as those strategies which are

Generally applicable to a variety of learning tasks and include (a) knowledge about cognition, or applying thoughts about the cognitive operations of oneself and others, and (b) regulation of cognition or executive control or self-management through such processes as planning, monitoring, and evaluating.

(O'Malley et al. 1985:24)



or, as Rubin (1987) points out, "metacognitive strategies are used to oversee, regulate or self-direct language learning", (Rubin,1987:25).

Other researchers (Hosenfeld 1977, Cohen and Apeh 1981, Huang and Van Naerssen 1987) have extended this research to the investigation of the strategies used by foreign language learners for the acquisition of various language skills. Others (Hosenfeld 1978, Rubin 1987, Horwitz 1987) have stressed the importance of learners' beliefs about the language learning because, as Rubin (1987:25) points out, "this knowledge can form the basis for selecting and activating one strategy over another." Finally, in our detailed review of the literature most closely associated with learners' strategies we shall discuss the various eliciting research tools and methods which have been used.

We shall start our discussion with a review of the data-gathering methods which have been used by researchers in cognitive psychology in general, such as 'Observation' of the learner in the execution of the learning task, and 'Verbal Report Data', so-called because they rely primarily on the learner's account of his own learning process through the use of a Questionnaire or an Interview.

We shall concentrate in particular on the ways learning strategies have been investigated. We shall also pay particular attention to the eliciting methods which have been used in classroom research because they are most relevant to our research. Thus, we shall first discuss the advantages and shortcomings of classroom 'Observation' and then look at the types of 'Verbal Report Data' which can be used in a classroom situation for the investigation of learners' strategies. These instruments can be subdivided into three main categories:

- (i) Self-report in which the learners describe what they are doing and make statements about their learning behaviour.
- (ii) Self-Observation in which the learners report on their learning behaviour either while they are doing so (i.e introspectively) or after they have completed the learning task (i.e. retrospectively), and
- (iii) Self-Revelation in which learners are encouraged to 'think-aloud' while they are performing a particular language learning task.

We shall also discuss the fact that these investigation methods have not remained uncriticised. We shall see how many researchers (Nisbet and Bellows 1977, Nisbet and Wilson 1977, and others) have expressed doubts about the reliability of such methods. We shall also look at the mounting counter-evidence provided by other researchers (White 1980, Ericsson and Simon 1980) who showed that depending on the task subjects may be successful in consulting their memory of cognitive processes and describing them. We shall see why despite their shortcomings, Verbal Report Data



particularly if coupled with classroom Observation can prove highly reliable investigative tools.

#### 4. Objectives and Research Questions

Despite the similarities our study may have with the various works we shall review it nevertheless differs from these in many respects. First, in terms of the learners' learning environment: While almost all the studies we shall discuss have been carried out with learners for whom English was acquired as a second language, our study instead is primarily concerned with the acquisition of English as foreign language. Second, in terms of the number of learners involved in the study as well as their level of proficiency in the foreign language: We shall look simultaneously at the use of learning strategies by large groups of learners at either the intermediate or advanced stage of the learning process. Third, in terms of the analysis of the possible interaction of these strategies either with the acquisition of specific areas of the foreign language .

On the basis of these premises various objectives have been set out for our research. First, we shall try to look for evidence for the existence of learners' strategies and see to what extent these will fit in the classification framework we shall adopt. We must stress at this stage, that we are primarily interested in learners' conscious strategies, i.e. strategies to which they can have access through introspection/retrospection, and not in their unconscious processes and strategies whose investigation is well beyond the scope of the present study.

Our second objective is to look for evidence which will show that there may be some association between some learning strategies and the acquisition of specific areas of the foreign language. Third, we shall look at the possibility that the use of learning strategies may be affected by the learners' proficiency in the foreign language.

To each of these objectives will correspond a specific research question. The elaboration of these questions was prompted by our own teaching experience during which our interest in learners' use of strategies during the acquisition process steadily grew, and on the other hand, by the works and findings of various researchers in foreign language acquisition studies who provided a large body of evidence about the use of these strategies among all learners. Our research questions therefore, are to be seen as an attempt to bring further contribution to the study of learning strategies in foreign language acquisition.

Our concern in developing these research questions was manifold: First, we wanted to look for evidence of strategy use among our learners in order to determine the overall patterning of these strategies. Secondly, we were interested in investigating the



various ways in which these strategies occurred in relation to the acquisition of the various areas of the foreign language. Finally, given the fact that we were dealing with learners at various stages of the acquisition process and who, within each stage, had different proficiency levels in the FL, we wanted to know whether these characteristics affected their use of strategies.

Because of the nature of the research which will lead us to probe into learners' cognitive abilities, and more specifically into their cognitive strategies, we firmly place our work within the framework of cognitive psychology, i.e. we view the learner not merely as a recipient of knowledge, but as an active participant in the learning process.

Thus, our first Research Question is primarily geared towards providing background information about the overall patterning of learning strategies among our learners .

Our second Research Question stems from the findings of researchers in L1 acquisition studies who suggested a close association between some strategies and specific intellectual skills. For instance, Gagne (1965) suggests that some strategies are specifically designed to deal with 'attending' to information, while others are designed for 'encoding' it. Other researchers, Dansereau (1978), Anderson (1979), and Lunzer and Doran (1979), looked at the strategies which might be associated with 'Reading' .

These findings were extended to FL acquisition studies, but unfortunately very little work has been carried out in this particular area. The very few works which have been made, Hosenfeld (1977), Cohen and Apehek (1981), and Huang (1987) have all adopted a descriptive rather than a predictive stand (i.e. listing the strategies which occur with the acquisition of the various areas of the FL rather than predicting which strategies will occur with which area of the FL) .

Our last Research Question is the direct result of the composition of the student population we were investigating. Since we had a group of students from the First Year and another group from the Fourth Year, and that since within each group we had established two sub-groups according to their proficiency in the FL, we were therefore led to ask ourselves the question of whether these characteristics (i.e. the learners' stage in the acquisition process and their proficiency in the FL in any particular stage) could have an effect on the number of strategies they would have resort to, and if they did, whether the difference would turn out to be significant.



## 5. Methods

This section will be discussed under five main headings: The choice of informants, the eliciting instruments we intend to use, the administration procedure, and the procedure we followed for reporting our findings and exploiting the results.

### (i) Choice of Informants:

(a) Teachers: The teachers we selected for our investigation are all Algerian teachers of English in the English Department at the University of Algiers. Our Questionnaire was handed out to all 45 members of staff, irrespective of the subject they taught or the Year in which they taught.

(b) Students: We selected all First-Year students which we shall refer to as 'Intermediate' learners (N = 99), and all Fourth-Year students to whom we shall refer as 'Advanced' learners (N = 72). They are aged between 18 - 24, and are all assumed to have studied English in secondary school for at least six years. These students are reading English for the 'Licence' degree (BA in English Studies) which is a four-year course at the English Department.

### (ii) The Eliciting Instruments :

We originally planned to use, particularly for students, a combination of verbal report data and classroom observation. However, because of various administrative problems and other difficulties beyond our control which we shall discuss in due time, we had to rely in most of our investigation on verbal report data only (i.e. the Questionnaire and the Interview).

(a) The Teachers' Questionnaire: We included the Teachers' Questionnaire in our investigation because we strongly felt that the information it will provide would be of great help in complementing the information students would have given us on their teaching methods and practices, and in particular about whether they were made aware of the importance of learning strategies in the acquisition process. The following points will be covered:

- Their general background with a particular emphasis on their teaching experience and qualifications.
- Their teaching practices in their respective subjects.
- Their awareness of the role of various affective and psychological factors in the acquisition process, such as aptitude, motivation, and so on.

(b) **The Students' Questionnaire:** Because of its length, we divided it into two main parts we labelled Part One which was aimed at investigating their general background, and Part Two which was aimed at assessing their beliefs about the language learning process as well as their use of learning strategies in the various areas of the foreign language. Thus, in Part One we cover the following points:

- Their general educational and linguistic background.
- Their previous learning experience of English.
- Their previous encounter, if any, with learning strategies.
- Their reasons for choosing English, and
- Their self-evaluation at various skills.

In Part Two we concentrate mainly on the investigation of their beliefs about the following areas:

- Foreign language aptitude and motivation.
- The difficulty in learning a foreign language.
- The nature of the foreign language learning process, and finally,
- Their awareness and use of language learning strategies in acquiring the various aspects of the foreign language.

#### (c) **The Students' Interview**

The aim of the students' Interview was (i) to complement our findings about strategy use which we would have made in the Questionnaire, (ii) to help us refine the typology of the strategies which our Questionnaire would have suggested, and (iii) to bring further corroborative evidence to the conclusions on strategy use which we would be led to make on the basis of our findings in the Questionnaire.

The following points will be investigated: (The first six opening questions have no relevance to the research itself: they were meant to make the students feel at ease).

- The learning strategies used in the learning process in general.
- The learning strategies used for the acquisition of language skills (Speaking, Writing, Listening, and Reading), as well as various language items (such as Grammar, Vocabulary, and the Sound System) - In addition we shall include various open-ended



questions and language learning tasks which will be completely unstructured in order to allow us observe students' use of learning strategies while they are performing certain language learning tasks. This particular section, albeit brief, was meant to replace the classroom observation sessions which we could not hold.

(iii) Procedure:

Our discussion of the procedure will cover two main areas. First the administering procedure, i.e. the way our eliciting instruments were implemented, and second the exploitation procedure, i.e. the way we reported our findings and exploited the results.

a) Administering Procedure

Before we carried out our research proper in the period December- February 1989, we had previously tested our eliciting instruments with small samples of teachers and of the targeted student population in a pilot-test which we carried out in the period March to April 1988. This test had allowed us to greatly improve both the wording of the questions, particularly those meant for the students, and the administration of the Questionnaires themselves. Thus, for each teacher in the English Department we put a copy of the Questionnaire in an envelope which we asked him/her to return to us as soon as possible. Together with the Questionnaire itself, a cover letter was provided in which we thanked them for their cooperation and explained the purpose of the research stressing in particular, the complete anonymity of their answers. Most teachers were prompt in handing back their completed Questionnaire and in the following three weeks following our investigation we received nearly 60 per cent of all the copies we handed out. To our surprise and delight the overall rate of returned copies turned out to be exceptionally high ( 86 per cent).

The administering procedure we followed for the Students' Questionnaire was different for two main reasons. First, when both parts of the Questionnaire were put together it turned out to be very long, so administering it in one single session would have been counter-productive. Second, we could not run the risk to give them the Questionnaire to answer at home because we had no way of ensuring that they would return it to us in due time. So, we were led to adopt and refine a procedure which was successfully tried for our pilot-study. We gave each part of the Questionnaire on a different occasion. In order to be able to put, for each student, both corresponding parts together later on, we handed out beforehand a card bearing a random number which students were asked to write in a special box on the first page of the Questionnaire. They were also asked to retain this card until they were told to dispose of it.



During the second session they were asked to write the same number on the box provided. This procedure, in addition to being simple in allowing us to put together the two parts of the Questionnaire, had the added advantage of ensuring total anonymity to the respondents. This anonymity was further stressed in the cover letter which was provided with Part One of the Questionnaire, and which similarly to the one we established for the teachers, informed students about the nature of the research and stressed the anonymity of their answers, and thanked them for their cooperation. They were also asked to retain the card which has been handed to them since some of them would be asked to take part in a short Interview with the researcher.

For the Students' Interview we had to devise a completely different procedure because it proved practically impossible to interview all the students who answered the Questionnaire (nearly 200). Thus, with the help of teachers, we selected in each year a group of 'good' students and a group of 'less good' students which we considered as a representative sample of the whole student population for each year.

#### (b) Exploitation Procedure

The exploitation of our eliciting materials was carried out into two different steps. First, we had to devise various summary sheets for the Questionnaire and the Interview which were meant to help us transfer teachers' and students' responses for an immediate reading.

Second, we had to decide on which type of statistical tests to use. Thus, in order to display the important features of the data, particularly those in the Teachers' and Students' Questionnaire, we shall some use descriptive statistical test which will show the raw data in a systematic form, particularly in the form of tables. As for our discussion of the second research question, we shall have to use some inferential statistical tests in order to decide whether the observed differences are significant.

### 5. Presentation of the Study

Our study will be divided into five main chapters.

Chapter One gives a brief summary of the linguistic situation in Algeria and analyses the role of English in the educational system. It concentrates in particular on the role of English at University level and more specifically in the English Department at the University of Algiers. We shall describe the content of the course leading to the 'Licence' and mention the various problems encountered. This chapter was thought necessary because it will no doubt help the reader to grasp the rather difficult language situation in the country and the role English plays.

Chapter Two gives a general survey of relevant first and second (or foreign) language acquisition studies which have gradually led to today's cognitive theories. This chapter may seem lengthy at time, but it was thought necessary because it encompasses many of the concepts and issues which will be recurring in our discussion of learners' strategies.

Chapter Three looks at the origins of cognitive science and how cognitive psychologists were led to investigate the learning strategies used in the learning process in general. We shall show how these findings have been used for the investigation of learners' acquisition of a foreign language. We shall pay particular attention to most, if not all, the studies which have been carried out in this field and we shall use their findings to draw our definition of the term as well our classification framework for these strategies. We shall also discuss in details, the various eliciting methods which were initially used by cognitive psychologists and subsequently taken up by researchers in foreign language acquisition studies. This discussion will help us to select our own eliciting methods.

Chapter Four sets the Rationale for our research. We shall put forward our objectives and Research Questions and describe in detail the structure and content of the eliciting instruments we intend to use. We shall also give an account of the methodology we followed in order to select our subjects. Finally we shall give a detailed account of how we intend to report and exploit our findings.

Chapter Five will give a detailed account of all our results against which our discussion of the Research Questions will be carried out. In addition to summarising our findings, our Conclusion will suggest a series of recommendations for the incorporation of learners' strategies in future teaching materials and methods. We shall also suggest possible areas in which further research can be carried out.



## CHAPTER ONE

### The Language Situation in Algeria and the Role of English in the Educational System

Like many other developing countries, Algeria has a rather complex linguistic situation which is the result of various historical factors. It is not our intention, in this short introductory chapter, to give a detailed account of the problems encountered nor their causes, but to enable the reader to have a clear picture of the situation, we think it necessary to make a rapid general survey of past and present problems. This becomes even more important since there are very few studies, most of them in French, which the reader can refer to if he wants to familiarise himself with the problem.

#### 1.1. The Language Situation in the Past:

For more than a century Algeria was colonised by France. Its main purpose was twofold: first, the peopling of the country by settlers who came not only from France, but from other European countries as well (Italy, Spain, Portugal, Malta), and second, the expansion of "French civilisation values". The main tool for the realisation of this policy, apart from military repression, was the language: French became the only official administrative and educational language, in Algeria, in spite of the fact that the settlers represented less than 5 per cent of the total population. School instruction, at least for the very few who were allowed to attend, was carried out exclusively in French. At the same time, the French carried out a deliberate policy of destroying systematically all existing traditional, (usually religious) educational institutions. Thus, the expansion of the French language was made at the expense of the already existing languages:

##### *(a) Arabic:*

Before its colonisation, Algeria was a Muslim country in which the Arabs had entered as early as the 7th Century A.D., bringing with them their culture and their language which became those of the local population. At the time of its occupation, Algeria was part of the Turkish empire, itself a remnant of a once glorious Arab empire. The language spoken however, was a dialect of Arabic which differed greatly from its classical form.



*(b) Berber:*

Long before the Arabs entered the country, there have always been, in the whole of North Africa, (Morocco, Algeria, Tunisia and even Lybia) populations who spoke different varieties of a language known as 'Berber', a language of the Hamitic family. The distribution of the Berber populations within Algeria is uneven (Touaregs in the deep South, Mozabits in the South-East, Chawi in the mountainous East, and Kabyles, by far the largest ethnic group, in the North). The various forms of Berber spoken vary extensively from one group to another, and even more from one country to another.

Throughout the colonial era then, the language situation was characterised by the existence of an official language used at school, in the administration, and the media: French, a language which was spoken by very few natives and read by even fewer. Alongside, there was Arabic (the dialect form) spoken by the vast majority of the population, and Berber (in its various forms); both were tolerated by the colonial administration, but never used, let alone taught in schools. In fact, in their attempt to prevent any possible development of an Algerian cultural personality, the French colonial authorities went as far to outlaw the teaching of Classical Arabic in the 'Medersas' (1) not only because it was the language of a religion the French wanted to see disappear, but mainly because these 'Medersas' were the crucible for a re-emerging nationalist struggle. Despite all these attempts however, the teaching of Arabic, carried out mostly underground because it was outlawed, was kept alive throughout the colonial period.

Once independent, Algeria found itself confronted to a painful, probably still unresolved, dilemma: there was a strong and quite justified desire to reject everything associated with the former colonial power and in particular its language. An illustration of this is the fact that Arabic was immediately declared as the sole official language of the newly founded republic. However, there were crude realities that had to be taken into account. The seven-year war of independence had devastated the country, and the only available "elite" that could put back the country on the road of recovery, was French educated. Those were times of acute shortage of qualified people at all levels: teachers, doctors, technicians and so on. Thus, as far as the educational policy was concerned the outcome was a compromise, the consequences of which can still be felt today. It was decided that in a first stage, education would be carried out both in French and in Arabic, and then gradually get rid of French until the total 'Arabisation' of the whole educational system is achieved. Nearly thirty years after these decisions were taken, what is the situation today?

---

<sup>1</sup> Religious Schools.



## **1.2. The Language Situation Today:**

Despite the fact that the complex linguistic situation in Algeria offers a potential researcher very exciting areas of investigation, very few studies have nevertheless been carried out either in Algeria or abroad. The reason lies mainly in the fact that for a very long time, this subject was very sensitive because it carried with it political overtones which the various policy makers in power have always tried, in the name of national unity, or so it was thought, to put aside.

Thus, our description of the present language situation will rely not so much on any reference to formal studies, but on our personal knowledge of the situation. This situation can be broadly characterised as diglossic and/or bi- or tri-lingual

### **1.2.1. Diglossia:**

Diglossia, generally defined as the coexistence of two varieties of the same language, one being a dialect form (i.e. the Low form, henceforth L) and the other a classical form (i.e. the High form, henceforth H) is the main characteristic of the present linguistic situation in Algeria. This is the result of the justifiable frantic effort of Arabisation which was carried out in schools and official institutions just after independence. It was of course, the H form which was chosen since the L form was regarded, even by those who used it, as a "degenerate" form of Arabic, particularly since, due to borrowings over the years, it was loaded with many French words, some of which even took an Arabic pronunciation. Thus, the H form appeared at that time as the only alternative.

It became soon evident however, that this political decision encountered great difficulty when it came to its application, because it did not take into account the very high rate of illiteracy of that time, particularly among the adult population (85 per cent). Nor did policy makers and educationalists put forward any viable national literacy campaign which would enable the adult population to acquire the H form through formal schooling. The result today is that, apart from those who have been to school (the younger generation) most of the population uses the L form in its everyday activities, while in radio, television, and the press the only language used is the H form.

### **1.2.2. Bi-/ Tri-lingualism:**

Another complication in the Algerian linguistic situation is the existence, as already mentioned earlier, of some ethnic minorities for whom the mother-tongue is neither the H nor L form, but a variety of the Berber language. Depending on the geographical location (town or countryside) these minorities may (for the former) or

may not (for the latter) be familiar with Arabic, the L form that is. Furthermore, because of a selective approach to education, and in the pure spirit of all colonial powers' motto 'Divide et Umpere' which the French had carried out, these minorities were primarily targeted by the French for the expansion of Christianity and Western civilisational values. Thus, many among these minorities know no Arabic (neither H nor L), but are quite familiar with French (at least with the spoken form).

This situation can be summarised in the following table (Table 1.1 )

Languages Spoken			
Linguistic Group	ARABIC	BERBER	FRENCH
	H <sup>(1)</sup> L		
ARABS	(+) <sup>(2)</sup> +	-	(+)
BERBERS	(+) (+)	+	(+)

Table 1.1.: The Language Situation in Algeria

(1) If educated

(2) Brackets indicate that the presence is optional

### 1.3. The Educational System:

The situation that the country had to face just after independence was catastrophic: the rate of illiteracy, as already mentioned, was very high : millions of children had to be schooled and very few native teachers were available for primary schools, even fewer for secondary education, and practically none at university level. The very few schools there were, because planned by the settlers, were located mainly in towns, and yet the majority of the Algerian population was living in the countryside. Textbooks too, were non-existent since most bookshops and libraries were deliberately burnt by the departing settlers. Such was the situation inherited in 1962. It is no surprise therefore, that the Government of that time gave top-priority to Education. Hundred of schools mushroomed throughout the country, particularly in the remote areas. Teachers were recruited, under various co-operation schemes, from many Arab countries (Egypt, Lebanon, Syria, Irak ) and were given very generous working conditions (free accommodation, high pay, travel expenses paid for, and so on).



Despite all these efforts however, the shortage of teachers was still very acute: thus, to keep the newly open schools running the educational authorities decided to recruit all natives who had some education, often elementary, to teach in primary schools. This decision, coupled with the fact that the teachers who came from Arab countries had different educational background, different teaching methods and different degrees of commitment to their jobs, had catastrophic effects on the educational level of pupils, effects which can still be felt today.

Looking at it retrospectively from the point of view of teaching staff, one would have wished to see stricter control and screening of the applicants who, more often than not, were more concerned with the financial aspect of the operation than its educational impact. So what is the situation today?

### **1.3.1. Primary and Secondary Education:**

Primary education is open to all children from 6+ to 15 without any distinction, and the teaching is carried out exclusively in Arabic. French is introduced in the third year, but as a Foreign Language, not as a medium to teach any school subject.

Successful pupils then go to secondary education which is also completely arabised, in view of preparing their 'Baccalaureate' which will give them access to University. Until six years ago, there used to be both a Bilingual (Arabic + French) and Arabised sections in secondary education, but political pressure gradually led to the disappearance of the latter. The same pressure now applies to the elimination of French from higher education.

In the lack of official figures it is very difficult to assess the percentage of drop-outs, but similarly to primary education, one suspects on the basis of the results of the Baccalaureate, that it must be relatively high. There are however, numerous opportunities open to many among those who fail their Baccalaureate: they can choose among the various Institutes of Technology and Vocational Training Centres.

### **1.3.2. English in the Educational System:**

We shall look very briefly at the place English occupies both in secondary and higher education .

#### **1.3.2.1. In Secondary Education:**

Although there are many foreign languages available in secondary education (English, German, Spanish, Italian and Russian), English is, by far, the most popular



one. There are no official statistics to illustrate this importance, but judging by the number of pupils who usually choose English as a foreign language in the Baccalaureate exam, we can say that it is chosen by nearly 90 per cent of the candidates.

Pupils usually start studying English in the second year of secondary education, at the age of 13 or 14. The textbooks used are produced locally by a team of Algerian teachers. These books destined for the first five years of secondary education are entitled Spring I and Spring II. The approach used is functional-communicative, with a particular emphasis on communication.

In the last three years of secondary education, pupils who follow a scientific or technical option use a specially-designed ESP textbook, and those who chose a literary option will use another textbook also locally designed. In all these cases, the approach used is functional-communicative.

#### **1.3.2.2. In Higher Education:**

The teaching of English in Higher Education has taken an increasingly important role, particularly in the scientific and technological subjects, often at the expense of French and other foreign languages (Spanish, German, and Russian). The present situation at the University level can be summed up as follows:

1) The English Department: all the curriculum subjects are taught exclusively in English. (See below for a detailed discussion.)

2) Other Departments: all University Departments (Medicine, Law, Economics, Polytechnics and so on ) have a compulsory English language component which all students must attend: in theory, no student can be awarded his/her final degree if he/she has not successfully completed an English language course. This component, usually in the form of an ESP course, was originally designed to help students who were undertaking either postgraduate studies or personal research work to understand articles published in various specialised reviews and magazines. This course, however, has met with very little success mainly because of a total lack of adequate teaching materials and specialised staff. Very often this a course was in the hands of teachers who had never taught an ESP before, and thus chose to teach materials originally designed for general language learners. This has led to a gradual decline of this component from the students' curriculum. But at present, the Ministry of Higher Education is trying to revive this language course, and has set up special teams for this purpose .

3) Specialised Institutes: there are nowadays in Algeria, many Higher Education Institutes which have been set up under various co-operation schemes (the



US, Canada) and in which all subjects are taught exclusively in English. The National Institute for Electricity and Electronics (I N E L E C), for instance, trains technicians and engineers in electricity and electronics, and was originally set up with the help of the US, carries all its teaching in English. Similarly, the National Institute for Management and Planification (I N G P), set up with the help of Canada, trains graduates in management and planification exclusively in English. The success of these two institutions has led the Ministry for Higher Education to recommend to the Government the development of this kind of Institutes.

Thus the place of foreign languages, and of English, in particular, in the Algerian educational system can be summed up as follows (table 1.2)

Years	1 2 3 4 5 6 7
Level	
PRIMARY	ARABISED + FRENCH (1)
SECONDARY	ARABISED + FRENCH + ENGLISH (2) (or more rarely another FL )
UNIVERSITY	ENGLISH or SUBJECT + ENGLISH (ESP) or SUBJECT IN ENGLISH

Table 1. 2. The role of English and other foreign languages in the Algerian educational system

(1) starts during the third year as a foreign language

(2) starts during the second year as a second foreign language.

### 1.3.3. The English Department:

Until 1971, success in the 'Baccalaureate' was the only requirement for students willing to register for a 'Licence' (BA) in English. Two main problems emerged however. First, as a result of the intensive Arabisation programme we

mentioned above, most of the Departments in the Faculty of Arts and Social Sciences, to which the English Department belongs, came to be gradually arabised. Thus, subjects like History, Geography, Sociology and Psychology were no longer taught in French but exclusively in Arabic, and for pupils coming from a bilingual secondary school in which most subjects were studied in French this had a deterring effect. The immediate result was a huge increase in the number of students who registered to study foreign languages, mainly French and English, most of them doing so because they had no other alternative. The effect on working conditions, for both teachers and students, was immediate: overcrowded classes, staff shortage, lack of books, and so on. Second, it was soon discovered that success in the Baccalaureate did by no means entail an automatic ability to undertake studies in English. Furthermore, many among those registered in the English Department did so because, as we mentioned earlier, they had no other alternative. Drastic decisions had to be taken, and they soon were.

It was decided that from the academic year 1971-1972, students who held the Baccalaureate and wished to register for a 'Licence d'Anglais', had to provide, in addition, proof of the grade they were awarded in English in the Baccalaureate exam. The minimum grade required was 12 (out of a maximum mark of 20). But even with such a requirement the number of students registering with the English Department each year, remained relatively high (approximately 250 - 300), higher in any case than the Department would have wished for (100- 150). An attempt was made in 1986 to introduce, in addition to the already existing requirements, an entry test. But this experiment had to be abandoned because of the opposition of the Ministry of Higher Education which considered this new requirement as too "elitist". In fact, since 1988, the Ministry has compelled the Department to drop its requirement of a proof of the grade obtained in the Baccalaureate. Today, success at the latter is the only requirement asked from students. No need then, mentioning the problems encountered. As an illustration, one can mention the fact that for this academic year (1989 - 1990), the English Department which was expecting to register not more than 150 students, had to accommodate more than 400 students.

### 1.3.3.1. Organisation of Studies:

The Department offers a four-year undergraduate course leading to the 'Licence d'Anglais' (BA). At the end of the course, students are expected to teach in secondary schools and other institutions. The relatively high standard for entry is justified by the fact that during the four years all the teaching is carried out exclusively in English.



Studies are organised according to a modular programming: each subject (see Table 1.3 below) is divided into a certain number of modules which are taught progressively during the four years. The subjects include all the components of a language course: literature, civilisation, linguistics, and so on. The average weekly timetable varies between 14 hours in the first year to 18-20 hours in the third year. We shall consider the fourth year separately.

The table below gives a summary of the weekly time-table for the first three years (Table 1.3).

This was the typical time-table for the first three years in the English Department until 1987 when a fourth year was introduced. The idea behind the introduction of this additional year was that the programme of studies as it stood, did not provide students with enough training for their future job (i.e. Teaching), and thus the fourth year was to be exclusively concerned with teacher-training

Year Subjects		First Year	Second Year	Third Year
	Linguistics	2 hrs	2 hrs	2 hrs
	Phonetics	2 hrs	2 hrs	-
	Grammar	2 hrs	2 hrs	-
Literature and Civilisation	British	-	2 hrs	2 hrs
	American	-	2 hrs	2 hrs
	African	-	-	2 hrs
Oral English		6 hrs	4 hrs	-
Written English		4 hrs	4 hrs	2 hrs

Table 1.3. Weekly time-table in the first 3 Years of the 'Licence d'Anglais'

In reality however, the content of studies for this additional year turned out to be a compromise between literary subjects and applied linguistics because many teachers wanted to see it also as a preparatory year for postgraduate research which the Department provides.

The table below (Table 1.4.) will give the reader an idea of the weekly time-table .

Seminar in Literature (either British, American, or African)	2 hours
Seminar in Civilisation (either British or American)	2 hours
Seminar in Linguistics (General and Applied)	2 hours
Seminar in Pedagogy (micro Teaching)	2 hours

Table 1.4. Weekly time-table in the fourth year .

### 1.3.3.2. Staff:

Out of 15 teachers in 1965, only three were Algerian. The others were foreigners teaching in Algeria under various technical and cultural cooperation schemes (French, British , Americans). Today, thanks to the huge efforts made by the Algerian government in the field of education at all levels, particularly in Higher Education (leave facilities, scholarships, and so on ), all the staff of the English Department (nearly 45 teachers) are Algerian, and most of them have carried their postgraduate research either in British or American Universities. Depending on seniority, the average teaching time is between 8 and 12 hours a week.

### 1.3.3.3. Students:

As a result of the various problems we mentioned above (see 1.3.3.), the number of students has increased very sharply over recent years. From 60 students in 1970 the number has rocketed to 500 in 1980. It presently stands at approximately 1200. Most, if not all, these students are expected to teach at the end of their studies. A small minority however, will join various administrative jobs in ministries and private (international) firms to work as translators or public relations officers. There are



unfortunately, no official statistics which would allow us to have a clear picture of the actual distribution of students according to these various occupations.

#### **1.3.3.4. Facilities:**

In all secondary schools textbooks, which are given free to pupils, are always available in sufficient numbers. Some schools have a language laboratory, others have some recording facilities but the vast majority are left without any of these teaching aids.

The situation at university level is more complex. Even if the English Department has three language laboratories, it seldom make use of all of them at the same time because of a problem of maintenance due to a serious shortage of spare parts. As far as books and textbooks are concerned the situation is more worrying because the Department finds it very difficult to answer the needs of both students and teachers due to the financial difficulties the University is meeting in buying these books from abroad. Furthermore, the relatively high number of students in every year makes it very difficult to have these materials available in sufficient numbers.

## CHAPTER TWO

### Language Learning Theories

#### 2.1. First Language Learning Theories

It is important to mention at this early stage that it is well beyond the scope of the present study to look at all the available theories in first language acquisition since these can be traced back very far in time; Instead, we shall concentrate on the theories which have influenced, in one way or another, the study of FL acquisition. Furthermore, we have decided to take as a starting point in our discussion the early mid-twentieth century since, as it is commonly agreed, this corresponds to the birth of 'modern' Linguistics.

Our approach will be two-fold. First, we shall look at the psychological issues connected with first language acquisition, and then discuss in details the linguistic issues of the times.

##### 2.1.1. Psychological Approaches

###### 2.1.1.1. Behaviourist Approaches

Behaviourism, which was the dominant school in the early 20th century, aimed at explaining all forms of human (and animal) behaviour in terms of Stimulus and Response: every human activity (including language) was the response to some stimulus. Learning therefore, was achieved by building up 'habits' on the basis of stimulus-response chains which could be strengthened through reinforcement either positive (in the form of a reward) or negative (in the form of disagreement/punishment). Hence its label a S-R Theory.

Behaviourists firmly believed that they only had to study what they could see and record in behaviour, rejecting thereby any consideration of imperceptible 'mental events'. This view of learning known as mechanistic, therefore denied the dichotomy between mind and body.

The early Behaviourists known as 'materialists', like J.B.Watson, carried this view to its extreme: Psychology was regarded as indistinguishable from physiology; Watson (1924:11) points out that; "(Psychology) is different from physiology only in the groupings of its problems, not in fundamentals or in central viewpoint."



Most Behaviourists after Watson found his materialism too extreme. They have formulated positions that generally do not deny the existence of mind but none advocates its study: they all take the view that mind exists but only as a reflection of body processes with the mind in no way influencing events in the body.

As far as language was concerned, behaviourists saw linguistic utterances as part of human activity, thus a form of behaviour, i.e. verbal behaviour.

The early behaviourist theory, known as Reinforcement Theory, concentrated on the links between utterances and situations, rather than on the internal structure of utterances: effective language behaviour consists of producing responses to correct stimuli. The link between stimuli and responses becomes habitual as a result of being reinforced. The emphasis therefore, is on links between observable events; Language capacity is composed of a number of discrete units of behaviour independently trained rather than an integrated system.

According to this view, both the production of an utterance and the comprehension of it can be explained in terms of stimulus-response and reinforcement: one learns to produce an utterance by producing it in the appropriate circumstances and then being rewarded for doing so. One learns to comprehend an utterance by reacting to it appropriately and being rewarded for doing so.

Essentially, the reinforcement model identifies language learning with learning to produce responses in the appropriate circumstances; it is not concerned with how the responses themselves are formulated or how they come to be produced in the first place so that they can then be linked by selective reinforcement to the right circumstances. The explanation given as to how responses are produced is in terms of simple imitation of adult models.

This view was shaped into a more workable theoretical construct by B.F. SKINNER (1953, 1957), who provided a model for the study of linguistic behaviour which has been largely used in linguistics.

Skinner is commonly known for his experiments with animals which led him to the belief that:

... the basic processes and relations which give verbal behaviour its special characteristics are now fairly well understood. Much of the experimental work responsible for this advance has been carried out on other species, but the results have proved to be surprisingly free of species restrictions. Recent work has shown that the methods can be extended to human behaviour without serious modifications.

(Skinner, 1957 : 3)

His general theory of learning, known as learning by 'Operant Conditioning' was thus, also applied to verbal behaviour. In such a framework, a human being (i.e. a child) would, through conditioning, emit a response or 'operant' (i.e. an utterance or sentence) without necessarily observable stimuli; that operant will be maintained (i.e. learned) by reinforcement, for example, a positive verbal or non-verbal response from another person; and like other behaviour, verbal behaviour according to Skinner, is controlled by its' consequences': when consequences are rewarding, behaviour is maintained and is increased in strength, and when consequences are punishing or lack reinforcement, the behaviour is weakened and eventually disappears.

Thus, for Skinner, the role of the environment is vital in providing both stimuli for imitation and also reinforcement, either positive or negative for responses.

It must be pointed out however, that his views differ slightly from the Reinforcement Theory proponents in two respects: first, he does not totally accept the argument that punishment (i.e. negative reinforcement) of wrong responses is particularly effective, or that reward (i.e. positive) reinforcement is the only form of reinforcement for correct responses. Secondly, with his work with animals, Skinner has developed a procedure called 'shaping': only the responses which approximate the desired ones are reinforced. By a series of such successive approximations to the desired action, the trainer gradually shapes the behaviour of the animal. Skinner uses this concept to explain improvement in the verbal behaviour of the child under the pressure of the environment (i.e. his parents).

It must be pointed out, however, that neither Watson nor Skinner talk about 'knowledge' and 'mind', but 'actions' and 'controlling stimuli'. They see language development as a process of environmental shaping.

Both Skinner's and Watson's materialism came to be criticised by some theorists, usually referred to as neo-behaviourists, Osgood (1953, 1957), who tried to remedy the deficiencies of a pure behaviourist theory.

The first of these deficiencies is the S-R theories' claim that activity is governed by stimuli in the immediate environment; this may be true of other habits, but when it comes to language one of its most striking aspect is that it is conducive to our behaviour being influenced by events which are distant in space and time. Secondly, one of behaviourism's strongest tenets that all behaviour is based on habits which are formed through experience, is challenged by the fact that one can give a novel and appropriate response in unfamiliar situations: we are all able to produce and comprehend sentences we have never met before. Thirdly studies of the nervous system (Lashley, 1951) have shown that behaviourist' assumptions that complex activities (eg



talking, playing the guitar) which involve a series of actions in temporal sequence are simply strings of S-R connections, does not hold true. One must assume that there is some sort of central organisation if one wants to account for this kind of skilled performance.

This is precisely what mediation theory set up to answer. The concept of mediation developed out of 'Contiguity Theory', which was, originally developed by Pavlov, and which holds that responses which occur naturally to one stimulus can come to be elicited by another previous neutral stimulus. While reinforcement theory rests on the principle that if a response occurs in appropriate circumstances it can be encouraged to recur by reinforcement, contiguity theory on the other hand, rests on the principle that a response can be attached to a new stimulus frequently in conjunction with the stimulus which already elicits the response. The classic example of this kind of learning is Pavlov's experiment with dogs in which he produced in the dogs the habit of salivating in response to the sound of a bell

In this theory, internal stimuli and responses mediate between observable stimuli and responses. The character of the mediating entities is such that they are part of the body, although no mental mediators are permitted. It differs markedly however, from the pure S-R theories, according to which no hypothetical mediating stimuli and responses are posited.

Thus, mediation theory accounted for the way we learn the meaning of words in terms of contiguity learning: the linguistic S (a word or a sentence) elicits a 'mediating' R that is self-stimulating. Charles Osgood (1953, 1957) called this self-stimulation a "representational mediation process", a process that is really covert and invisible, acting within the learner.

It will be noticed that mediation theory attempts to account for abstraction without admitting that there is any such thing. Mediation theories however, leave many questions unanswered. For example, the abstract nature of language and the integral relationship between meaning and utterance are unresolved.

Another attempt to account for first language acquisition framework was made by Jenkins and Palermo (1974) who attempted to synthesise the findings of generative linguistics and mediational approaches to child language, placing particular emphasis on the environment in shaping and controlling the child's learning. However, this theory too, fails to account for the abstract nature of language, nor does it account, as Mc Neil (1968) pointed out, for the creativity evident even in a young child's ability to comprehend and produce novel utterances.

The challenge to behaviourist psychology came from researchers who contended that what the child acquires in the course of language development is not a collection of S-R connections, but a complex internal rule system of some sort. This challenge is embodied in Chomsky's transformational-generative grammar.

### 2.1.1.2. T.G Approaches

It was Chomsky in his now famous review of Skinner's 'Verbal Behaviour' (1959) who convincingly pointed out the inadequacies of behaviourist theories in explaining language acquisition. His views gave birth to what has come to be known as the 'Generative School', which we shall briefly discuss under two main headings

- (i) The Nativist Approach
- (ii) The Cognitive Approach

#### 2.1.1.2.1. The Nativist Approach:

Chomsky's main contention is that the S-R theory cannot adequately account for a certain number of fundamental problems:

- (i) the capacity of human beings to acquire language in such a relatively short time,
- (ii) language development itself,
- (iii) the abstract nature of language, and
- (iv) the fact that we can produce and understand sentences never uttered or heard before.

He suggested (1959) that his theory could adequately provide answers to these problems. In opposition to the 'materialism' of behaviourists, Chomsky and his followers have claimed that language provides evidence for 'mentalism', i.e. for a belief in the existence of mind. Furthermore, they emphasise the fact that the acquisition and use of language cannot be explained without making an appeal to principles which are beyond the scope of any purely physiological account of human beings as put forward by behaviourist theories.

Hence the term 'nativist' which is derived from Chomsky's fundamental assertion that language acquisition is innately determined, that we are born with a built-in device of some kind that predisposes us to language acquisition. These innate



properties, according to Chomsky are embodied in a language acquisition device (LAD).

Innateness hypothesis gained support from several sides. Eric Lenneberg (1967) proposed that language is a "species-specific" behaviour and other language mechanisms are biologically determined. Mc Neil (1966) describes LAD as consisting of four linguistic properties:

(i) the ability to distinguish speech-sounds from the other sounds in the environment,

(ii) the ability to organise linguistic events into various classes which can later be redefined.

(iii) knowledge that only a certain kind of linguistic system is possible and that other kinds are not

(iv) the ability to engage in constant evaluation of the developing linguistic system out of the data that are encountered.

He later suggested (1968:412) that; "...because S-R theory is so limited the problem of language acquisition simply falls beyond its domain".

Chomsky argues that since children must be equipped to learn any language as a native language, the prior knowledge embodied in LAD must constitute that which is common to all languages, that is to say, LAD must contain language 'Universals'.

Chomsky's model, or generative model as it is commonly known, enabled researchers of the 1960s to make some giant steps towards understanding the process of first language acquisition. It convincingly showed that the linguistic development of the child was not a process of developing fewer and fewer 'erroneous' structures as behaviourists maintained. Rather, the child's language at any stage of its development is 'systematic': the child is constantly forming hypotheses on the basis of the input he receives and then testing those hypotheses on his own speech. As the child's language develops those hypotheses are continuously revised, reformulated or sometimes abandoned.

Despite this positive impact however, the generative model came under criticism from various quarters. For example, LAD came to be strongly criticised on the ground that there was very little evidence to support the idea that the child had innate knowledge of language. The innateness hypothesis itself was questioned. Many researchers wondered whether the child could not learn the basic categories of which

language makes use, from his experience of the world during infancy. Psychologists came to challenge Chomsky's assumption that the child's linguistic capacity is governed by a specific linguistic inheritance. Instead, they suggest that much of the child's early ability for language could be ascribed to his general cognitive development. Furthermore, researchers pointed out the fact that linguistic rules written as mathematical equations could not account for the very deepest level of language, that level where memory, thought, perception and emotion are all interindependently organised in the superstructure of the mind.

Thus, despite the fact that the nativist approach enabled researchers to make some considerable progress towards understanding the process of first language acquisition, it nevertheless left many questions unanswered. This is why the late 1960s and early 1970s witnessed a shift in patterns of research not away from the generative model but towards an approach which goes deeper into the essence of language. The new approach makes much weaker claims about the innateness hypothesis for example, and contends that while some specifically linguistic information is transmitted genetically, the process of child's first language acquisition is also dependent on several other factors. Researchers came to see language as one aspect of the cognitive processes that are part of the child's general equipment by which he learns.

This approach whose aim was to account for the forms and functions of child's speech in its early stages, was directly influenced by Piaget's theory of cognitive development.

#### **2.1.1.2.2. The Cognitive Approach: Piaget's Work**

Before discussing this particular approach, we must point out that it is well beyond the scope of the present study to carry out a detailed discussion of Piaget's complex theory of cognitive development of children since it encompasses the whole intellectual development of children from birth to the age of 14-15, language being but one aspect, albeit very important, of this development. The main reason for incorporating Piaget's work in our discussion of first language acquisition theories is the impact it had on subsequent investigations in 2nd language acquisition studies, and 2nd language teaching. Thus, we shall first look, very briefly, at the main theoretical arguments and then, see how language acquisition is explained in this particular theory.

Piaget's description of intellectual development is concerned with the formulation and description of coherent and meaningful stages which reflect the direction and course of mental development. Intelligence, in Piaget's model, is a process of 'adaptation' and 'organisation'.



Organisation involves a concept called the 'Schema'. Piaget (1960) defines 'schemata' as 'essentially repeatable psychological units of intelligent actions'. For example, a child is born with a few highly organised reflexes such as sucking, grasping, reaching etc. Rather than discussing individual occurrences of any one of these reflexes, Piaget chose to talk about the general potential to do such things as 'suck', 'reach', or 'grasp'. Thus the potential to act in a certain way was labelled 'schema': For example, the grasping schema refers to the general ability to grasp things. The 'schema' therefore, is more than a single manifestation of the grasping reflex. The grasping schema can be thought of as the cognitive structure that makes all acts of grasping possible. A schema, thus, can be thought of as an element in the human being's cognitive structure, and the schemata available to a human being will determine how he/she can respond to the physical environment.

Schemas (or schematas as some researchers call them) can manifest themselves in overt behaviour, as in the case of the grasping reflex, or they can manifest themselves covertly; covert manifestations of schematas can be equated roughly with 'thinking'. The way a child is able to deal with its environment changes as he/she grows older. In order for new human being-environment interactions to occur, the schemata available to the child must change. The circumstances under which the schemata change are referred to as 'adaptation'.

Adaptation in Piaget's theory, is seen as an equilibrium in the interaction of a human being and his/her environment. It involves the processes of 'Assimilation' and 'Accommodation'.

As we already mentioned, the number of schemata available to an individual at any given time, constitutes his/her cognitive structure. How an individual interacts with his/her environment will depend on the kind of cognitive structures he/she has available. The process of responding to the environment in accordance with one's cognitive structures is what Piaget called 'Assimilation'. Assimilation thus, refers to a kind of matching between the cognitive structures and the physical environment. But according to Piaget, there would be no intellectual growth if assimilation were the only cognitive process: an individual would simply go on assimilating his/her experience into his/her existing cognitive structures. This is why Piaget suggests the existence of a second, equally important, process which provides a mechanism for intellectual growth, he called 'Accommodation'.

Accommodation, therefore is the change in the intellectual structures (i.e. Schemata) which is necessary in order for the person to adjust to demands which the external environment makes on the individual. Thus, events for which the individual

has corresponding cognitive structures are readily assimilated, but events for which the person has no cognitive structures would necessitate accommodation.

The question that arises is what is the driving force behind intellectual growth? Piaget's answer is in his concept of 'equilibrium': he assumed that all individuals have an innate tendency to create a harmonious relationship between themselves and their environment. Thus, equilibrium is the innate tendency to organise one's experience so as to assure maximal adaptation, while assimilation permits the individual to respond to a present situation in accordance with previous knowledge. Because the unique aspects of the situation cannot be responded to, on the basis of previous knowledge, these novel or unique aspects of an experience cause a slight cognitive disbalance, or 'disequilibrium' in Piaget's terms. Since according to Piaget, there is an innate need for equilibrium, the person's mental structures change in order to incorporate these unique aspects of the experience, thus causing the sought-after cognitive balance. Gradually through this adaptative process information that could not at one time be assimilated eventually can be.

It is therefore, the dual mechanisms of assimilation and adaptation along with the driving force of equilibration that provides for slow but constant intellectual growth.

Piaget then, describes (1960) intellectual development as evolving through various stages of the ontogenic development of the child. He describes four (04) major stages:

- (i) The period of sensori-motor intelligence (0-2 year): During this period behaviour is primarily motor. The child does not yet "think" conceptually.
- (ii) The period of pre-operational thought (2-7 years): This period is characterised by the development of language and rudimentary concept formation.
- (iii) The period of concrete operations: (7-11 years): During these years the child develops the ability to apply logical thought to concrete problems.
- (iv) The period of formal operations (11-15 years): During this period the child's cognitive structures reach their greatest level of development, and the child becomes able to apply logic to all classes of problems.

Development is thought to flow along in a cumulative manner each new step in development becoming integrated with previous steps. However, these stages are only typical behaviours of a given age, period, or stage. Piaget writes (1952:329):

In a general way, the fact should be emphasised that the behaviour patterns characteristic of the different stages do not succeed



each other in a linear way (those of a given stage disappearing at the time when those of the following one take form) but in the manner of the layers of a pyramid (upright, or upside down), the new behaviour patterns simply being added to the old ones to complete, correct, or combine with them.

Piaget, then, goes into a very detailed description of the stages of intellectual development from birth to the age of 16-17. Since this aspect of his work is well beyond the scope of our study. We shall limit ourselves here to discussing how language acquisition is explained and what role it plays in the cognitive development of the child.

Development thus, is the result of the child's interaction with his environment through assimilation-accommodation and equilibration. Language learning in this view then, depends upon such interaction. The environment in which the child acts includes speech and his/her interactions must include the speech that is heard in relation to what the child does and the objects and events he/she sees.

According to Piaget then, the crucial stage for language acquisition is the transition from the sensori-motor stage to the preoperational stage: Around 2 years of age, the child begins to use words in place of objects. A word comes to represent an object. Initially the child uses 'one-word' sentences but his language facility expands quickly. By the age of 4-5 he has mastered the use of language. The rapid development of language, according to Piaget, is instrumental in facilitating the very rapid conceptual development that takes place during this period. Thus, in Piaget's terms, the child is always construing the novel in terms of the familiar: if an unfamiliar utterance occurs he will not fail to respond to it entirely, but he will try to make sense of it in terms of patterns which are already familiar to him. This will happen at all levels of language, the lexical, the phonological, the syntactic and the semantic.

Piaget then, suggests that there are essentially two different classifications of the preoperational child's speech: (i) 'egocentric' speech, characterised by a lack of real communication. Piaget does not use the term in the sense of selfish or self-serving, but to show that the child is centered about himself and fails to take into account the others' point of view; and (ii) 'socialised' speech, characterised by communication. By the age of 6 or 7 years, language has become intercommunicative. Thus the development of language during the preoperational stage is seen by Piaget as a gradual transition from egocentric speech to socialised intercommunicative speech.

Having described, very briefly, Piaget's views on child's language development we shall now turn to discussing his views on the relationship between language and thought.

Piaget suggests (Piaget and Inhelder, 1969) that the development of language is based on the prior development of sensori-motor operations. Thus, it is the development of sensori-motor operations that are necessary for language development and not the other way around. When language develops there is a parallel development of conceptual abilities that language helps to facilitate: rather than the language being the determining influence on what and how the child learns, what the child learns about language is determined by what the child already knows of the world.

Piaget's discussion of language and its relation with thought is especially useful in helping to resolve the conflict between the two traditional views of the child: on the one hand, the behaviourist" view that the newborn child is an amorphous lump waiting to be manipulated by his environment, and on the other hand, the nativists' view of him as carrying within himself a full blueprint for his future development.

Clearly, Piaget is not an S-R theorist. As we have seen, S-R theorists attempt to determine the relationship between environmental events (S) and responses to those events (R). Most S-R theorists assume a passive organism which builds up response capabilities by accumulating habits. Complex habits being but mere combinations of simpler ones.

Piaget's theory is diametrically opposed the S-R theory of knowledge since he equates knowledge with cognitive structures which provide potential to deal with the environment in certain ways. The cognitive structures provide a framework for experience: they determine what can be responded to and how it can be responded.

As for the nativists, Piaget would agree with Chomsky that cognitive structures are species-specific and genetically programmed, but he would disagree with Chomsky's claim that the human mind 'can itself be the exhaustive source of its linguistic competence, for which external stimuli serve only as occasions for activating what is already dispositionally in the mind's own structure'. (Gewirth, cited in Chomsky,1975.) Thus, for Chomsky, the child's linguistic competence necessarily stems from innate, specifically linguistic structures. Piaget would not agree with Chomsky's innateness hypothesis; for him only the functional mechanisms permitting the organisation of the child's interaction with his environment are innate. Piaget,(1971:369) points out that:

Cognitive functions are an extension of organic regulations and constitute a differentiated organ for regulating exchanges with the external world.

In conclusion, it is important to remember that Piaget has not himself studied language acquisition experimentally, this was to be carried out by his followers



(Sinclair, 1969, 1971), but his theoretical discussion of the place of language in cognitive development made him a pioneer in demonstrating the important role of sensorimotor actions as a preparation for language and thought.

### 2.1.2. Linguistic Approaches

Language acquisition has attracted not only the attention of psychologists who wanted to develop a theory of child language acquisition but also of linguists whose aim was to discover what the children know about language at any point in time.

The descriptions of child language that have so far been carried out were derived from methods and theories in linguistics. First of all, structural linguistics, then transformational-generative grammar, and most recently, the study of the relation between form and meaning.

#### 2.1.2.1. Structuralist Approach:

Before structuralism became the established theory for linguistic studies, there were in the early 20th century, two major trends in child language acquisition research. One, usually referred to as 'Diary Studies', was mainly carried out by a psychologist or linguistic parent who recorded his/her own child's progress in learning to talk and from there tried to make conclusions about child language acquisition (Bloch, 1921,1924, Leopold 1939-1949). The other, known as 'Count' or 'Normative' studies, was usually carried out with large numbers of children who varied in age, sex, social class and so on. The aim was to discover a common pattern that would enable researchers to understand 1st language acquisition process (Shirley, 1933; Gregoire, 1933). These studies described certain properties of the form of children's speech: for example, the average length, parts of speech, number of words, etc., in a representative number of child's utterances. They also allowed to establish the nature of the linguistic developmental stages children followed: first comes the so-called 'Holophrastic' period (between the age of 9 and 18 months) during which the child produces what are traditionally thought of as one-word sentences. For example, a child who is hungry may cry 'milk' meaning 'I want milk'. This stage is followed by the 'Telegraphic' period (between 18months and 2 years), initiated by the production of two-word utterances. For example the child says 'red car' or 'car red', meaning 'the car is red'. Between ages two and three years children speak in longer utterances. It must be pointed out however, that the developmental stages described above allow for considerable variation among children.

The advent of behaviourism in the 1930s and the 1940s, and its emphasis on objective data that could be counted and described statistically led to a total rejection of the kind of data which were gathered by a parent-investigator since, it was presumed, he/she was necessarily biased in what he/she chose to record in his/her notes and what he/she overlooked. Thus, investigators using structural linguistic methods aimed at establishing the nature of children's linguistic code. If they were successful in the description of the morphology and phonology of language, grammar turned out to be a major stumbling block. It was not at all clear how one could discover the grammar of a language and it was even less clear how much of a grammar existed in early child language.

It was in the early 1960s that a new impetus was given to the study of child language.

#### **2.1.2.2. Transformational-Generative Approach:**

The shift of emphasis thus, came with the advent of transformational grammar and its postulate of a deep syntactic structure, and the hypothesis that all human beings have innate knowledge of the essential underlying grammatical relations, which led researchers to ask different questions in their study on language development. Most important, there was a turn away from 'descriptions' of the forms of speech in an effort to discover what children 'know' about language at any point in time.

In the early 1960s researchers began to inquire into the knowledge that underlies the ability to speak and understand, or as Berko and Brown (1960) put it, the "productive system...that the child employs in the creation of new forms".

Various studies which have been carried out by researchers (Berko and Brown, 1960; Ervin and Miller, 1963; Ervin-Tripp, 1966), have demonstrated that children do not learn, as behaviourists presumed, all of the sounds, words and possible sentences in a language. Rather, what the child learns is an underlying linguistic system that is itself, never available to the child or the adult. Unlike the behaviourist-structuralist studies which concentrated mainly on morphology and phonology, the new approach concentrated on the study of syntax, or grammar.

The goals of research were to propose generative grammars for samples of child utterances at different times in development. Such grammars would specify the systems that would account for the use of sentences, i.e. the grammar.

In studies carried out by Braine (1963), Brown and Fraser (1963), Mc Neil (1966), and Miller and Ervin (1964), attempts were made to determine the patterns in



which words with a high frequency of occurrence occurred with words with a much lower frequency of occurrence. For example, Brown and Fraser (1963) reported utterances with 'Mom' and 'Dad', and , 'here' and 'there'; Miller and Ervin (1964) reported utterances with 'Off' and 'On', and variants of 'this' and 'that'. The important findings of these studies were that early syntax was indeed systematic and words were not merely juxtaposed at random, even in the earliest sentences. The major finding on which these studies agreed was that the words that occurred most frequently in the children's speech occurred in ordered relation to other words in sentences

These findings, and others, have shifted researchers' attention from 'description' to an attempt at 'explanation' of early sentences. Once the attempt was made to explain why some words occurred more than others and in an orderly juxtaposition in early sentences, it became clear that the child's underlying knowledge did not equal a grammar in any simple way. Child language research in the late 1960s and early 1970s thus followed a three-pronged approach:

- (i) emphasis on cognitive development and cognitive psychology for explaining language development.
- (ii) Search for the underlying semantics of early sentences, and,
- (iii) Search for the role of communicative functions in the child's developing linguistic forms.

### 2.1.2.3. Post-TG Approaches:

Cognitive development in relation to language learning became the dominant issue in theory and research at the beginning of the 1970s. The problem at issue was whether children acquire or somehow know the grammar of a language in the abstract sense proposed by Chomsky (1965) and Mc Neil (1966, 1970), or whether they learn language as a representation of their logically prior conceptual learning as proposed by Piaget's theory.

As already mentioned above, Piaget did not himself study language experimentally; it was left to his followers, (Sinclair, 1969 ,1971; Karmiloff-Smith, 1979) to carry out various studies in a Piagetian framework.

Sinclair (1969), for example, distinguishes between language as an object of knowing and a means for learning. Her intent in the series of experiments she reported was to determine: (i) the linguistic forms used by children who had achieved certain stages in cognitive development, such as the notions of conservation and seriation, and

(ii) whether or not one might hasten the development of such notions in children who did not yet have them by teaching them the relevant speech forms. Bloom (1976:37) noted that:

an explanation of language development depends upon an explanation of the cognitive underpinning of language: what children know will determine what they learn about the code for both speaking and understanding messages.

For other researchers however, (Slobin, 1971) if it is true that language learning depends on cognitive development, it must also be borne in mind that sequences of development are determined more by semantic complexity than by structural complexity. Thus, it is not only the cognitive side that is emphasised but also the semantic aspect of language.

The shift in the early 1970s towards the search for the underlying semantics of child's utterances came about as a direct result of the shift in linguistic theory in which semantics became a dominant concern. Some researchers (Bach and Harms, 1968; Bierwisch, (cited in Lyons (1970); Chafe, 1971; and others) proposed that an underlying semantic basis derivationally precedes the operations of the rules of syntax. The one semantic theory that attracted interest because of its relevance to child language data was the 'Case Grammar' proposed by Fillmore (1968): Noun forms characteristically predominate in the speech of children and many two-word utterances include at least one noun as constituent. Case grammar accounts for the semantic structure of sentences in terms of the meanings of noun forms, as specified by certain prepositions, in relation to verb forms. The semantics of early child language thus became the focus of research and case grammar appeared to be most readily applicable to child language data.

In his study of one English-speaking child, Kendall, and two Finnish-speaking children, Rina and Seppo, in order to compare development in two languages that code language differently, Bowerman(1973) reaches similar conclusions to those offered by Schlesinger (1971); children first learn semantic relations between words and these determine the subsequent development of such grammatical notions as subject and predicate. Thus, according to Schlesinger and Bowerman, early two- and three-word utterances represent semantic rather than syntactic relationships.

In reviewing Bowerman's and Schlesinger's findings, Brown (1973) concluded that the semantics of children's first sentences could not be as fully represented within the framework of the original theory of transformational-generative grammar, as they could be within case grammar.



However, despite the interest that this research represents, it nevertheless runs into the same difficulty that TG grammar has encountered: since there is no unified theory of meaning, it is still impossible, for the time being, to arrive at a unified theory that would specify semantic development in child language acquisition. What these studies have made clear however, is that language functioning extends well beyond syntactic organisation. One result was to draw researchers' attention on the function of language in discourse.

These researchers claim that since language is used for communication, research should be aimed at the study of the communicative functions of language. One researcher who has attempted to show how linguistic form develops as a result of the communicative functions the child acquires is Halliday (1975).

In an extensive study of his son Nigel, Halliday has outlined how the child began with a very limited set of functions, each of which was signalled unambiguously either by a word or an intonation pattern, and then, elaborated on them; as the number of words the child could produce increased so the language used for each of these functions became more and more complex and interdependent until the child achieved the adult recognition that the form of language and its functions were not in a one-to-one correspondence, and that the same syntactic and phonological form might express more than one function depending on situation, knowledge about the listener and intonation pattern. Halliday gives the following list of functions:

- (i) instrumental,
- (ii) regulatory,
- (iii) interactional,
- (iv) personal,
- (v) heuristic, and
- (vi) imaginative .

Halliday (1975:21) then concludes:

These are the initial functions with respect to which we identify the content of what the child is learning to say, the meanings that are present in this very early linguistic system. All those utterances which we identify as language can be interpreted in the light of some such set of functions as these.

Another approach is Bruner's suggestion (1975) that linguistic structure, in particular the devices in language for presenting topics and comments, or 'theme' and 'rheme', develops out of the child's pre-existing conception of the structure of co-operative action. In other words, a child learns to communicate using very basic distinctions of topic and comment, subject and predicate, agent, action and goal by virtue of having perceived and experienced interactions in which actions, gestures and holophrases are combined to regulate his or someone else's attention or interactions. Bruner (1975:18) concludes:

...the child comes to recognise the grammatical rules for forming and comprehending sentences by virtue of their correspondence to the conceptual framework that is constructed for the regulation of joint action and joint attention.

In concluding this survey of the various approaches to child language acquisition we have discussed so far, we can say, using Bloom's (1976) labels that these approaches can be grouped in either of the following terms.:

(i) 'linguistically determined' views which hold that the

course of language development depends directly on the nature of the linguistic system, and more specifically, on the nature of those aspects of language that might be universal and represented in an innate, predetermined program for language learning.

(Bloom 1975:37),

or,

(ii) 'cognitively determined' views which emphasise "the interaction the child's perceptual and cognitive development with linguistic and non-linguistic events in the environment." (ibid:37)

We shall conclude that the question of which type of view best describes reality remains to be resolved, but that the development of perception and cognition are keys to the understanding of the process of child's language acquisition.



### 2.1.3. Other Issues:

In addition to the main issues we discussed above, there have been a certain number of practical points which have attracted the attention of various researchers. We shall discuss below the most important ones.

#### 2.1.3.1. Imitation:

It has commonly been accepted that in learning language children acquire much through imitation, (i.e. by copying the language item that is modelled for them.) Its importance in the acquisition process however, has been perceived differently by researchers depending on which psychological school they adhered to. For the behaviourists, for example, imitation with reinforcement can fully account for language acquisition (Staats, 1971). But for TG proponents, imitation is particularly important in the early stages, in particular for the phonological system, but they argue, the fact remains that the most important information about a sentence is in its deep structure, so that repeating the surface structure cannot be helpful. Mc Neil(1966), H.D. Brown, (1973) and other researchers, have carried out experiments in which they clearly demonstrated that even in the early stages of language acquisition the child did attend to the semantic level of language, and that in some cases the imitation of the deep structure of language could literally block his attention to the surface structure.

The inadequacy of imitation as the sole factor in the acquisition process as suggested by the behaviourists, is further demonstrated by children's utterances of some items which cannot be explained through imitation: Children commonly produce words like 'sheeps', 'mouses', 'goed' etc., which they could not have heard any adult say. Clearly, children have formulated rules in their minds according to which they construct novel utterances. This is also true at the syntactic level: eg. \*'When we can go?', \*'He is doing what?'<sup>1</sup>, etc.

In support of the claim that imitation cannot be essential in the acquisition process, Lenneberg (1967) reported the case of a boy who could not speak, due to a paralysis of the speech musculature, but could still understand speech.

Other researchers, such as Moskowitz (1978), claimed that imitation had no role to play in the acquisition process. Such an extreme view however, can be easily rejected on the grounds that evidence suggests that either at the surface level or deep level, the child does imitate adults' speech.

---

<sup>1</sup> The use of (\*) in front of a sentence shows that this sentence is ungrammatical.

But if imitation is generally accepted as being an integral element of the acquisition process, it still remains a matter of investigation as to what exactly children are imitating.

### 2.1.3.2. Input:

During the 1960s Chomsky's theorizing about innate knowledge had a dampening effect on the study of input, both linguistic and environmental, with respect to the acquisition of language. It was suggested that a child could learn language simply by being exposed to sentences, with little necessity for relevant environmental stimuli. Furthermore, most adult speech, the argument went on, is basically semi-grammatical and what the child is exposed to is a chaotic sample of language, and only his innate capacities can account for his successful acquisition of language. Mc Neil (1966:36) suggested:

It is as if he [the child who is learning a language] were equipped innately with a set of 'templates' against which he can compare the speech he happens to hear from his parents. This speech is a haphazard sample (at least initially), not at all contrived to instruct a child in basic grammatical structure.

However, research has since shown that the nature of speech and environmental input which children receive is especially contrived to assist language learning. Bellugi and Brown (1964) and Drach (1969), for example, found that the speech addressed to children was carefully grammatical and lacked the usual hesitations and false starts in adult-to-adult speech. Newport (1975), for example in a long-term study with fifteen mothers reports an incidence of only one (1) ungrammatical utterance in 1500 in their speech. These findings are supported by Lande's summary (1975) of a wide range of research on parental input.

This research has made it clear that parent/peer and environmental input to the child is far more important than nativists might have believed. Adult input seems to shape the child's acquisition, though it remains to be seen just how important parental input is as a proportion of total input.

### 2.1.3.3. Practice:

This point is closely related to the notion of imitation. Language acquisition is heavily dependent on practice. A behaviouristic model of first language acquisition would claim that practice is the key to the formation of habits by operant conditioning. The question at issue is the role of the frequency of hearing and producing items in the acquisition of those items. Is, for example, the acquisition of particular words or



structures directly attributable to their frequency in the child's linguistic environment? Brown and Hanlon (1970) found that the frequency of occurrence of a linguistic item in the speech of mothers was an overwhelming strong predictor of the order of emergence of those items in their children's speech.

This issue, as we shall see later, is particularly important in 2nd and foreign language acquisition studies.

#### 2.1.3.4. Maturation:

This point is closely connected with the development of neurolinguistics (i.e. the study of the neurological basis for language). It is of course, well beyond the scope of the present discussion to deal in detail with this particular aspect of language learning. We shall only mention the fact that it is now commonly accepted that there is a special relationship between the left hemisphere of the brain and language, so that we can say that language is controlled by the left hemisphere. The process whereby one hemisphere of the brain is specialised in the performance of certain functions is known as 'lateralisation'. The process of lateralisation is 'maturational', in the sense that it is genetically preprogrammed, but takes time to develop. Thus, concerning language, Lenneberg, a leading figure in this field, writes (1967:178):

We must assume that the child's capacity to learn language is a consequence of maturation because (1) the milestones of language acquisition are normally interlocked with other milestones that are clearly attributable to physical maturation, particularly stance, gait and motor coordination (2) this synchrony is frequently preserved even if the whole maturational schedule is dramatically slowed down...(3) There is no evidence that intensive training procedures can produce higher stages of language development, that is, advance language in a child who is maturationally still a toddling infant.

Lenneberg (1967) and others have suggested that lateralisation is a slow process that begins at the age of two and is completed around puberty. It is now a widely held view that lateralisation is a precondition of the acquisition of language. In support of this view it may be noted that language acquisition begins at about the same time as lateralisation does and is normally completed by the time the process of lateralisation comes to an end. Further support comes from the fact that it becomes progressively more difficult to acquire a language after the age at which lateralisation is complete.

This has led some researchers to suggest the existence of a 'critical period' for language acquisition, in the sense that language will not be acquired at all, or at least not with full mastery of its resources, unless it is acquired by the time the child reaches the age in question (Curtiss, 1977) Lenneberg (1967:158) sums up this point as follows,



Language cannot begin to develop until a certain level of physical maturation and growth has been attained. After puberty the ability for self-organisation and adjustment to the physiological demands of verbal behaviour quickly declines. The brain behaves as if it had become set in its way, and primary basic skills not acquired by that time, except for articulation, usually remain deficient for life.

The notion of 'critical age' has also been extended by some researchers to foreign language acquisition (Scovel, 1969) and will be discussed later.

#### **2.1.3.5. Acquisition Strategies:**

The development of cognitive psychology has led researchers to investigate the strategies an individual uses in performing a learning task. A strategy may be defined as:

a particular method of approaching a problem or task, a mode of operation for achieving a particular end, a planned design for controlling and manipulating certain information.

(Brown, 1980:83)

The notion of 'strategy' has also been applied to the acquisition of language. Since this is the focal point of our research, we shall deal with it in detail in the next chapter.

#### **2.1.4. Conclusion:**

Having carried out a review of the most important psychological and linguistic theories of first language acquisition, we shall now turn to discussing the theories and relevant models of foreign language (henceforth FL) they have influenced.

#### **2.2.1. Foreign Language Acquisition Issues:**

This section will be devoted to a review of the various issues involved in FL acquisition studies. We must point out that it is well beyond the scope of our research to carry out a comprehensive and detailed analysis of all the issues involved. Instead, we shall try to show how, as a direct result of first language acquisition theories, researchers' interests have gradually shifted from the study of concrete and observable data (i.e. Learners' utterances) to more abstract issues eventually leading to the present growing interest in learners' learning strategies.



## **2.2.1. Problems inherent to the study of Foreign Language Acquisition**

### **2.2.1.1 Type of learning environment: Natural vs Formal Environment**

When a child learns a first language, we may say that he learns the language under 'natural' conditions. Such a learning situation differs greatly from artificial or 'formal' ones (i.e. the classroom). Similarly, a second (henceforth L2) or foreign language can be learned under either conditions. In the case of a child who is taken to live in a foreign country, or in the case of, say, immigrants' children, the FL, which in this case is an L2, may be learned without formal instructions, simply by associating with speakers of the L2, i.e. from contacts with other children (eg in a kindergarten). There are in fact very few studies which have concentrated on this type of learning, commonly referred to as 'naturalistic'. Hakuta's study (1976) for instance, was concerned with his 5 year-old Japanese daughter who, while in the US, learned English from neighbourhood children and from attending a kindergarten. In another study, Yoshida (1975) discusses the lexical development of a 3-5 year-old Japanese child as he acquired English in a natural setting. In a series of studies, Ravem (1968, 1969, 1973) studied the speech of his two Norwegian children learning English as a second language.

But most studies of L2 or FL acquisition have been carried out in a 'formal' environment, i.e. with learners in a classroom situation, with the intent of comparing the development of first and second language acquisition. This section will be exclusively concerned with this type of investigation. Before looking at the various issues involved, we think it necessary to mention some methodological problems which all researchers, at some time or another in their investigation, are bound to encounter.

### **2.2.1.2. Some Methodological Problems:**

Much of the FL acquisition research methodology and areas of interest have followed the L1 acquisition research precedents. In this section, we shall look, very briefly, at two main problems: (i) Data collection, and, (ii) Choice of informants.

#### **2.2.1.2.1. Data Gathering Methods:**

Until very recently, most of the research concentrated on investigating learners' production and, to a lesser extent, comprehension of the FL. Over recent years however, and as direct result of L1 investigations, there has been a growing interest in the study of learners' learning processes and learners' differences. These different fields of interest relied on different methods for collecting data, but were, ultimately, either longitudinal or cross-sectional studies. In the first type of research the language



behaviour of one and the same informant, or group of informants, is registered for a certain period at specific intervals. In the second case, one single sample of the language behaviour of a group of informants is taken at a given period of time. From each sample, it is assumed, one may draw conclusions about which aspects of the FL have been mastered and to what extent. In contrast with cross-sectional studies, where the time factor has in fact been eliminated, longitudinal studies give a picture of language development over time.

Each method has its advantages as well its drawbacks. Rosansky (1976) for instance, has raised fundamental objections to cross-sectional studies. She points out that these studies make two dangerous assumptions: (i) that elicited data are a valid measure of spontaneous productive ability, and (ii) that cross-sectional data are equivalent to longitudinal data. She has shown in her study that there are good reasons for not accepting either of these assumptions. Furthermore, as Ellis (1985) points out, the principal limitation of cross-sectional procedure is its inability to inform about the sequence of FL acquisition.

The advantage of longitudinal studies is that they provide data from different points of time, and therefore, enable a reliable profile of the FL acquisition of individual learners to be constructed. The main problem with such a procedure however, lies in the difficulty of making generalisations based on the profile of one or even a group of learners.

Early cross-sectional and longitudinal studies have mainly focussed on the investigation of learners' acquisition of morphemes and syntax. Over recent years however, researchers' interest has gradually shifted towards the investigation of other areas, such as 'meaning', 'discourse', 'learners' processes', and 'learners' differences'. These investigations relied on various data collection methods which were, in most cases, of the longitudinal type. In this respect, we can mention studies which were based on 'conversational analysis', i.e. analysis of the conversation between native speaker and non-native speaker, for instance Scollon's study (1976), or Peck's (1978) which both relied on such a method. Other studies have used 'observational' methods to determine, for instance, variability in language use (Decamp, 1971; Bickerton, 1975). More recently, researchers interested in the field of cognitive psychology, have attempted to determine learners' learning strategies through introspective studies: learners are asked to give information about their own knowledge and processing abilities. This point will be discussed extensively later.

Having thus selected a given method for collecting his data, the researcher will also have to decide on the criteria for the selection of his informants.



#### 2.2.1.2.2. Choice of informants:

The main problem facing the researcher is whether to base his study on one or many informants. The vast majority of the studies we have discussed and shall be discussing are all based on the study of large groups of informants. The main reason why researchers favour large groups of informants is because of the obvious disadvantages inherent to the study of the language development of a single informant. As Van Els et al. (1984:7 ) point out:

(i) it is impossible to generalise about language development on the basis of case studies, (ii) they do not, or only barely, allow for statements about individual variation in language development, (iii) they can easily lead to observer bias: the researcher may identify with the informant to such an extent that he observes what he wishes to observe, and (iv) frequent contact between researcher and informant which is aimed at collecting data on 'language' may influence the language development process in as yet unknown ways.

Having discussed these main methodological, problems, we shall now turn to the first most important issue in FL acquisition studies.

#### 2.2.2. A Role for the L1?

It is widely believed that the acquisition of a FL is influenced by the learner's first language, or mother tongue. However, the extent to which this influence is perceived depends on the school of thought to which the researcher adheres. For some, the L1 strongly influences the acquisition of the FL, while for others, the L1 has little or no influence on the acquisition process. In order to understand why there is such a disparity regarding the role of the L1, it is necessary to examine very briefly the evolution of linguistic and language learning theories. In the early days of modern linguistics, Behaviourism was the prevailing learning theory (see 2.1.1. and 2.1.2. above). It claimed it could explain both L1 and FL acquisition process. The pedagogical application of behaviourist explanation to FL acquisition gave birth to what has come to be known as Contrastive Analysis (or CA for short).

##### 2.2.2.1. Contrastive Analysis

It is commonly agreed that CA originated from Lado's book "Linguistic Across Cultures" in which he stated (1957:vii):

The plan of the book rests on the assumption that we can predict and describe the patterns that will cause difficulty in learning, and those that will not cause difficulty, by comparing systematically the language and culture to be learned with the native language and culture of the student

The climate in psychology and linguistics in which CA developed can be characterised as structuralist and behaviourist. Structuralist in as much as it considered language as a series of structures which could be readily dismantled for analysis, and behaviourist since, following Skinner's explanation of how language learning is achieved (see 2.1.1.1. above), it assumed that language is nothing but a manifestation of behaviour. As such, language acquisition must be the product of constant exposure, the process of which is established through a stimulus-response conditioning, which if sufficiently reinforced, finally accumulates and forms a set of habits. Moreover, according to this view, since habits are the product of an extremely long process which cannot be put aside easily another set of habits to be acquired (i.e. another language) will inevitably be viewed in terms of the already existing habits. Thus, central to this psychological view is the notion of 'Transfer': the term has been coined following observations that prior learning affects subsequent learning. Concerning the acquisition of another language, Lado (1957:2) suggests that:

...those elements that are similar to the learner's NL will be simple for him, and those that are different will be difficult .

Transfer can either be 'positive' or 'negative'; when acquisition is facilitated because the two language structures coincide, there is positive transfer, but when acquisition is inhibited because the two structures differ, there is negative transfer. According to this view then, learners' errors are but instances of negative transfer, i.e. old habits getting in the way of learning new habits. The eradication of these errors, according to CA proponents, becomes simply a matter of repetition and reinforcement until these new habits are mastered.

The attitude of researchers towards CA however, has changed over recent years. This change is the result of various investigations which have pointed out serious weaknesses in CA assumptions, as well as of a re-orientation in psycholinguistic theory towards a cognitive approach which considered language as knowledge rather than as behaviour.

In its original version CA made, what was referred to as 'strong' claims. It contended that on the basis of a thorough comparison between the L1 and the FL one could predict the areas of difficulty that learners are likely to encounter, thus avoiding the production of errors. This strong version, or 'predictive' school as it came to be known, however, came under attack from various quarters. Its opponents preferred a less categorical version of CA.

The main criticism formulated against the strong version of CA, is that it makes demands on linguistic theory and therefore on linguists, that they are in no



position to meet: it demands of linguists that they have available a set of linguistic universals formulated within a comprehensive linguistic theory which deals adequately with syntax, semantics and phonology.

Thus, researchers were led to adopt an approach which made fewer demands on contrastive theory than does the strong version. It starts with the evidence provided by linguistic interference and uses such evidence to explain similarities and differences between systems, but whereas the strong version advocates a predictive role, this new version, known as the 'Weak' CA hypothesis puts the emphasis on its 'explanatory' role in observed interference phenomena. This view is summed up by Wardaugh (1970:181) who points out that all the weak CA requires of the researcher is.

...to use the best linguistic knowledge available to him in order to account for observed difficulties in second language learning. It does not require what the strong version requires, the prediction of those difficulties and conversely of those learning points which do not create any difficulties at all.

This version of the CA hypothesis will gradually lead to what has come to be known as Error Analysis (or EA for short) which we shall discuss later.

Both versions of CA however, came under attack from various quarters. The main challenge to structuralist CA has come from TG grammar. The superiority of transformational thinking over the structuralist views, as already pointed out, consists in its approach to the relationship between language and other related phenomena. Structuralists analysed language as a phenomenon 'per se', and described its units and patterns without reference to anything outside language: the units of the system were justified within the system itself. Transformational theory on the other hand, not only stresses the connection between human cognition and human language but also seeks as its goal to state this relation explicitly.

Generativists point out that structural contrastivists have dealt only with the surface structures; this is why they put forward their own transformational contrastive approach which focuses on the deep structures and the transformations involved in the systems compared. They hold that:

...at the 'deepest' level of analysis we need a theory which distinguishes explicitly between 'deep' and 'surface' phenomena.<sup>(2)</sup>

Thus, according to Moulton (1968:28) the task of the researcher is:

...to plot the two deep structures (they are usually remarkably similar), then plot the two surface structures (they are usually remarkably

---

<sup>2</sup> Paul Van Buren. 'Contrastive Analysis', Department of Applied Linguistics, University of Edinburgh, mimeograph, p.15.

different) and then note the contrasting transformational (recording) rules that connect the two.

There have been a certain number of studies which adopted this approach. Newmark (1970), Ritchie (1968), Di Pietro (1968) and others have applied TG theory in CA, but despite its superiority to structuralist CA, the transformational contrastive approach remained as vulnerable to criticism as the structural one. Even if we accept the concept of deep Vs surface structures dichotomy, no one is really sure as to what exactly constitutes the deep structure of language. The problem is that the term means different things to different people. For example, a sentence like 'The man killed the tiger', will be given a different analysis whether the analysis is being carried out by Chomsky, Fillmore or Lakoff. In each case the derivation of the surface structure from its deep structure will be performed differently.

The pedagogical implication is that these divergent and sometimes incompatible views of the deep structures make it very difficult for a language teacher to decide which of the deep structures he should expect the learner of the FL to relate to their corresponding surface structures.

In addition to these theoretical objections, there have also been various findings stemming from empirical research which have struck at the very heart of CA assumptions and beliefs. Dulay and Burt (1973, 1974a, 1974b, 1974c), Richards (1974a, 1975), and others have carried out a certain number of studies which showed that the main tenets of CA, i.e. predictability of errors and specificity of languages, were not as reliable as it was thought. For instance, some errors which CA predicted never occurred in learners' utterances; conversely, some areas of language which CA assumed to be easy to learn turned out to be of great difficulty for the learner, thus resulting in errors. Furthermore, these investigations have shown that not all errors were traceable to the learner's mother tongue. Dulay and Burt (1973, 1974) for instance, identified four types of error which they labelled as follows:

- (i) interference-like errors (i.e. errors that could not be traced to the learners' L1)
- (ii) 1st language developmental errors (i.e. errors which do not reflect NL structures but are found in 1st language acquisition data)
- (iii) ambiguous errors (i.e. errors which cannot be categorised as either interference-like or developmental), and



(iv) Unique errors (i.e. errors which do not reflect 1st language structure and are also not found in L1 acquisition data of the TL).

Dulay and Burt (1973, 1974) acknowledge the fact that there are instances of errors that appear to be interference errors, but these, they argue, might be brought about by overgeneralisation strategies learned from the FL itself. Further evidence can be found in Richards' study (1974) of the acquisition of English by learners with different NLs in which he showed that although some errors could be traced back to the learner's mother tongue, there were many errors which did not derive from transfers from another language. These he called 'intralingual and developmental' errors of which he gives a detailed classification. The most interesting feature in this study is that learners he selected had different NLs, which led him to conclude that (Richards 1974:173):

...origins (of errors) are found within the structure of English itself...these are representative of the sort of errors we might expect from anyone learning English as a second language.

As a result of this research, the importance of L1 interference was questioned and fell into disfavour. Gradually, however, the role of the L1 was reappraised rather than rejected. This point will be discussed later.

Since neither structuralist nor TG contrastive analysis were satisfactory for accounting for learners' difficulties in FL acquisition, some researchers came to believe that Error Analysis (henceforth EA) was a more reliable source of information about difficulties in FL learning. EA which originally started as an alternative to the strong CA hypothesis, will gradually develop into an autonomous field of study whose aim is to systematically describe and explain errors made by learners of a FL. Central to the investigation was the analysis of the errors made by learners since they represented the most significant data on which a reconstruction of their knowledge of the FL could be made.

#### 2.2.2.2. Error Analysis:

In accordance with behaviourist learning theory, errors in FL acquisition were for a very long time regarded as undesirable consequences of methodological weaknesses. The attitude of researchers however, has dramatically changed over recent years. Corder (1967:167) sums up the prevailing view as follows:

...we can regard the making of errors as a device the learner uses in order to learn. It is a way the learner has of testing his hypothesis about the nature of the language he is learning.

Thus, the emphasis is no longer on the study of errors exclusively, but on all the learner's utterances. In the study of the learner's language, the learner is seen as constructing for himself a grammar of the FL on the basis of the linguistic data in the language to which he is exposed and the help he receives from teaching.

The learner's language has been coined differently by various researchers. Nemser (1971), for instance, calls it an 'approximative system', i.e. deviant linguistic systems "employed by foreign language learners in an attempt to utilize the taught language" (1971:116). According to Nemser, the process of FL acquisition can be seen as a succession of stages of proficiency ultimately approaching native-like competence in the TL. In principle, each stage can be described independently without reference to either the L1 or the TL. Corder (1971a), on the other hand, calls the learner's language the learner's "Etat de dialecte" (p.64), or the learner's "Idiosyncratic dialect" (1971b), which he defines as "the learner's language which is regular, systematic and meaningful, i.e. has a grammar and is in principle describable in terms of a set of rules' (p.61). Selinker (1972 : 214 ) hypothesises the existence of a

...separate linguistic system based on the observable output which results from a learner's attempted production of a TL norm. This linguistic system we will call "Interlanguage .

The study of Interlanguage led Selinker to formulate the existence of a certain number of processes (five) which he considers vital in accounting for the form of Interlanguage. Central to each process is the notion of "fossilization" which refers to permanent characteristics of the speech of learners irrespective of the age at which the TL is being acquired or the amount of proficiency in it. Selinker characterises these fossilizable linguistic elements as: 'those linguistic items, rules, and systems which speakers of a particular NL will tend to keep in their interlanguage relative to a particular TL.' (Selinker, 1972:215) .

Despite their different labelling of learners' language these investigations all agree on the fact that (i) these systems are structurally intermediate between the NL and the TL (Selinker, 1972), and that (ii) they are transient and dynamic (Corder, 1971b, Nemser 1971). As already pointed out, researchers now stress the fact that EA should not confine itself solely to the study of learners' errors but should in fact consider the whole corpus of utterances, the 'system' which actually constitutes his knowledge of the TL at any given point in his learning process. This transient system we shall henceforth refer to as 'Interlanguage'.

In trying to explain the sources of errors in Interlanguage, researchers have put forward one of the following explanations :



(i) Transfer errors: FL errors are due to the interference of the NL. This is the explanation put forward by CA. It follows that errors reflect the characteristics of the NL and are common only to learners having the same NL.

(ii) Overgeneralisation errors: errors have an intra-lingual origin, i.e they are due to the TL itself (Richards, 1971).

(iii) Developmental errors: errors are due to general developmental processes that accompany learning. This view, known as the creative-constructive view, came to see the acquisition of the NL and the FL as being identical. It is commonly referred to as the  $L_1=L_2$  Hypothesis, originally developed by Dulay and Burt (1972, 1974, 1974).

### 2.2.2.3. The $L_1 = L_2$ Hypothesis:

The  $L_1=L_2$  hypothesis holds that children learning a FL actively organise the FL speech they hear and make generalisations about its structure as children learning this language as their NL do. Therefore, the errors (or 'goofs' as Dulay and Burt (1972) call them) expected in any particular FL production would be similar to those made by children learning that same language as their first language. Dulay and Burt suggest this hypothesis as an alternative to CA which they criticise on various grounds. Their criticism hinges on the distinction, already latent but never fully developed in Lado's work, between the level of 'product' which describes the actual 'goof' and the level of 'process' or "the theoretical assumptions which account for the product." They point out that, whereas at the level of process the CA hypothesis offers a theory of transfer, the  $L_1=L_2$  hypothesis offers an active mental organisation. The theory in fact, stems from the burst of first language acquisition research in the 1960s with which came a new interest in second language learning, in particular that of comparing  $L_2$  syntactic development in children with NL acquisition findings.

In the various studies they carried out (1972, 1973, 1974) they found that the sequence of acquisition of some 'functors' was the same across learners with different language backgrounds. They concluded that their research provided a strong indication that universal cognitive mechanisms were at the basis of a child's organisation of the TL and that the second language system, rather than the child's first language, guides the acquisition process. Similar findings were suggested by other researchers, Ervin-Tripp (1974), Cook (1973).

But not all researchers however, agreed with these theoretical assumptions. Tarone (1974) for instance, is representative of this trend. In her discussion of the Dulay and Burt studies, in addition to various technical and procedural points, she puts

forward a certain number of theoretical objections which strike at the heart of Dulay and Burt's conclusions.

In spite of its shortcomings however, the L1=L2 hypothesis had far reaching pedagogical implications: contrary to CA which viewed errors negatively, this approach viewed errors as a positive source of information about the way in which learners try to make sense out of the L2 input to which they are exposed. It also showed that it is not so much the error that matters as the strategy that underlies the error. It is therefore, the merit of such studies to have shown the importance of some processing strategies that underlie second language acquisition.

In addition to being a new approach towards errors, the cognitive approach has also led to a reappraisal of the notion of transfer. This part will be discussed at length later (see 2.2.3.3.1.), but it must be pointed out that most studies that have been carried out in this particular area have dealt with learners with a monolingual background. Since our research involves learners who are already fluent in at least two languages (Arabic and French) we think it necessary to look at the very few studies which were carried out in a similar linguistic situation.

#### **2.2.2.4. Learners with a bilingual background:**

Unfortunately very little work has been done to investigate the role of bilingualism in the acquisition of a FL. Ringbom (1976) for instance, tried to investigate the different errors made by Finns learning English. The choice of such students, he says, is ideal since Finland has two official languages, Finnish and Swedish, and these two languages have coexisted with no major conflict. The analysis of the data showed that Swedish-speaking Finns made relatively many errors attributable to Swedish, which is a Indo-European language, and almost none attributable to Finnish, a non-Indo-European language. Further evidence which corroborated these findings was provided by Sjöholm's study (1976) which showed that Finnish-speaking Finns made errors in English that could not be traced to Finnish (their first language) but rather to Swedish (their second language) or to English itself, while Swedish-speaking Finns' errors reflected Swedish (their first language) or English but not Finnish (their second language). An explanation for these findings can be found in Kellerman's claim (1977:95) that:

...students with native language A, bilingual in language B and learning C should more readily make interference errors traceable to A when A is typologically closer to C. If B, their second language is closer to C, then there will be fewer errors attributable to A than C.



It appears thus, that what is important in this kind of linguistic situation, is not so much what constitutes first or second language, but rather it is the learner's perceived relatedness to a third language that will determine the occurrence of transfer from either of his two NLs.

Thus, to answer the question we started with at the beginning of this section, we can say that researchers' attitude towards the learner's L1 has shifted from one extreme to another. From the CA hypothesis proponents who viewed the L1 as the sole origin of errors to the advocates of the L1=L2 hypothesis who rejected outright the L1 as irrelevant to explaining learners' errors. Over recent years however, there has been a reappraisal of the role of the L1 which has led researchers to adopt a middle ground position: The learners' L1 is seen as an important determinant of FL acquisition, but it is not the only one. The task of the research therefore, is to look for these other factors which come into play.

### **2.2.3. Areas of investigations in FL Acquisition:**

Studies of learners' acquisition of a FL have gradually shifted from: a 'product-oriented' approach, the illustration of which can be found in the works of CA and early EA whose main aim was to point out and explain learners' deviations from the FL norm at any given point in time, to a 'process-oriented' approach whose main task is the elaboration of a theoretical construct which would provide a satisfactory account of the acquisition process. The impetus behind this shift can be traced on the one hand, to the reorientation in linguistics and the psychology of language brought about by Chomsky and his followers, and, on the other hand, to the findings of various researchers who pointed out the importance of including the study of meaning and the analysis of discourse in the study of learners' speech.

Process-oriented research has concentrated on four main issues:

The study of (i) Output, (ii) input, (iii) learner process, and (iv) learner differences.

#### **2.2..3.1. The Study of Output:**

The first works which were carried out in this respect were mainly concerned with the study of morphemes. These studies were carried out in order to investigate the order of acquisition of a range of grammatical items in the speech of FL learners. The source of inspiration for this research was R. Brown's longitudinal study (1973) of L1 development which showed that (i) the order of acquisition of the morphemes studied was highly invariant for each of the children, and (ii) the order was not determined by

environmental factors but had to be explained on the basis of internal cognitive mechanisms operating in the learner himself.

These findings were extended to child FL acquisition by Dulay and Burt (1973, 1974) and several other researchers, Bailey et al. (1974), Larsen-Freeman (1976), Krashen et al. (1978) in various cross-sectional studies, and by other researchers in various longitudinal studies, such as Rosansky (1976).

The implication of these studies is that any child in this age range will go through this sequence in learning English irrespective of his L1. Larsen-Freeman's study (1976) however, raised an important point. She pointed out that despite her reaching the same conclusions, she nevertheless found significant variations in the results: these were traceable to the elicitation instrument. Thus, if the order of oral production tasks agreed with Dulay and Burt's findings, those on listening, reading and writing tasks produced different orders. Unfortunately, there has been very little research to date which explores the correlation between the type of elicitation technique used and the order of acquisition obtained.

Not all researchers however, agree with these findings. Rosansky (1976), for instance, has raised fundamental objections to this whole approach of elicited data (see 2.2.1.2.1. above). In her longitudinal study, she shows that there is considerable individual variation in morphemes order and that longitudinal and cross-sectional studies do not always agree. She raises the question of whether the format of the eliciting tools might not be somehow affecting the ordering of morphemes.

Despite these objections however, the order described in Dulay and Burt (1974) have been confirmed to a high degree by a whole series of morphemes studies. In his review of these studies Krashen (1981:55) found that in all of them there was a great degree of uniformity.

In addition to this large body of research in morphemes studies, there have also been several other studies, most of them longitudinal, which have concentrated on other areas of learners' output and whose aim was to investigate learners' stages of development in acquiring certain items. Thus, several studies have investigated the development of 'negatives' among learners with different L1 backgrounds: Milon (1974), Cazden et al. (1975), and Wode (1980). Others have concentrated on the acquisition of 'interrogatives' (Cancino et al. 1978, Ervin-Tripp, 1974, and Adams 1978), or 'relative clauses' (Cook 1975, Schumann 1980, Gass 1980). These studies have provided strong evidence in favour of a natural developmental route in FL acquisition. It was shown, for instance, that there was some convincing evidence that suggested great similarities in the way learners with different L1s acquired negatives



and interrogatives. Similarly, investigations in the acquisition of relative clauses showed that the same universal course may be followed by advanced grammatical structures. But these findings still need further research to provide more evidence in favour of such claims.

It can be said that the study of learners' linguistic competence ('grammar') became the major preoccupation of researchers as a direct result of the close links between mentalistic accounts of language acquisition and the theories of syntax associated with Chomsky. However, the shift in the early 1970s towards the search for the underlying semantics of child's utterances which came as a direct result of the shift in linguistic theory in which semantics became the dominant concern (see 2.1.2.3. above) saw a whole series of studies aimed at the study of 'meaning' in child's utterances. Furthermore, the shift towards semantic descriptions initiated a growing interest in the function of language in discourse: since language is used for communication, it is argued, research should also be aimed at the study of the acquisition of the communicative functions which, in opposition to linguistic 'competence', will be referred to as 'communicative competence'. Unfortunately, apart from some pioneering work carried out by some researchers, Hatch (1978), Hatch and Long (1980), Larsen-Freeman (1980) and Schwartz (1980) which we shall discuss below, this promising orientation in FL acquisition studies has neglected the study of how 'meaning', 'discourse', and 'communicative competence' are acquired, and how they contribute to grammatical development.

### 2.2.3.2. The Study of Input

The word 'Input' in this section will be used with a different meaning from the one used in Krashen's Input Hypothesis which we shall discuss later. Input, in this section, means the use of the FL that is addressed to learners either by a native speaker or the teacher, or by another learner.

Earlier in this chapter (see 2.1.3.2.) we pointed out the weaknesses of the nativists' assumptions that acquisition of language was achieved through mere exposition to the language. But it has been shown since, that the nature of speech and environmental input which children receive is especially contrived to assist language learning. It had thus been made clear that parental input (also called 'Motherese') and environmental input are far more important than nativists earlier might have believed. These assumptions are important to keep in mind if one is to understand the route that FL acquisition research has followed for investigating input. Two main approaches have prevailed so far: (i) the study of input/interaction in a natural setting, and (ii) the study of input/interaction in the classroom.

### 2.2.3.2.1. Natural Setting:

The study of input/interaction in natural setting has concentrated on two main issues: The study of the language native speakers use when they address non-native speakers, which is referred to as 'Foreigner-Talk' (or FT for short), and the study of 'discourse'.

The term 'Foreigner-Talk' was coined by Ferguson in his study (1971) of simplified registers which showed that the main characteristic of FT was 'simplification', i.e. various adjustments made by the speaker in order to make utterances easier to understand. Research has since concentrated on the description of FT: Long (1981, 1983), Ferguson and Debose (1977), and Hatch et al. (1978). The description of FT has concentrated on identifying its characteristics; Long (1981) for instance, points out that FT has both 'formal' and 'functional' features which he labels 'input' and 'interactional' features respectively. Ellis (1984:135) gives a comprehensive account of the adjustments involved in each of these types which have been identified in various studies.

Explanation of FT has concentrated on two issues: 'Why' do adjustments occur, and 'how' do they take place? Hatch (1983) suggests that FT has the same basic functions as motherese. That is (i) it promotes communication, (ii) it establishes a special kind of affective bond between the native speaker and the non-native speaker, and (iii) it serves as an implicit teaching mode. In addition to these functions, Ellis (1984) suggests adding the 'talking down' function, i.e. the use of FT to mark the role-relationship between speakers. This suggestion is supported by Long's study (1983) in which the characteristics of this function are described: use of ungrammatical simplifications and a special lexicon. Explaining how native speakers are able to adjust their speech has also been investigated: Hatch (1983), Meisel (1980). These studies, as Ellis (1984) suggests, point out three possible steps: (i) 'regression' (i.e. the native speaker unconsciously moves back through the stages of development which characterised his own acquisition of the language until he reaches an appropriate level for the person he is addressing), (ii) 'matching' (i.e. the native speaker assesses the learner's language system and then imitates the language forms he identifies in it), and (iii) 'negotiation' (i.e. the native speaker simplifies and clarifies in accordance with the feedback he obtains from the learner).

In the study of 'Discourse', researchers have concentrated on conversations involving either children, Hatch (1978a, 1978b), Peck (1978, 1980), or adults learner, Schwartz (1980), Scarcella and Higa (1981). These studies have shown that there were differences in the type of discourse involving child and adult learners, such as kind of topics discussed, types of interaction strategies used, amount of co-operation required,



and so on. Conversations between native speakers and FL learners involve both sides to 'negotiate meaning', i.e. to avoid and overcome breakdowns in communication. In his study of native/non-native speaker interaction, Long (1983) suggests that negotiation of meaning involves the use of 'strategies', i.e. conversational devices to avoid problems, and 'tactics' i.e. devices for repairing troubles.

#### 2.2.3.2.2. Classroom setting:

Research in the study of input in a classroom setting, which is relatively recent, has concentrated on three main areas: First, the study of the kinds of language use which occur in classroom between teacher and learners, known as 'interactional analysis'. Researchers like Fanselow (1977), Allwright (1980) and others have tried to develop a category system for analysing the communicative uses of the teacher's and learners' language. Second, the study of the language used by the teacher when addressing FL learners, or 'Teacher Talk'. The aim of such an analysis is to investigate the adjustments which occur in the teacher's use of language. Various studies, Long (1983), Long and Sato (1983), Chaudron (1983), have pointed out a whole range of speech adaptations which, in many respects, were similar to those observed in the study of Foreigner Talk: grammatical simplification, slower pace of delivery, repetition of utterances, long pauses and so on. The third area of investigation concentrated on the study of discourse in order to identify the different types of interactions which occurred in the classroom. It differs from interactional analysis in that it aims to describe not just the function of individual utterances, but how these utterances combine to form larger units of discourse. The studies on classroom interactions carried out so far, have focussed on one particular type of discourse: the one which is prevalent in teacher-centred classrooms, known as IRF, i.e. discourse involved in exchanges in which the teacher 'initiates' (I), the learner 'responds' (R), and the teacher supplies the 'feedback' (F). These studies were initiated by Sinclair and Coulthard (1975), Coulthard and Montgomery (1981), and Sinclair and Brazil (1982). However, as Ellis (1980, 1984) and Mc Tear (1975) have shown, IRF exchanges are not the only types of discourse which occur in classrooms, other type of interactions can also be isolated.

The research we have reported so far, has mainly concentrated on the description and, to some extent, explanation of input in FL acquisition. Unfortunately, there has been very little research to date which investigated the effects of input/interaction on the overall process of language acquisition. The very few pioneering works available, Hatch (1983), Long and Sato (1984), and more specifically in the Algerian context, Slimani (1987) and Cherchalli (1988), leave many questions unanswered and need much further research to provide us with a clearer understanding of this particular process.

### 2.2.3.3. The Study of Learner Processes:

The main assumptions of researchers investigating learner processes is that the acquisition of a FL involves learners sifting the input they are being provided with and relating it to their existing knowledge. The aim of the research therefore, is to explain how this process takes place. So far, two possible explanations have been put forward which has led to two different, but complementary approaches.

The first approach is known as the 'Universal Hypothesis': it assumes that learners have a special built-in linguistic faculty which enables them to, operate on the input data in order to acquire the FL. This approach, as we shall see below has led to the investigation of linguistic universals.

The second approach, or the 'Strategies Hypothesis' assumes that learners may use general cognitive strategies which are part of their general knowledge, and which therefore are used not only for learning FL but in other forms of learning as well. This approach has led to the investigation of learners' learning strategies.

#### 2.2.3.3.1. The Universal Hypothesis:

Earlier in this chapter (see 2.1.1.2. and 2.1.2.2.), we carried out a detailed analysis of the concept of "linguistic universals" which originated from Chomsky's work and which was later, developed by his followers. Although Chomskyan theory has been almost exclusively concerned with acquisition by the child of his L1, there have nevertheless been a number of different approaches which incorporated linguistic universals in the acquisition of a FL. Two approaches have so far prevailed, each of them adopting different views on the description of universals.

The first approach which stems from Chomsky's work is known as 'Universal Grammar': it set about to investigate linguistic universals on the basis of an in-depth study of a 'single' language, whereas the second approach, known as 'Typological Universals', stems from the work of J.H. Greenberg (1966) and his followers who set about to investigate linguistic universals by examining a wide range of languages from different language families to discover what features they have in common (study of universals) and the variation that exists between languages (Study of typology).

It is not our purpose to carry out in the present discussion a detailed analysis of each of these views since they are primarily concerned with the acquisition of L1. Instead, we shall concentrate on two closely related points in the theory which have a direct relevance with the study of FL acquisition : the notions of (i) 'Markedness' and (ii) 'Accessibility Hierarchy'.

(i) The Universal Hypothesis holds that there are in language a large number of areas where one property can be described as more 'marked' than some other property.



This is referred to as the 'markedness Hypothesis'. It views language in terms of 'Core' Vs 'Peripheral' grammar: Core rules are those which the child discovers with the aid of Universal Grammar, while peripheral rules are those that are derived from the history of the language. Cook (1985:5) gives the following examples of peripheral rules: structures like 'the more the merrier' which comes from Old English, or the pronunciation of 'police' which comes from French, or structures which have been added by accident to the language, eg. 'the dreaded lurgy' from a radio programme. Thus, the child's knowledge of his L1 is made of rules determined by Universal Grammar (the core) and those that have been learnt without the help of Universal Grammar (the periphery). As Chomsky (1980:8) points out:

...it is reasonable to assume that Grammar determines a set of core grammars and that what is represented in the mind of an individual even under the idealisation to a homogeneous speech community would be a core grammar with a periphery of marked elements and constructions.

Hence according to the theory, core rules which are learnt with only minimal exposure, are unmarked, and peripheral rules which are more difficult to acquire, are marked.

(ii) Accessibility Hierarchy is the direct result of the concept of markedness. It postulates a continuum going from rules that are more accessible and hence, most easily learnt, to those that are least accessible and thus learnt with more difficulty. The evidence for such a 'hierarchy' has been provided by various studies. For instance, Keenan and Comrie (1977) in their study of the acquisition of relative clauses found that clauses based on a subject relationship (eg 'The man who came in is English'), are more accessible than those based on an object-of-comparison relationship, (eg 'The boy that I'm fatter than is leaving'). Further evidence has also been provided by a series of other studies which had similar findings: Comrie (1984), Gass (1979) and Gass and Ard (1980).

The theory of 'Markedness' and 'Accessibility Hierarchy' has been applied to two main areas in the study of FL acquisition: the study of interlanguage development, and to the study of a newly reappraised notion of transfer.

In investigating interlanguage researchers were interested in the extent to which the linguistic universals contributed to the development of interlanguage. Two main areas have so far, been investigated. First, the relationship between linguistic universals and channel capacity ('channel capacity' in Chomsky's theory refers to various non-linguistic factors such as memory capacity and general cognitive capacities), the aim being to analyse the role of cognition in FL acquisition. Gass and



Ard (1980) for instance, suggest that children's order of acquisition of relative clauses in their L1 follows their cognitive development, whereas the order of acquisition by FL learners reflect a principle of accessibility. The same findings were suggested by Cook in various studies (1975, 1977). The second area which attracted researchers' attention is 'Hypothesis testing', i.e. the widely accepted assumption that the language learner is constantly testing his knowledge against new linguistic data which is then modified accordingly. Schmidt (1980) for instance, found that learners of English produced only natural surface orders such as 'John sang a song and played the guitar', or 'John plays the guitar and Mary the piano', but not \* 'Sang a song and John plays the guitar', thus obeying the principle that only the second identical noun or verb may be omitted from the sentence.

The Markedness Hypothesis has provided a sound basis for the reappraisal of the role of transfer in the theory of contrastive analysis hence solving some of the inadequacies and in particular providing an explanation why some differences between the L1 and the FL lead to learning difficulty, while other differences do not. The answers which have been provided however, differ from one researcher to another.

Zobl (1983, 1984) for instance, suggests that one reason for the transfer from L1 is that the FL is obscure. He then proceeds to analyse the ways in which this obscurity arises and how the learner solves it. Eckman (1977) on the other hand, argues that transfer effects are most in evidence when the L1 setting is unmarked and the FL setting is marked. In his 'markedness Differential Hypothesis', he states that the areas of the FL which will be difficult are those areas which are both different from the L1 and relatively more marked than the L1. Kellerman (1977, 1979, 1984) argues that transfer should be looked at as a cognitive process (i.e. a strategy). He points out that the strategy of transfer of NL items into FL expressions is an active learner strategy dependent on the learner's notion of 'distance' between his NL and the FL, i.e. the learner's perception of the similarity between his NL and the FL. Contrary to traditional CA, Kellerman (1978:39) considers it most likely that: "the greater the distance perceptually between NL and FL, the lower the incidence of interference."

Thus, Kellerman suggests looking at transfer in a different way: it is a conscious decision-making procedure used by all learners of a FL whatever their NL is. Some direct and indirect evidence of transfer as a strategy has been provided by other researchers: Schachter et al. (1976), Jordens (1977) and Rutherford (1982).

The difficulty with such a variety of definitions of markedness is that researchers may be led to make different predictions about the effect of FL acquisition. As Ellis (1985:212) points out:



Until reliable and generally accepted means are found for establishing which of two or more forms are marked and unmarked, or more or less marked, the whole construct of markedness must be considered of doubtful value for empirical research.

Despite all its weaknesses however, this approach based on linguistic universals holds a great deal of promise for clarifying our understanding of interlanguage development and transfer.

#### **2.2.3.3.2. Learner Strategies:**

Since we are devoting the whole of our next chapter to discussing strategies we shall limit ourselves at this stage to mention that the concern in learner strategies is part of the growing interest in learners' cognitive processes which has developed over recent years. The aim of this research is to account for how learners handle input data and how they use the FL resources in their attempted production of the FL. These concerns have led researchers to look at the strategies which learners use to learn ('Learning Strategies') or to use the FL ('Production and Communication Strategies').

#### **2.2.3.4. The Study of Learner Differences:**

Everyday observation in the acquisition of a FL shows that within the same group of learners there may be great individual variation: some learners are more successful in acquiring the FL than others. Similarly, it can be easily noticed that children acquire more easily a FL than adults do. It is the investigation of these individual factors that researchers studying learner differences set about to discover; So far, they have concentrated on four main areas: Age, Aptitude, Attitude and Motivation, and Cognitive styles.

#### 2.2.3.4.1. Age:

The traditional assumption in second or foreign language acquisition is that children learn second (or foreign) languages more easily than adults. Reference is also made to immigrant families where children have learnt the language of their new community with near-native proficiency. It is such a phenomenon which led to the hypothesis that like L1 acquisition, there is a 'critical period' for learning a second language. The 'critical period', which we already discussed (see 2.1.3.4. above) assumes that there is a biologically-determined period when language acquisition takes place naturally and effortlessly; after that, acquisition becomes more difficult (Lenneberg 1967). This hypothesis, supported by early Chomskyan theory, was also applied to second language acquisition. Scovel (1969) for instance, suggests a relationship between lateralisation and second language learning, i.e. there is a critical period not only for the acquisition of L1 but also for the acquisition of an L2. However, the evidence brought forward by many studies shows that this is not true.

Fathman (1975) found that young children (6-10 year old) were better at pronunciation, but older children (11-15 year old) were better at morphology and syntax. Similar findings were suggested by other studies, Ramirez and Politzer (1978), and Burstall et al. (1974). Furthermore, Lenneberg's account of the process of lateralisation has recently come under fire (Krashen, 1973) and the whole concept of 'biologically' determined critical period has met with considerable evidence against it (Mc Laughlin, 1984). One alternative view to explain the alleged superiority of children over adults has been put forward by Seliger (1978) who posits the existence of many "critical periods successive and perhaps overlapping, lasting probably throughout one's lifetime, each closing off different acquisition abilities" (1978:16). Today however, researchers are examining the cognitive and affective factors in support of the critical period hypothesis. But this approach too, meets with many unresolved problems and further research is still needed to account for the causes of child-adult variations. It may well be, as Van Els et al.(1984:109) suggest that:

...not age as such, but the learning situation in combination with age-related and cognitive factors could account for the variation in success between child and adult L2 learning.

#### 2.2.3.4.2. Aptitude:

Aptitude can be referred to as the special ability involved in language learning. Alternatively it can be seen as the 'gift' or 'talent' which some learners possess to a greater degree than others. As Neufeld (1978:17) points out: "...linguistic aptitude as such exists for without it language learning as we know it would be quite impossible."



Aptitude is probably best defined in terms of the tests which have been designed to measure it. Carroll and Sapon's Modern Language Aptitude Test (1959), (or MLAT, for short), and Pimsleur Language Aptitude Battery (1966) (or LAB), are the most widely used in this field. Carroll and Sapon (1959) for instance, identify three major components of aptitude:

(i) 'phonic coding ability', which refers to the ability to perceive and memorise new sounds.

(ii) 'grammatical sensitivity', which refers to "the individual's ability to demonstrate awareness of the syntactical patterning of a language" (1959:7), and

(iii) 'inductive ability', which refers to the ability to notice and identify similarities and differences in both grammatical form and meaning.

Most of the research of aptitude in language acquisition has operated along these lines, eg Pimsleur (1964). Pimsleur et al. (1962), Gardner and Lambert (1965), Carroll (1958, 1973, 1981) and many others.

The main criticism that has been formulated against this procedure, Ellis (1985) is that it emphasises the linguistic as opposed to the communicative aspects of aptitude. On the whole, however, doubts remain about the value of such studies mainly because it is not entirely clear what cognitive abilities constitute aptitude.

#### 2.2.3.4.3. Attitude and Motivation:

Learner motivation has always had a central place in theories of second (or foreign) language acquisition. Everyday observation shows that learners who are interested in the social and cultural customs of native speakers of the language they are learning are likely to be successful. This success will be even greater if learners have a great need (social or occupational) of the language. Conversely, learners with little interest in the way of life of native speakers of the language they are learning and with low need will be less successful. Motivation and attitude are thus, closely related. (Gardner and Lambert, 1959)

Recently however, the distinctive roles of motivation and attitude have been redefined (Oller, 1977, Gardner 1979). It is now argued that attitudes are directly related to motivation which in turn is directly related to L2 learning. In other words, attitudes should be viewed as motivational supports and not as factors which have a direct effect on L2 learning. Furthermore, there are, in addition to attitude, other

motivational factors which determine motivation to learn a language, eg desire to please teachers, promise of a reward, parental approval, and so on.

Motivation is usually referred to as either 'integrative' or 'instrumental' (Gardner and Lambert, 1972). Littlewood (1984:57) defines them as follows:

(i) a learner with integrative motivation has a genuine interest in the second language community. He wants to learn their language in order to communicate with them and their culture.

(ii) a learner with instrumental motivation is more interested in how the second language can be a useful instrument towards furthering other goals, such as gaining a necessary qualification or improving employment.

Gardner and Lambert (1972) found that the former type of motivation was particularly effective in L2 acquisition. They carried a certain number of studies which aimed at investigating the relationship of attitudes and motivation to achievement. (Gardner and Smythe, 1975, Gardner et al., 1976,). These studies showed that there was indeed a high correlation between the integrative motivation of learners and their proficiency in English.

However, a different picture emerges from other studies; Clement et al. (1977) for instance, found that an integrative motivation was not strongly related to the L2 achievement of francophone subjects learning English in Canada. In another study, Gardner and Lambert (1972:130) conclude that "when there is a vital need to master a second language, the instrumental approach is very effective, perhaps more so than the integrative". Similar conclusions were made by Lukani (1972) in his study of Marathi-speaking Indian students learning English in India, and by Cooper and Fishman (1977) in their study of Hebrew-speaking students learning English in Israel: "...a basically instrumental view of English proved to be correlated to English proficiency" (1977:272).

It therefore appears from these studies that the relative importance of an instrumental motivation depends to a large extent on the context in which language is learnt.

As far as attitudes are concerned, researchers have mainly concentrated on the study of those which learners adopt towards the FL and FL speakers: Genesee and Hamayan (1980), Oller et al. (1977a, 1977b), and Gardner (1980). In many of these studies motivation to learn a FL appeared to be supported by a strong positive attitude towards the FL and its speakers.

#### 2.2.3.4.4. Cognitive Styles:



Cognitive styles in L1 acquisition have long been identified and studied by psychologists. Ausubel (1968:70) defines cognitive styles as: "...self consistent and enduring individual differences in cognitive organisation and functioning."

A fair number of cognitive styles have been identified in L1 acquisition. Ausubel (1968:71) gives a list of 18 different styles, while Hill (1972) lists as many as 29 different ones. It is not until very recently however, that researchers in FL acquisition became involved in the study of the effects of cognitive styles on the acquisition process. Of the most relevant ones which have been studied, usually in the form of dichotomies, we shall look at three major, and by far the most relevant to FL acquisition, styles:

(i) field independence/dependence

(ii) reflectivity/impulsivity, and

(iii) broad/narrow category width.

(i) 'field independence/dependence': A field independent person tends to perceive analytically, that is he tends to perceive particular relevant items in a field as discrete from the surrounding field as a whole, whereas a field dependent person tends to perceive globally, such as the parts embedded in the field are not easily perceived. So far, researchers have come up with rather conflicting evidence as to whether one or the other type has a facilitating effect on FL acquisition. Naiman et al. (1978) for instance, show in their study of "the good learner", that field independent learners were better at learning the FL. Similar findings were suggested by Tucker et al. (1976) and Genesee and Hamayan (1980). Other researchers however, have tried to show that field dependent learners in virtue of their social orientation were superior FL learners (Brown, 1977, 1980).

One interesting suggestion to explain these conflicting results was made by Brown (1980) who speculates that field independence may be more important in traditional classroom setting with a strong emphasis on analytical activities, and that field dependence may be more important in the natural setting.

(ii) 'reflectivity/impulsivity': on the basis of various studies, psychologists noticed that when confronted with a problem solving task with response uncertainty, an impulsive person tends to make a quick or gambling guess, whereas a reflective person tends to make a slower, more calculated decision. As far as acquisition of a FL is concerned however, very little research has been carried out to date to investigate the effect of this particular the effect of this particular style on the acquisition process.



Brown (1980:94) reports a study by Doron (1973) who found that adults L2 learners who had been designated reflective on the basis of a psychological test, were shown to be more accurate readers than their fellow students who have been designated impulsive. Obviously, further research is needed to investigate the implication of this particular cognitive style for FL acquisition.

(iii) 'Broad/narrow category width': this category as Van Els et al. (1984:114) point out, refers to:

...the tendency that persons have to categorize items either broadly or narrowly. Broad categorizers tend to accept a wide range of items or instances as belonging to a category, thus risking the inclusion of items that do not really fit the category, and narrow organizers tend to accept a much more restricted range, thus risking the exclusion of items that do in fact fit in the category.

It has been suggested, H.D. Brown (1973, 1980:96) and Schumann (1978d:122) that L2 learners who are broad organizers tend to produce lots of overgeneralisation errors, in that they tend to include too many items under one linguistic rule, whereas narrow categorizers have difficulty in making the generalizations necessary for efficient L2 learning, in that they create rules for every item.

Thus, attractive and promising though this line of research may seem, we can only conclude that much further research is needed to show the extent to which cognitive styles affect FL acquisition.

The present survey of the issues involved in FL acquisition research shows that, despite some interesting findings and promising lines of research for the future, researchers are still far from agreeing on what actually constitutes the most reliable data which could account for the acquisition process. This multiplicity of views, inevitably, has resulted in a multiplicity of theories and models of FL acquisition the most important of which we shall now discuss.

#### 2.2.4. Foreign Language Acquisition Models:

In this section, we shall discuss two models of FL learning which are most relevant to our work. Such a selective approach is necessary because of the multiplicity of models which, in most cases, relate to the acquisition of English in a 'naturalistic' environment (i.e. in an English-speaking environment). In this respect, we can mention for instance, the 'Acculturation Model' developed by Schumann (1978c) which tries to account for what Brown (1980:129) calls "the process of becoming adapted to a new culture". We can also mention the 'Nativization Model' developed by Andersen (1980, 1981, 1983) which builds on Schumann's views and adds a cognitive dimension, or the



'Accommodation Model' developed by Giles (1977, 1982) and his followers and which aims at investigating how intergroup uses of language reflect basic social and psychological attitudes in inter-ethnic communication.

These are but some of the models presently available which try to account for second or foreign language acquisition in natural setting. Unfortunately, of all the models presently available not only very few really have a direct relevance with the learning of English in a classroom environment, but practically none of them tries to account for individual differences in success in the FL with the exception of the two models which we shall discuss below: The Input Hypothesis, and Bialystok's model of language learning, known as the Strategy Model.

#### 2.2.4.1. The Input Hypothesis:

The Input Hypothesis (formerly known as the Monitor Model), originally stated by Krashen (1977a, 1977b) and which was later developed in subsequent writings (1978, 1981, 1982), tries to account for the learning process in a natural setting as well as in the classroom situation.

Krashen's theory is based on five main hypotheses which constitute major statements about FL development. We shall discuss below each of these assumptions.

##### *(i) The Acquisition-Learning Hypothesis:*

It states that adults have two distinct and independent ways of developing competence in a FL. The first way is language 'Acquisition': For example, the way children develop ability in their first language. Krashen (1982:10) argues that 'acquisition' is

a subconscious process; language acquirers are not usually aware of the fact that they are acquiring language, but are only aware of the fact that they are using the language for communication.

The second way to develop competence in a FL is by language 'Learning', i.e. a conscious knowledge, or as Krashen (1982:10) put it: "...in non technical terms, learning is 'knowing about' a language, known to most people as 'grammar' or 'rules'."

Central to this distinction is Krashen's contention that "learning does not turn into acquisition " (1982:83), that is, what is consciously learned does not become the basis of the acquisition of the TL.

##### *(ii) The Natural Order Hypothesis:*

This hypothesis stems from the findings in first and second language research that the acquisition of grammatical structures proceeds in a predictable order irrespective of the learner's mother tongue. It contends that FL learners will attain mastery over grammatical structures in virtually the same sequence whatever their respective native language.

*(iii) The Monitor Hypothesis:*

This hypothesis states how acquisition and learning are used in production. Our ability to produce utterances in another language comes from our acquired competence, i.e. from our subconscious knowledge. Learning, (i.e. conscious knowledge) serves only as an editor, or 'Monitor'. As Krashen (1982:15-16) put it:

Acquisition 'initiates' our utterances in a second language and is responsible for our fluency... learning comes into play only to make changes in the form of our utterance, after it has been 'produced' by the acquired system. The Monitor Hypothesis implies that formal rules, or conscious learning, play only a limited role in second language performance.

According to Krashen, Monitor use is dependent on the learner (a) having time, (b) knowing the rule, and (c) being consciously concerned about correctness. Furthermore, he suggests that individual differences in second language performance, can be explained by reference to the use of the Monitor (Krashen 1982:19-20). The extent to which learners use the Monitor will make them either (a) Monitor over-users (i.e. learners who are constantly checking their output with their conscious knowledge of the second language, who thus speak hesitantly and often self-correct), or (b) Monitor under-users (i.e. learners who prefer not to use their conscious knowledge, and (c) Optimal Monitor users (i.e. learners who use the Monitor when it is appropriate and when it does not interfere with communication).

*(iv) The Input Hypothesis:*

This states that 'acquisition' takes place as a result of the learner having understood input that contains an element not previously known. In Krashen's view, the input has to be comprehensible from familiar elements (which he symbolises 'i') while containing an unfamiliar element (symbolised '+ 1'):

... a necessary (but not sufficient condition to move from stage 'i' to stage 'i+1' is that the acquirer understand input that contains 'i+1', where 'understand' means that the acquirer is focussed on the meaning and not the form of the message.

(Krashen, 1982:21).



*(v) The Affective Filter Hypothesis:*

This states how affective factors relate to FL acquisition process. Krashen suggests that the affective variables which relate to success in FL acquisition can be put into one of the following categories: (a) Motivation, (b) Self-confidence, and (c) Degree of anxiety. This hypothesis posits that the higher the filter, the lower the acquisition will be.

Having described each of the hypotheses which constitute the Input Hypothesis, we shall now turn our attention to discussing each of them. Krashen's Input Hypothesis has not remained uncriticised. Mc Laughlin (1978, 1987), Gregg (1984), and Taylor (1984) and others, have all pointed out a certain number of weaknesses inherent to this model. Their objections will be discussed in relation with each hypothesis.

*(i) The Acquisition-Learning Hypothesis:*

The first criticism that has been made is a methodological one: since this distinction is defined in terms of 'subconscious' and 'conscious' processes which are not open to inspection, it becomes difficult to build into a theory. Furthermore, as McLaughlin points out (1978, 1987), Krashen's claim that learning cannot turn into 'acquisition' cannot be tested empirically. In fact, as Ellis suggests (1987:267), evidence which emerges from various studies (Rivers 1980, Stevick 1980, Gregg 1894) challenges Krashen's contention on the basis that when 'learned' knowledge is automatised through practice, it becomes 'acquired', i.e. available for use in spontaneous conversation. Finally, it has been pointed out (Ellis, 1987) that Krashen does not really explain the cognitive processes that are responsible either for the 'acquisition' or 'learning'.

*(ii) The Natural Order Hypothesis:*

The first criticism relates to the research methodology as pointed by Rosansky (1976) (see 2.2.1.2.1. above). The other criticism is that it is not at all clear that a reliable universal order can be deduced solely on the basis of the various morpheme studies which, themselves, show a great degree of variability in their results. Furthermore, this hypothesis does not provide any explanation as to how this natural order arises. This hypothesis, therefore remains of questionable value.



*(iii) The Monitor Hypothesis:*

Because of its implications for second and foreign language teaching, this hypothesis is probably the most discussed and criticised aspect of the Input Hypothesis. The first criticism that has been raised is, here again, a methodological one. Krashen, it is argued, does not provide any empirical evidence for the Monitor; the only evidence for Monitoring lies in the language user's own account of trying to apply explicit rules which is, to say the least, far from being a reliable basis to construct a theory upon. The other, more important, criticism is that Krashen's firm contention that 'learning' cannot turn into 'acquisition' runs counter to the beliefs of many researchers that such monitoring aids learning because gradually the use of conscious control of form leads to unconscious or intuitive control of grammatical structures. Furthermore, as Morrison and Low (1983) point out, monitoring does not account for the reception of utterances, but only to production, and it is only limited to syntax and does not take into account the collaborative activity involving both the learner and his interlocutor.

*(iv) The Input Hypothesis:*

McLaughlin (1978, 1987) gives an extensive criticism of this hypothesis. His main argument hinges on the fact that the key concept of 'comprehensive input' is untestable. Furthermore, the evidence Krashen provides in support of this hypothesis (silent period, age differences and so on) fails to provide convincing arguments in support of his assumption. Moreover, Krashen's specific rejection (1982) of the possibility that production (as opposed to comprehension) serves any purpose in FL acquisition has been strongly criticised. Swain (1983) for instance, argues that the Input Hypothesis fails to recognise the importance of 'comprehensible output', and he provides arguments to show that output is important in several ways.

*(v) The Affective Filter Hypothesis:*

The same methodological criticism which has been voiced for the other hypotheses has been raised against this one, that is to say, there is very little evidence which would support a causal relationship between the personality variables Krashen mentions and language learning. As McLaughlin (1987:55) points out: "it seems extremely premature to posit an affective filter without specifying its nature and how one is to assess its strength".

Thus, despite the fact that the Input Hypothesis can be considered as one of the most comprehensive models in second and foreign language acquisition it nevertheless is of limited value because it still remains an untestable theory.



We shall now turn our attention to the second model of FL learning, the Strategy Model.

#### 2.2.4.2. The Strategy Model:

Bialystok (1978) was among the first researcher to put forward a model of second and foreign language learning which attempts to account for individual differences in success in language learning as well as for different achievements in various aspects of FL learning. This model will be discussed at length because it represents a major innovation in the study of learners' FL acquisition and was among the first models to include learners' learning strategies which is what we are primarily concerned with.

Bialystok's Strategy Model can be best discussed by referring to the diagram she suggests (1978:71). (See Fig 1.)

The Model is organised on 3 levels:

(a) *Input,*

(b) *Knowledge, and*

(c) *Output.*

She points out that:

Each of these represent some unique stage in the learning and use of a second language the language must be experienced or encountered (Input), the information gained must be stored in some form (Knowledge), and subsequently utilized for either comprehension or production of the language (Output).

(Bialystok,1975:70)

(a) *Input:*

This refers to the "undifferentiated context in which exposure to the language occurs" (1978:71): It can be the formal classroom or reading material, or exposure to 'authentic' communication, and so on. This exposure potentially provides for three types of knowledge.

(b) *Knowledge:*

The 'information about the foreign language' (ibid:71), or Knowledge, may be represented in three ways:

**Fig 1**  
**BIALYSTOK'S MODEL (1975)**



Bialystok's Model (1975:71)

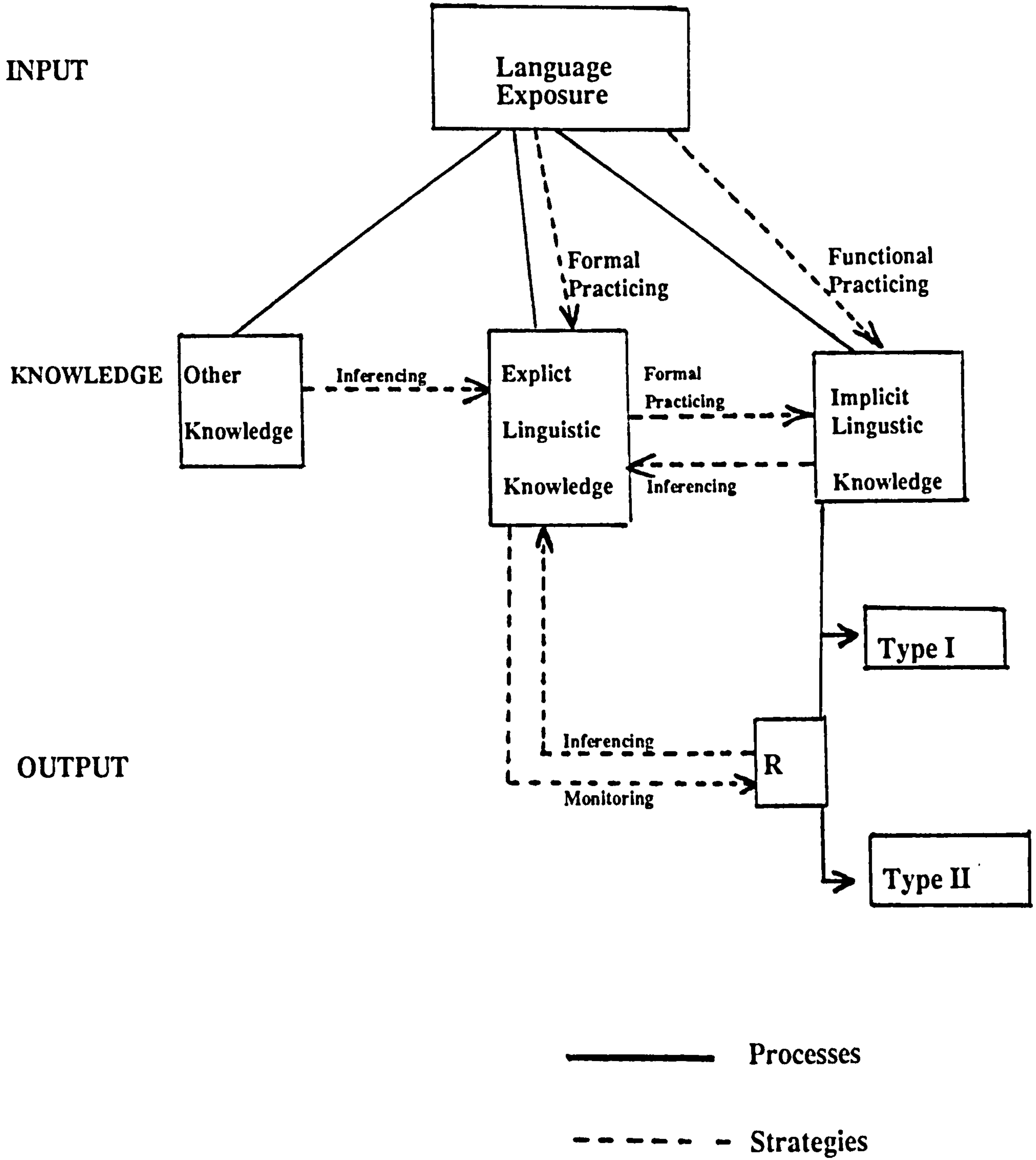


Fig 1

(i) **Explicit Linguistic Knowledge:** i.e. conscious knowledge about the language code, eg some grammar rules, vocabulary items, pronunciation rules, and so on.

(ii) **Implicit Linguistic Knowledge:** i.e. intuitive and automatic knowledge of the language. This kind of knowledge is used for instance, in cases where the learner "may claim that a sentence `sounds' or `feels' right, although no direct evidence for the correctness of the sentence could be cited " (ibid:72).

(iii) **Other Knowledge:** i.e. any knowledge relevant to the FL, eg knowledge of other languages, information associated with the FL, knowledge of the world, and so on:

The essential distinction between Other Knowledge and the two Linguistic Knowledge sources that Linguistic Knowledge contains information about the language code, while Other Knowledge contains related but not specifically linguistic information  
(ibid:74)

(c) *Output:*

This refers to the product of language comprehension or production. In the model, language Output is symbolised by a response (R), but two types of responses are possible: Type I responses are spontaneous, or immediate (eg speaking with native speakers, while Type II responses are deliberate and require time to be emitted (eg writing).

The relationships which hold between these levels are described by the processes (bold lines in the diagram) and strategies (dotted lines) of language learning.

Thus, the processes which relate the three levels are:

(a) Input processes, i.e. those relating Input to Knowledge, which may feed into each of the three Knowledge sources, but as Bialystok (1978:75) points out: "...the nature of the language exposure will determine the extent to which each of these Knowledge sources is affected."

For instance, a traditional language classroom would accentuate the line from Language Exposure to Implicit Linguistic Knowledge, whereas an immersion class would activate the line from Language Exposure to Implicit Linguistic Knowledge, and  
(b) Output processes: i.e. those relating Knowledge to Output, which describe the way in which language is used for comprehension or production (ibid : 75 )



Bialystok (1978:70) suggests that these processes are:

...obligatory relationships that hold between aspects of the model. Processing lines necessarily transfer information in the world into the representational system, which in the present model is the Knowledge level.

Strategies, on the other hand, represented by dotted lines which indicate "optional relationships", refer to the "conscious enterprises in which the language learner engages " (ibid:76). In this model they operate "...by bringing relevant knowledge to the language task that has the effect of improving performance".(ibid: 76)

Thus, Bialystok suggests the following strategies:

(a) The first two strategies are referred to as 'Practising': These strategies refer to "language learner's attempt to increase his exposure to the TL" (1978:16). She distinguishes two types of 'practising': (i) 'Formal' practising, in which learners direct their attention to learning more about the code itself (see Fig. I how this can be achieved), and (ii) 'Functional' practising, which refers to increased language exposure in order to improve communication (eg communicating with native speakers, attending films, and so on).

(b) The third strategy, 'Monitoring' is primarily concerned with language production, and is similar to Krashen's mechanisms postulated in his Monitor Theory. This strategy involves considering and modifying language behaviour based on a knowledge of the code. It is linked primarily with type II responses.

(c) The fourth strategy 'Inferencing', which applies mostly to comprehension, involves acquiring some explicit knowledge about the language code. Inferencing can be made either on the basis of Other Knowledge (eg when a grammar is inferred from knowledge of another language), or on the basis of Implicit Knowledge, or from the language Response itself, as when the meaning of a word is derived from the context in which it is being used (see Fig.I).

According to Bialystok, this model can account for individual differences in success in language learning: "Individual differences may be attributed to the extent to which various language learners use learning strategies.(1978:82)

It can also account for differentiated skill development within the same individual: "Differences between skill development may be explained by the difference in the operations associated with various tasks."(ibid)

This model, as we shall see later, will have important implications for research on learners' learning strategies.



## CHAPTER THREE

### Theoretical Background to Learning Strategies:

The study of learning strategies (henceforth LS) is part of the study of human cognitive processes which is the main concern of Cognitive Psychology. To help us understand how the interest in LS developed it is necessary to explain, albeit very briefly, what is Cognitive Psychology.

#### 3.1. Cognitive Psychology:

Cognitive Psychology can be defined as:

The science of human information processing. Its aim is to identify the cognitive processes and the knowledge that underlie the everyday activities of attending, perceiving, remembering, learning, comprehending, and problem solving.

(Wessels,1982:35)

##### 3.1.1. Historical Background:

Interest in understanding human behaviour (including how people learn) by studying mental processes and the contents of human consciousness dates back to the late 19th century. Wilhem WUNDT (1832-1920), the founder of psychology as an experimental science, conducted many experiments which anticipated the cognitive research conducted today. Wundt trained his subjects to "think aloud" as they performed mental tasks, that is, as they carried out perceptual and associative tasks they had to examine the contents of their consciousness and report on what they did and noted. In using this method of introspection, Wundt hoped to break consciousness down into its constituent elements and processes and establish their laws of connection. However, Wundt was led to discontinue his experiments because he felt that this method conflicted with his view on what should constitute a rigorous approach to empirical science and experimental study. Wundt's main concern was that: "All accurate observation implies that the observed subject is independent of the observer." (Wundt,1874)

Furthermore, he felt that higher mental processes were of too variable a character to be subjects of objective observations. The failure of this introspectionist method to provide reliable data had widespread repercussions. It prepared the way for John WATSON's radical proposal that psychology should study only behaviour and reject introspection and the study of the mind. Moreover, the publication in the 1930s of Skinner's experimental analysis, The Behaviour of Organisms, in which he proposed a new paradigm for viewing behaviour, sealed the fate of cognitive psychology.

It was therefore, until the 1960s that an interest in the study of thinking re-emerged and cognitive science, as a new and valid field of study, was born. Why, after decades of indifference, have experimental psychologists begun to devote more and more intellectual energy to the analysis of the mind? According to Johnson-Laird and Wason (1977), this was due to the confluence of theoretical concerns in several disciplines: Anthropology, Linguistics, Information Theory, and Computer Science.

Cultural anthropologists raised questions about the apparent difference in the reasoning ability of people without formal schooling in less industrialised countries and the literate populations of the more industrially advanced countries. Summing up the work of S. Scribner (1977) and others who carried out research in this field, Johnson-Laird and Wason (1977:5) suggest that: "... experimental results have revealed that the reasoning ability of people from unschooled populations is markedly at variance with those from our own culture."

In Linguistics, Chomsky in the late 1950s published several works which were to have a great impact not only on linguistic theory, but also on psychological investigations of cognition. It will be reminded, very briefly that Chomsky's main contention is that traditional stimulus-response and behaviouristic theories were inadequate in accounting for the acquisition and use of human language. Since language plays such a central role in human thought and human affairs, a theoretical approach that cannot encompass language must, of necessity, be inadequate for understanding human cognition.

In Information Theory: In the 1940s communication engineers were confronted with the problem of designing efficient systems for transmitting information, for instance, by telephone. They worked on the problem of how to transmit many messages in a communication system containing limited capacity channels (a 'channel' in Information Theory is the path along which messages travel). Having rejected the costly approach of adding channels, they tried to find ways of using existing channels more efficiently by representing or coding information efficiently.

They thus, constructed a new theory called Information Theory that helped to solve the problem of coding messages efficiently (Shannon, 1948, Shannon and Weaver, 1949). The theory defined the transmitted message in terms of information which was expressed mathematically, and emphasised the importance not only of events that do occur but also of events that could have occurred. The new questions that researchers asked, concerned the nature of human cognitive capacities. Investigators theorised about cognitive capacities by using concepts from Information Theory and Communications Engineering. Like communication engineering, humans can be



viewed as having a limited capacity. In this conception human thought involves processes more active than the relative passive formation and use of associations through contiguity, repetition and exposure to the environment, as suggested by the Behaviourists.

Information Theory led psychologists to view thought as an activity of a human information-processing system that has limited capacity, that actively converts information from one form to another, and that responds equally on the basis of its own internal knowledge and the external environment.

Finally, with the invention of the computer, psychologists were given a new metaphor with which to study the mind. For computers could do many of the same things that humans do: store, manipulate, remember and retrieve information as well as solve problems, reason and use language. The computer became far more than an impressive technological achievement, for it provided researchers with a useful conceptualisation of human cognition. In thinking, we engage in the same kinds of activities that computers do. In reading a book, for instance, we take visual information (printed words) and encode it in terms of its meaning. We remember much of the information we take in, and we may think of ourselves as storing information over time. In remembering, for instance, we call forth or retrieve previously learned information, and forgetting may be seen as the result of retrieval failures.

In essence then, it is possible to conceive of both humans and computers as systems for processing symbolic information. This is not to say that humans are nothing but computers of a particular kind, or that present computers can do all that humans do, yet it is useful for many purposes to think of human cognition in terms of information processing, by way of analogy with computers.

### 3.1.2. Its present state and views:

The essence of the cognitive approach can be summarised by considering the three major characteristics that distinguishes it from Behaviourism.

First, it emphasises 'Knowing' rather than responding. Cognitive psychologists are concerned with finding scientific means for studying the mental processes involved in the acquisition and application of knowledge. This means that their emphasis is not upon stimulus-response bonds, but on mental events of course, the cognitive approach does not ignore behaviour, but rather than being the object of study, responses are used as indicators that enable inferences to be made regarding mental events.



Second, it emphasises 'mental structure' or 'organisation'. It is argued that an individual's knowledge is organised and that new stimuli are interpreted in the light of this knowledge. This stress on organisation is particularly apparent in the theory of J. Piaget who argued that all human beings were born with an invariant tendency to organise experience, and that this tendency provides an important impetus for cognitive development.

The third characteristic is that the individual is viewed as being active, constructive and planful, rather than being the passive recipient of environmental stimulation. Whereas in behaviourist terms, humans were described as blank slates upon which the environment writes, cognitivists on the other hand, view the individual as an active participant in the process of acquiring and using knowledge. The cognitive theorist assumes that any complete theory of human cognition must include an analysis of the plans or strategies people use for thinking, remembering and understanding, and producing language.

Cognitive psychologists acknowledge that serious difficulties inhere in the objective study of states of consciousness, but feel that this approach does not present insuperable obstacles. As Ausubel (1968:4) points out:

...the attempt to ignore conscious states or to reduce cognition to mediational processes reflective of implicit behaviour, not only removes from the field of psychology what is most worth studying, but also dangerously oversimplifies highly complex psychological phenomena .

Having thus looked at the main tenets of cognitive psychology, we shall now turn our attention to discussing its views about language learning.

### 3.2. Cognitive Psychology and Language Learning:

Many researchers have investigated language learning from a cognitivist point of view (Ausubel 1963, 1964, 1968, Gagne 1965), and developed their research within the general area known as Educational Psychology, that is

...a branch of psychology concerned with understanding how the instruction environment and the characteristics of the learner interact to produce cognitive growth in the learner...it focuses on the scientific study of techniques for manipulating human cognitive process and knowledge states.

(Mayer, 1987:7)

Ausubel, a leading figure in the field, postulates a model for learning which is quite different from behaviouristic proposals. He suggests that the learning process must be one of 'meaningful learning' (Ausubel,1968:38). 'Meaning' according to Ausubel is not an implicit response, but



A clearly articulated and precisely differentiated experience that emerges when potentially meaningful signs, symbols concepts or propositions are related to and incorporated within a given individual's cognitive structure on a non arbitrary and substantive basis.

(Ausubel,ibid:8)

Central to Ausubel's theory is the distinction between 'rote' and 'meaningful' learning. He describes 'rote learning' as the process of acquiring material as:

Discrete and relatively isolated entities that are relatable to cognitive structure only in an arbitrary and verbatim fashion not permitting the establishment of meaningful relationships.

(Ausubel,ibid:8)

'Meaningful learning', on the other hand, may be described as a process of relating and anchoring new material to relevant, established entities in cognitive structures. As new material enters the cognitive field, it interacts with and is appropriately "subsumed" under, a more inclusive conceptual system. The very fact that material is subsumable - that is relatable to stable elements in cognitive structure - account for its meaningfulness.

This distinction between rote and meaningful learning, as Ausubel points out, becomes particularly important when one considers the relative efficiency of the two kinds of learning in terms of retention, or long-term memory. Ausubel argues that since rote-learned materials do not interact with cognitive structure in a substantive fashion, they are learned in conformity with the laws of association, and their retention is influenced primarily by the interfering effects of similar rote materials learned immediately before or after the learning task, whereas in the case of meaningfully learned material, retention is influenced primarily by the properties of "relevant and cumulatively established ideational systems in cognitive structure with which the learning task interacts." (Ausubel, ibid:108) Retention in this case is highly efficient.

Ausubel's theory of learning has important implications for second language learning and teaching. Within this framework, second language learning is viewed as the acquisition of a complex cognitive skill: to learn a second or foreign language is to learn a skill, because various aspects of the task must be practised and integrated into fluent performance. Too much rote activity, at the expense of meaningful communication in language classes could stifle the learning process. In a meaningful process like second language learning, mindless repetition, imitation and other rotely oriented practices in the language classroom have no place. Rote learning can be effective on a short term basis, but for any long term retention it fails because of the tremendous build up of interference. Furthermore, the implication is that the instructional materials should assist the learner to understand all that he is to learn, and to relate all new material to prior knowledge. This newly acquired knowledge must not

be learned in an arbitrary and verbatim fashion. In other words, the learner must be able, after learning, to state what he knows in his own terms. A word-for-word regurgitation is rote learning and as such not truly meaningful nor valuable to the learner's cognitive processes. Information acquired by rote does not assist the learner in acquiring additional knowledge, and it is highly unlikely to transfer to new contexts. Ausubel states that "the acquisition of large bodies of knowledge is simply impossible in the absence of meaningful learning." (Ausubel,ibid:61)

### **3.3. Cognitive Psychology and Learning Strategies:**

#### **3.3.1. Research History**

Research on LS in foreign language acquisition may be viewed as part of the general concern on mental processes and structures initiated by cognitive science. Researchers in this field aimed at investigating the role and impact of cognitive strategies in various learning tasks. Gagne (1965:138) suggests that: "cognitive strategies are internally organised skills whose function is to regulate and monitor the utilisation of concepts and rules".

Gagne then suggests (ibid:139) a list of four main cognitive strategies which people use when learning a task:

(i) Strategy in Attending, i.e. "the use of executive control skills in attending to and selectively perceiving particular parts of printed texts." (ibid :139)

(ii) Strategy in Encoding, for instance, how do people learn word-pairs.

(iii) Strategies of Retrieval, i.e. "strategies that enable people to retrieve names, dates and unconnected events from their memories " (ibid:141), and ,

(iv) Strategies in Problem Solving, i.e when people

...learn ways of exercising control over their own thought processes: how to seek relevant features of the problem, how to keep in mind what he has tried previously, how to weigh the probabilities of their hypothesis and so on.

(ibid:143)

Other researchers (Mayer 1987, O'Neil 1978) have suggested alternative classifications which either include Gagne's strategies or put forward other types of strategies. Despite these differences however, all researchers agree that learners who are confronted with a learning task do have resort to strategies which assist them in the learning process.



In addition to the role of cognitive strategies in a learning task, researchers have also pointed out the importance of learners' personal psychological characteristics and their influence on the outcome of the learning process. The role of these characteristics in the acquisition process of a foreign language has been investigated by many researchers. Gardner and Lambert (1972) for instance, initiated a whole series of studies which stressed the importance of affective factors, like motivation and attitude in the learning process. Other researchers have pointed out the importance of social factors in the learning process. Schumann (1976, 1978) for instance, looked at the influence of social factors which determine the extent to which a non-native speaker group may remain 'socially distant' from the culture of the target language group. Others, have concentrated on learners' cognitive variables which may provide a background to learning success. Thus, various studies were carried out on learners' Aptitude (Carroll, 1973, 1981), learners' Intelligence (Genesee, 1976) and learners' cognitive styles.

### 3.3.2. Clarifying terms:

It has become widely recognised that processes and strategies in learning and communication will be constitutive components of any theory of second language acquisition, and that a better understanding of processes and strategies in second and foreign language learning and communication will be highly relevant with all concerned with second or foreign language teaching.

Unfortunately, the terms 'learning strategies', 'Communication strategies', 'learning processes', and 'Communicative processes' are far from being well-defined and different authors seem to refer by them to quite different concepts. As Naiman et al. (1978:2) point out about LS: "A consensus on a definition of the term is lacking."

Several years later, Bialystok (1983:100) makes an almost identical statement: "There is little consensus in the literature either the definition or the identification of language learning strategies."

Our first aim therefore, is to look at the conceptual and terminological confusion which prevails and try to clarify these terms.

The first important distinction we shall introduce and which, unfortunately, is not always observed in the literature, is between 'learning' and 'communication' strategies. We shall first deal with the latter, as learning strategies will be discussed in detail later.



In their research, Selinker et al. (1975) for instance, use communicative tasks (picture story telling) to investigate what they refer to as 'learning strategies', such as 'over-generalisation', 'simplification', 'transfer from NL', and so on. It is not clear how one can infer from learners' linguistic behaviour on such tasks, how they learn the second language. Rather, such tasks, in our view, provide data about learners' activities in TL communication.

A similar confusion appears in Bialystok and Frohlich (1977). Even more confusing is the use of the term 'strategy' in various studies on learners' errors. These studies based on the analysis of learners' language (i.e. Interlanguage, or IL for short) have referred to universal processing strategies, such as 'over-generalisation', 'simplification', and so on, (Taylor 1975, Richards 1975) and suggested that the operation of these strategies should be considered as one cause of learners' errors and the changing nature of the learner's IL system.

It is therefore important in our opinion, to establish a clear distinction between 'Learning' which refers to:

The processes whereby the learner discovers the (pragmatic, semantic, syntactic, phonological) rules of L2 and gradually comes to master them, thereby developing a discrete IL system.

(Faerch and Kasper, 1890:51)

and, 'Communicating' in L2 which refers to "The ways the learner uses his IL system in interaction." (ibid)

Tarone (1980:76) defines communication strategies (henceforth CS) as:

A systematic attempt by the learner to express meaning in the target language in situations where the appropriate systematic target language rules have not been formed.

The study of CS was initiated by Varady (1973) who pointed out that L2 errors may arise either inadvertently or deliberately. In the case of the former, they are the result of production strategies and reflect the transitional state of the learner's L2 knowledge. In the case of the latter, they are the result of CS that are consciously employed by the learner in order to reduce or replace some element of meaning or form in his intended TL message. Subsequent research (Tarone 1980, 1981, Tarone et al. 1976, and Faerch and Kasper 1980) has mainly aimed at identifying learners' CS (eg strategies of 'overgeneralisation', 'transfer from NL', 'avoidance', 'language switch', and so on), and proposing a typology for these strategies.

All the studies mentioned above have exclusively concentrated on describing, explaining and classifying CS, while very few studies (Bialystok 1983, Haastup and



Phillipson 1983) have investigated the effectiveness of these strategies in promoting L2 communication.

Bialystok (1983) for instance, suggests that the best strategy users are those with adequate formal proficiency who modify the strategy to suit the specific concept to be conveyed. This is a neglected area in which further research is needed to bring more light on this aspect of CS.

The other issue which few researchers have investigated as well is the extent to which and in what ways do CS contribute to L2 learning? Faerch and Kasper (1980), for instance, argue that a basic condition for CS to have a potential learning effect is that they belong to achievement behaviour (i.e. 'risk-taking strategies used by the learner in his attempt to solve problems in communication by expanding his communicative resources', (1983:45), rather than reductor behaviour (i.e learners' avoidance behaviour guided by the use of CS,

...to avoid producing non-fluent or incorrect utterance by using insufficiently automatised or hypothetical rules/items, thus leading them to decide to communicate by means of a 'reduced system'.  
(1983:38)

Tarone (1980) however, challenges this view. She suggests that the conversational effect of CS in general is to enable the native speaker to help the L2 learner use the right form to say what he wants

Unfortunately, there too very little research has been carried out, thus making the role of CS in the FL learning process still highly speculative, and as Rubin (1987:27) points out "there is no evidence to date that CS contribute directly to language learning". However, unlike Rubin we shall not totally reject CS from our study because we think a clear distinction must be established between the form and the function of these strategies. Thus, it is true that some strategies may be seen at the level of form as 'communication' strategies they may well have at the level of function a potential contribution to learning and may thus be seen as 'learning' strategies. It is for this reason that we have included some CS in our eliciting instruments .

Similarly, although we shall not deal directly with what Fillmore (1976) identifies as Social Strategies, we shall nevertheless include some of these in our instruments for the same reasons. In her research Fillmore has identified these strategies as activities in which learners engage to afford them with opportunities to be exposed to and practise their knowledge as these strategies are mainly used when learners live in an environment where the FL is the medium used by the community in which the learner lives. In her study Fillmore describes a number of general social



strategies used by five Spanish-speaking children learning English in play situations with native-speaking children. To begin with, the children adopted a strategy of joining a group and acting as if they understood what was going on, even if they did not. Later, they sought to give the impression that they could speak the language by using a few carefully chosen words. They also relied on their friends to help them out when they were in communicative difficulty.

The second, similarly important clarification we shall make is between "processes" and "strategies" which are often used in an apparently arbitrary non-defined way. Some examples will illustrate this confusion. Levenston and Blum (1977) for instance, in their study of adult's lexical simplification point out that:

Simplification is understood as the act of simplifying, the strategy of communication, the process whereby meanings are communicated on specific occasions

(Levenston and Blum, 1977:52)

A similar confusion between the two terms has also been made by other researchers. Jain(1974:190) in a study of learners' errors concludes:

The learning strategy to reduce speech to a simpler system seems to be employed by every learner, both the native child and the second language learner use a developmental process of speech reduction.

Taylor (1975) also uses these two terms as synonymous when he suggests that:

Overgeneralisation and transfer learning strategies appear to be two distinctly different manifestation of one psychological process.

(Taylor, 1975:87)

and so does Corder (1977) when he points out that: "Simplification may be the result of a learning strategy or process." (Corder, 1977:12)

While these examples show the confusion which some researchers made in their indiscriminate use of the terms 'strategy' and 'process', other examples can also be mentioned which will show that the word 'strategy' has also been used by some researchers who actually meant 'linguistic rules.' For instance, Schachter (1974) suggests that:

The learner apparently constructs hypotheses about the TL based on knowledge he already has about his own language. If the constructions are similar in the learner's mind, he will transfer his NL strategy to the TL.

(Schachter, 1974:212)



This confusion between 'strategy' and 'linguistic rules' has not gone unnoticed. Some researchers suggested ways of keeping them distinct, for instance, Faerch (1979:62), and Adjemian (1976). Adjemian, for instance, points out that

Learning strategies are cognitive activities of a different kind than linguistic rules. Learning strategies are crucially concerned in the acquisition of a language system. Linguistic rules are crucially concerned in the actual form of a linguistic system.

(Adjemian, 1976:303)

We shall thus make a clear distinction between 'processes' on the one hand, and 'strategies' on the other hand. Since 'Strategies' will be extensively discussed in the next section, we shall limit ourselves here to defining 'processes'.

'Processes' is frequently used in a general sense in which it is primarily opposed to (linguistic) 'Product'. It is such a distinction that is behind claims which argue the relevance of 'processes descriptions' rather than 'product descriptions' of FL acquisition (eg Dulay and Burt 1974d). Brown (1980:136) defines 'processes' as continuing development involving a number of changes, and Klaus and Buhr (1976:990) define it as "A dynamic sequence of different states of an object or system." We shall use this term in our study as defined in the above quotes..

### **3.4. Foreign Language Learning Strategies: A Survey of the Literature**

In this section we shall carry out a detailed analysis of the works that have focussed on LS in foreign language acquisition. Such a lengthy review is necessary since our research hypotheses, the areas of learners' knowledge under investigation, and the eliciting methods we shall use spring from the suggestions, findings, and sometime shortcomings of these studies.

Thus, we shall first look at research which has investigated LS in connection with the overall process of FL learning, then we shall discuss various studies which have concentrated on the use of LS in connection with specific language skills, and finally, we shall review studies which have stressed the important role of learners' beliefs in the overall process of LS use.

#### **3.4.1. Learning Strategies in the Learning Process**

LS have been variably defined as: "techniques or devices which a learner may use to acquire knowledge" (Rubin, 1975:18) or alternatively, as "...activities in which the learner may engage for the purpose of improving target language competence" (Bialystok, 1983:101) and also, as "...operations or steps used by a learner to facilitate the acquisition, storage or retrieval of information." (O'Malley et al., 1985b:557)

Early research in LS in second and foreign language acquisition has focussed on the description of the strategies used by successful FL learners -by 'successful', it is meant better results in achievement tests. Research efforts have concentrated on the 'Good Language Learner' in order to identify the strategies either reported by learners or observed in language learning situations, which may have contributed to the success in the learning task. Thus, various studies have been carried out (Rubin 1975, Stern 1975, Naiman et al. 1978) in order to show that (a) learners did apply strategies while learning, (b) these strategies could be described, and (c) they could be classified.

In her seminal paper on the study of 'the good language learner', Rubin (1975) for instance, suggested a list of several strategies which was compiled after observing students in classrooms, talking to good language learners and their teachers, and taking notes of her own behaviour. She put forward a list of seven main strategies: (Rubin, 1975:21)

- (i) the good language learner is a willing and accurate guesser,
- (ii) he has a strong drive for communication,
- (iii) he is often not inhibited in his attempt to communicate,
- (iv) he is constantly looking for patterns in the language,
- (v) he practices,
- (vi) he monitors his own and the speech of others, and
- (vii) he attends to meaning.

Similar investigating methods have been used by Stern (1975) whose definition of 'Strategy' is made on the basis of three major problems that the learners face. The first problem is:

the disparity between the inevitable and deep-seated presence of the first language (and other languages previously learned) as a reference system and the inadequate, development of the new language as a new reference system.

(Stern, 1975:319))

The second problem is the "code-communication dilemma" (ibid): The learner has to find a way of dealing with both the linguistic forms and the message to be conveyed. The third problem is "the choice between rational and intuitive learning" (ibid): The learner must find the most advantageous route. In coping with these three problems, Stern argues, certain 'strategies' are employed. He then gives a list of ten



(10) strategies which 'good' learners use (see Appendix 1). Stern (1975:316) acknowledges the fact that: "these characterizations are highly speculative", and are in need of confirmation or rebuttal.

Building on Stern's list of LS as a frame of reference, Naiman et al. (1978) conducted research to establish 'good learners' LS. Their list (see Appendix 2) contains five broad categories of LS which learners used in the process of learning the FL.

The same findings were arrived at by Wesche (1979) in her investigation of the behaviours of successful adult language students in the Canadian Civil Service. In her article which summarises her findings, she points out that

(i) there was a greater quantity of learning behaviours pursued by those who improved most rapidly, and,

(ii) many of the observed learning behaviours occurred together. Wesche (1979:419) hypothesises that: "it may be complexes of behaviours rather than specific ones which characterise different kinds of learner."

These studies of 'good learners' behaviours have one thing in common: they were solely concerned with the description of the learning behaviours of 'successful' learners, and paid very little attention to the incorporation of the established LS into a broader framework. This has led them to put together strategies which should have been kept separate. Thus, they put together strategies which reflect learners' psychological characteristics (such as risk-taking, tolerance for ambiguity and so on), learners' communication strategies (use of gestures, circumlocutions and so on), learners' social strategies (seeking out opportunities to use language, empathy and so on), and learners' cognitive strategies (guessing, inferencing, monitoring, and so on).

Bialystok (1978) was among the first researcher to put forward a model of second language acquisition which attempts to account for the discrepancies both in individual achievement and achievement in different aspects of second language acquisition, thus accounting for both LS and CS within a comprehensive model of FL acquisition. Since we have already discussed this model in detail above, we shall limit ourselves here to discussing the implications which it had for her subsequent research. On the basis of her findings, Bialystok (1979) conducted a study in which she investigated the four strategies involved and their effects on learners' achievements. Before discussing her strategies, Bialystok establishes two parameters within which LS may be described. The first parameter, she calls 'purpose' which may be either 'functional' (i.e. refers to the use of language in communicative situation), or 'formal'

(i.e. refers to the language code). The second parameter is that of 'Modality' (i.e. whether the language is Oral or Written). Thus, if we consider the first strategy which Bialystok calls 'Practising', we can divide it into two types: (i) 'Formal Practising', which is... the specific exercise of the language code for the sake of mastering the rule system" (1979:25), and (ii) 'Functional Practising' which "occurs when the language learner increases his opportunity to use the language, for communication" (ibid)

The strategy of 'formal practising' is therefore used by a learner to increase his knowledge about the TL (eg studying from a grammar book, doing exercises, etc), and the strategy of 'functional practising' is used by a learner to increase his exposure to the TL for communication (eg going to movies, talking with native speakers, etc.)

The third strategy 'Monitoring' aims at examining or correcting the response (eg the learner re-reads what he had written and identifies and corrects grammar errors). This strategy, Bialystok points out, is derived largely from Krashen's Input Hypothesis (1977b).

The fourth strategy, 'Inferencing' was first investigated by Carton (1966). It is a strategy whereby information from several possible sources is exploited to arrive at some explicit information about the second language (eg learners refer to a speaker's gesture and the topic of the discourse to understand).

Bialystok concluded her study by suggesting that the use of these strategies had positive effects on achievement in certain kinds of tests and that only the functional strategies significantly modify performance for all tasks.

Rubin (1981) incorporated these findings in her study which she has been conducting since 1975 in order to identify the major cognitive processes used by adults learners of a FL. In this study, Rubin identifies the LS which were used through a variety of procedures. These included observation and videotapes of classrooms, observation of tutorial situations, student self-report, strip story (a reasoning task in which students identify a complex story when each has been given only a single sentence out of context), and self-report diaries (students were given explicit instructions on how to keep the diary). Rubin's findings led her to establish a distinction between 'Cognitive Processes' and 'Cognitive Strategies'. The former are defined as: "the general category of actions which contribute directly to the learning process." (Rubin, 1981:118) and the latter as: "the specific actions which contribute directly to the learning process." (ibid)

In other words, cognitive strategies represent the actual execution of cognitive processes in specific situations.



Based on her analysis, Rubin proposed a classification that subsumes LS under two broad groupings: (i) LS which contribute directly to learning, such as clarification, monitoring and so on, and , (ii) LS which contribute indirectly to learning (see Appendix 3 for an illustration of each type of LS) .

Wenden (1983a) recommends using Rubin's classification schemes in future research and proposes to refine them on the basis of the findings of new studies carried out by various researchers (Brown and Palinscar 1982, O'Malley et al. 1983) who came to recognise two major types of LS (i) Metacognitive LS and (ii) Cognitive LS. While it is difficult sometimes to separate these two kinds of LS, some attempts to do so have been made by Brown and Palinscar (1982) and O' Malley et al. (1983), Wenden (1983, 1986, 1987) and others.

Starting from the generally accepted definition of cognition as being those processes and strategies through which an individual obtains knowledge or conceptual understanding, O' Malley et al (1983) characterise cognitive LS as being:

...often specific to distinct learning activities and would include using operations or steps in learning or problem solving that require direct analysis, transformation or synthesis of learning materials.  
(O' Malley et al. 1983:24)

As for metacognitive knowledge which is a new concept introduced in the study of LS in FL acquisition, researchers have defined it in various ways. Wenden (1987;574), for instance, describes it as:

...knowledge about cognition, or the learner's naive psychology of learning... it refers to the set of facts learners, acquire about their own cognitive processes as they are applied and used to gain knowledge and acquire skills in varied situations.

Flavell (1979:906) describes it as:

that segment of your (a child's, an adult's) stored world of knowledge that has to do with people as cognitive creatures and with the diverse cognitive tasks, goals, actions and experiences.

and Brown and Palinscar (1982:1) point out that this knowledge about cognition involves: "...conscious access to one's cognitive operations and reflection about those of others; it is a form of declarative knowledge about the domain 'thinking'."

They also point out that this knowledge has three main characteristics:

(i) it is 'stable': i.e. the facts we know are a permanent part of our store of knowledge.

(ii) it is 'stable': i.e. it is available to awareness, activated as a result of a deliberate search or unintentionally and automatically by retrieval cues in the learning environment, and,

(iii) it is 'fallible', because what is known is not always empirically supportable and so may not always be perfectly accurate.

On the basis of these characteristics, O' Malley et al.(1985:24) suggest that metacognitive LS are those which are:

...generally applicable to a variety of learning tasks and include (a) knowledge about cognition, or applying thoughts about the cognitive operations of oneself and others, and (b) regulation of cognition or executive control or self-management through such processes as planning, monitoring and evaluating.

or as Rubin (1987:25) suggests; "metacognitive strategies are used to oversee, regulate or self-direct language learning."

Thus, metacognitive LS can be applied to virtually all types of learning tasks, whereas cognitive strategies are more directly related to a specific task and learning objective and may not be applicable to different types of learning tasks. Cognitive strategies involve manipulation or transformation of the material to be learned, in other words, the learner interacts directly with what is to be learned.

Wenden (1982, 1986a) examined how learners regulate their learning by planning, monitoring and evaluating their learning activities. In particular, Wenden focussed on what learners know about various aspects of their language learning and how this knowledge influences their choice of strategies. In one of her studies (1982), for instance, Wenden identified several planning strategies which students used. She also points out that students may assess their needs and preferences and choose what they want to learn, how they want to learn and how they should learn a language. This choice, as Wenden points out in a later study may be dependent upon the students' beliefs on how language is to be learned.

The value of activities in which younger and older adults reflect upon their beliefs about language learning lies in the fact that such activities can surface for examination, evaluation and possible change and/or modification of the expectations that adults learners bring to their language learning

(Wenden, 1986a : 9)



Furthermore, she also point out that learners may also choose how to use resources, and then `prioritize' the aspects of language that they want to learn. By choosing and prioritizing, students may `plan' what their LS should be and change them if they are not successful.

Building on all these findings, O'Malley et al.(1985) suggest a classification scheme that was capable of subsuming the various types of LS into three broad categories:

(a) Metacognitive Strategies, i.e. LS in which learners think about the learning process,

(b) Cognitive Strategies, i.e. LS more directly related to individual learning tasks and which entail direct manipulation or transformation of the learning material, and

(c) Socio-Affective Strategies

(see Appendix 4 for an illustration of each of these categories)

O'Malley et al.'s second finding was that students tended to use LS most often with less complex language tasks

Strategies were most frequently mentioned with relatively less conceptually complex language learning activities in comparison to the more complex activities such as analysis, inferencing and making oral presentation.

(O'Malley et al. 1985:41)

They suggest that there may be two reasons to explain why a strategy might have appeared with low frequency with a particular learning activity,

the reason... was that the activity itself occurred with low frequency in the student's experience... a second possible reason...is that complex activities require full attention and may leave little opportunity to reflect on cognitive processes that occur.

(O'Malley et al. 1985a:74)

Finally, O'Malley et al. point out that teachers were generally unaware of students' LS and rarely introduced strategies while teaching. They pointed that research in this area is warranted because:

Teachers can go beyond their traditional role of providing information and create circumstances in which students become acquainted with and apply strategies that are appropriate for the type of learning activity being presented.

(O'Malley et al. ibid:74)

It is such research that was undertaken by Oxford and which she intends to publish soon.<sup>1</sup>

Having established students' LS, O'Malley et al. set out to investigate the effects of training learners in using LS in English skills, to see whether such a training could have a facilitating effect on learning. Their study led them to conclude that results varied depending on the task (eg 'listening' or 'speaking') but generally indicated that strategy training can be effective for integrative language tasks.

Similar conclusions were reached by other researchers (Bialystok 1985, Frohlich and Paribakht 1984). In her review of the works that have been carried out in this field, Bialystok (1985:225) points out that: "...it is important to address questions concerning the effects of teaching LS on the development of certain skills."

This connection between LS on the one hand, and the development of specific language skills on the other hand, has led various researchers to investigate this point.

#### 3.4.2. LS and Language Skills

Hosenfeld (1977) was among the first researcher who reported on the reading strategies of successful and unsuccessful learners. She found that successful readers use some form of contextual guessing based on the process of inductive reasoning. This is for instance, how she characterises a successful reader (Hosenfeld, 1977:120-121).

- (i) Keeps the meaning of the passage in mind while he is reading.
- (ii) He reads (and translates) in broad phrases.
- (iii) He skips words that he views as unimportant to total phrase meaning.

Whereas a non-successful reader generally

- (i) Loses the meaning of sentences as soon as he decodes them.
- (ii) Reads (and translates) in short phrases.
- (iii) Seldom skips words as unimportant since he views words as 'equal' in terms of their contributing to total phrase meaning.

---

<sup>1</sup> Unfortunately Oxford's work (1990) was made available only after the completion of the thesis



However, Hosenfeld (1977:123) points out that:

This list of strategies of successful readers...should not be viewed as a definitive or comprehensive list, but as the beginning of a list to be completed and modified by further research.

Unfortunately, there has been until now, very few studies in this particular area of LS. Cohen and Apeh (1981), for instance, investigated the way learners learn vocabulary and participate orally in class. They identified eleven categories of association used by their learners to learn lexical items. They conclude that:

If students whatever their class level or individual proficiency used some associational patterns for learning vocabulary, the words were retained successfully.

(Cohen and Apeh,1981:225)

In another study, Huang and Van Naerssen (1987) set out to investigate the LS employed by Chinese learners of English in Oral communication. Huang's hypothesised that:

...successful Chinese EFL students ('success' is defined in terms of communicative abilities) employ certain strategies which less successful learners do not employ or employ only weakly.

(Huang 1987:28).

On the basis on their findings Huang concluded that: "...functional practice was the strategy that distinguishes successful... learners from less successful ones." (1987:297) thus, confirming her initial hypothesis.

What these studies show therefore, is that there are LS which tend to occur more often with some skills than with others, and that strategy training for a particular skill is effective in improving the performance of learners in that skill.

In all the studies we mentioned in the sections above, researchers have also mentioned the relative importance of learners' beliefs about the language learning because as Rubin (1987:19) points out "this knowledge can form the basis for selecting and activating one strategy over another ." We shall review very briefly below the work which has been carried out in this field.

### 3.4.3. LS and Learners' Beliefs

In her study, Hosenfeld (1978) referred to students' 'mini-theories' of second language learning and called for research about student assumptions, how they develop and how they operate. Horwitz (1985, 1987) was among the first researcher to carry out a systematic investigation of learners' beliefs. She developed two instruments for eliciting students' beliefs about language learning: (i) the Foreign Language Survey (or

FLAS for short), and (ii) the Beliefs about About Language Learning Inventory (or BALLI). BALLI's main aim was to assess the nature of students' beliefs in five main area (see Appendix 5) and their impact on language LS, as Horwitz points out ((1987:120) "the question raised concerns the impact that students' beliefs have on students' acquisition and use of effective language LS."

Horwitz's findings were supported by Wenden's own investigations (1986a, 1986b, 1987) on the importance of students' beliefs in approaching the task of learning a second language, and which brought further evidence that students' beliefs about language learning could influence their language learning strategies. In her study, for instance, she identified twelve explicit statements representing learners' prescriptive beliefs which she categorised into three main groups:

- (i) Using the language.
- (ii) Learning about the language, and
- (iii) Importance of personal factors.

Wenden's study has also shown that students were not only able to enumerate their beliefs about language learning, but even more importantly, they described learning strategies consistent with their beliefs. In other words, what students think about language learning can affect how they go about doing it. As Wenden (1987:109-110) points out:

Learners who emphasised the importance of using the language would often utilize communication strategies... On the other hand, learners who emphasised the importance of learning about the language tended to use cognitive strategies that helped them to better understand and remember specific items of language...

Thus, knowledge of learners' beliefs together with knowldge of other individual factors, such as their previous language learning experience, age, personality traits, and so on, will certainly help us better understand the extent to which these may affect LS use.

### 3.5. Eliciting Methods

Researchers in cognitive psychology have developed various methods to elicit learners' cognitive processes and strategies. The same tools have been used by researchers investigating LS in FL acquisition.



### 3.5.1. Eliciting Methods in Cognitive Psychology

With the resurgence of interest in studying human thinking, there has been a return to the use of verbal reports as a source of data about learning processes. In such a procedure, learners are asked to report what they are doing and take note of either 'while' they are completing a learning task, or 'just after' they have completed it, or 'sometime after' they have completed it. These reports can be made orally, in the form of interview, or in writing, in which case learners answer a questionnaire. Some researchers have also used 'Observation' as a means of eliciting learners' learning behaviours.

Not all researchers however, accept these investigation methods and some have expressed doubt about the reliability of such methods (Nisbet and Bellows 1977, Nisbet and Wilson, 1977). The question they raise is whether mental processes can be accessible to learners, and whether verbal report data can be considered accurate and comprehensive.

These criticisms however, have met with mounting counter-evidence from various studies which used this eliciting method (White 1980, Radford 1974, Ericsson and Simon 1980) and which showed that depending on the task, subjects may be successful in consulting their memory of cognitive processes and describing them. That is, they may have accessible memory for such processes and awareness of the information while the process is going on (Ericsson and Simon 1980:245-246).

What these studies point out is that poor verbal report data are often the result of poor methods of reporting. Ericsson and Simon (1980:224) give three instances where this might happen:

(i) faulty reporting can result if the information is not attended to, since for information to be available from short-term memory it must be attended to

(ii) faulty reporting can also result if not all the information which is in short-term memory at the time of reporting is actually reported, and

(iii) faulty reporting can result when not all information previously available in short-term memory has been retained in long-term memory or is retrievable from long-term memory.

Thus, as these observations show verbal report data must be collected with great care. In this respect, White (1980:109-110) put forward twelve recommendations which, according to him, the researcher should observe if his data were to be relied upon. He thus, suggests that the reporting tasks should be easy and not requiring excessive concentration and effort. He also stresses the need for the subjects and the

researcher to conceptualise the situation in the same way. White finally points out that faulty data may result from an inadequate understanding on the part of the respondents as to how they are supposed to report.

It is now widely accepted among cognitive psychologists that despite their shortcomings, verbal report data can be a useful research tool in the investigation of subjects' processes and strategies. As Ericsson and Simon (1980:247) point out:

For more than half a century the verbal reports of human subjects have been thought suspect as a source of evidence about cognitive processes... verbal reports, elicited with care and interpreted with full understanding of the circumstances under which they were obtained, are a valuable and thoroughly reliable source of information about cognitive processes. They describe human behaviour that is as readily observable as any other human behaviour.

### **3.5.2.. Eliciting Methods in the Investigation of LS in FL Acquisition**

Researchers investigating learners' LS have borrowed from cognitive psychologists their research tools and methods. Thus, they either used 'Observation' or 'Verbal report data' (and sometimes both) as a means of eliciting learners' LS .

#### **3.5.2.1. Classroom Observation**

Many researchers (Rubin 1981, Naiman et al. 1978, Cohen and Apeh 1981, O'Malley 1985) have used this method to study the LS that their subjects were using. The hypothesis behind this research is that observable behaviour will reveal the learning process.

It has become apparent however, that it is difficult to obtain accurate insights about learners' conscious thought processes through conventional observation of classroom sessions. Naiman et al. (1978) for instance, concluded after a number of hours of classroom observation, that very few learning techniques were overtly displayed in the classroom. The same findings emerge from Rubin's study (1981). She reports (1981:121) that (a) the observations were not very productive, (b) some students were better able to describe strategies than others, and (c) most students needed to be tutored to report on their LS.

Cohen and Apeh (1981) make the same point when they point out that observations in language classrooms failed to reveal much about strategies or about patterns of communication success or error correction that would signal that a strategy is being used. They also point out that they found greater success in interviewing students for strategy use. The same conclusion was suggested by Chamot (1987:76)



who pointed out that classroom observations yielded limited information about LS because: "classes tended to be teacher directed and students had few opportunities to engage in active learning with observable strategies." and she added "students interviews were extremely productive of accounts of strategy use." (ibid)

Thus, it emerges from these studies that observational techniques have many limitations and when used by themselves cannot be relied upon for reliable results. What is needed therefore, is a research tool which will allow us to get at the LS that learners use as they go about their learning task. Verbal Report data are just such a tool. A tool which allows the researcher to collect learners' reports of their own insights about the strategies they use.

### 3.5.2.2. Verbal Report Data

According to Cohen (1987) verbal report data can be classified into three basic categories:

(a) *Self Report*: this type of study refers to "the learners' description of what they do, characterised by general statements about learning behaviour or labels they apply to themselves." (Cohen,1987:132)

In this category, we can mention various studies (Hosenfeld 1977, Cohen and Hosenfeld 1981, Politzer 1983) which have tried to investigate the validity of this method. Politzer (1983:62) suggests that:

... it seems reasonable to assume that at least some of the shared variance of self-reported behaviours and achievements reflects an actual causal link between behaviour and achievements.

(b) *Self-Observation* this type of study refers to:

the inspection of specific language behaviour either while the information is still in short-term memory (i.e. introspectively), or after the event (i.e. retrospectively). (ibid)

Retrospection, can be immediate or delayed.

Most studies in the investigations of learning processes and strategies belong to this category, and all of them have used the same eliciting tools, that is either questionnaires or interviews, in order to probe into the thinking of learners who were required to retrospect about previous language learning activities.

In these investigations there has also been another eliciting method which some researchers have used (Bailey 1980, Schumann and Schumann 1977, Schumann

1978, Lowe 1987) which we have not mentioned and which is usually referred to as "Diary Studies". Bailey and Ochsner (1983:188) define a Diary Study as "an account of second language experience as recorded in a first-person journal."

In their methodological review of the diary studies, Bailey and Ochsner(1983) suggest various criteria that would make for an acceptable diary study, i.e. they tell the learner/researcher how to write up their experiences so as to make them acceptable material research. Rubin (1981), for instance, reports using direct diary studies as a means of collecting data on cognitive processes and strategies used in language learning. Other studies (Schumann and Schumann 1977) have investigated the social, psychological and personal variables that influence FL acquisition.

Despite the valuable information that these diaries could have brought to our investigation, we nevertheless found ourselves compelled not to use them for one major practical reason: These diaries usually require the constant presence of the investigator in order to check the progress of the students and to make sure that the instructions which have been given to keep these diaries are being followed. Unfortunately, since our work was being carried in Britain and require our permanent presence there, we were reluctantly led to decide not to include these diaries in our eliciting instruments.

*(c) Self-revelation:* this type of study refers to:

learners' report that is neither a description of general behaviour, nor based on inspection of specific ones...it consists of 'think aloud' stream-of-consciousness disclosure of thoughts while the information is being attended to.

(ibid:31)

Think aloud data reflect present-time within a few seconds of the occurrence of the thoughts, thus the data are basically unedited and unanalysed.

In addition to the types of verbal report data, Cohen (1987) also points out the parameters which characterise these data, and which researchers should take great care to control if they are to obtain reliable data:

- (i) the number of participants (researchers as well as respondents)
- (ii) the research context (eg in a classroom or in a language laboratory)
- (iii) the recency of the event (i.e the proximity of the verbal report to the actual learning task)
- (iv) the mode of elicitation and response (i.e whether the investigator elicits the verbal report data orally (Interview) or in writing (Questionnaire))



(v) the formality of the elicitation (i.e the degree of formal structure imposed on the elicitation by the investigator), and

(vi) the degree of external intervention (i.e. the extent to which the investigator shapes the respondent's reporting process.

Despite the general agreement that verbal data report, if elicited with care, may constitute a reliable source of data, there are some researchers who have cast doubt on the reliability of such a tool in FL acquisition studies. The main objection which is put forward is that it is questionable whether such data can be used as evidence regarding the inner workings of the learner's mind. Seliger (1983a) for instance, points out that verbal reports can be seen, at best, as a source of information on how learners 'use' what they have learnt and not as a means of describing internalised systems responsible for interlanguage performance. Seliger however, does not suggest any alternative tool to achieve such an aim.

It seems therefore reasonable to assume, despite these criticisms, and on the basis of the evidence provided by many introspective studies in cognitive psychology and FL acquisition, that learners may be successful at consulting their memory of cognitive processes and describing them. Such a success can be made even greater if the researcher takes great care in controlling all the parameters involved in his study, because as Ericsson and Simon (1980) have pointed out, poor verbal data are often the result of poor methods of reporting.

**CHAPTER FOUR****Rationale and Design:****4.1. Rationale**

Our main purpose in carrying out such an extensive review of the literature was to show how linguistic and psychological theories in first language learning (which subsequently shaped research in second and foreign language acquisition) evolved from early Behaviourism to present-day cognitive views. We paid particular attention to showing how cognitive psychology has emphasised the importance of learners' cognitive processes and strategies, as well as pointing out the extent to which learners' individual psychological and affective characteristics can influence the rate of success in the acquisition process. Furthermore, we also tried to show how some areas which until very recently were neglected, have now come to be the focus of intensive research because of their relation, albeit indirect, to the acquisition process. For instance, the nature of the 'Input', the problem of 'Maturation', and so on.

Our prime concern however, was to show that the development and findings of cognitive science were at the basis of the shift which took place among second and foreign language acquisition researchers, shift which was characterised by a renewed interest in the learners' cognitive processes and strategies which assist them in their learning task. We have paid particular attention to showing how despite the lack of agreement on a common definition, and a common labelling of the strategies among researchers they have nevertheless come to agree (i) on the existence of LS in the learning process, and (ii) on the necessity of investigating them for pedagogical purposes.

Our discussion of the various existing eliciting methods was aimed at showing that most, if not all, researchers now agree that verbal report data, despite their weaknesses remain the best tools to investigate LS.

We must point out however, that our study will vary from the works we reviewed in many respects:

(1) Most, if not all previous works on LS have been carried out in English-speaking countries (mainly in the US) where the acquisition of English can be equated to the acquisition of a second language in a natural environment, that is to say a language which is used in the learner's everyday life. Our study instead, concentrates on the acquisition of English as a foreign language which is used nowhere outside the classroom (or institution) environment.



(2) Most studies have concentrated on the study of LS at one particular level of language proficiency (either 'intermediate', or 'advanced' learners). Our study will look simultaneously at the use of LS at two distinct levels of language proficiency to see if this difference has an effect on the use of LS.

(3) Except for Oxford (1990), very few studies have looked at the possible interaction of LS with the acquisition of specific areas of the TL.

(4) No study has so far tried to compare students' and teachers' awareness of LS.

On the basis of these premises the following objectives and hypotheses have been set up for our study.

#### 4.2. Objectives and Research Questions.

Our first objective will be to identify the general patterning of the LS used by our students during the acquisition process. This will be achieved through various eliciting tools which we shall discuss later.

We must point out that we shall limit ourselves to investigating and reporting only on that subset of LS that the learner is conscious of, that is to say, we can only learn about the 'conscious' strategies that learners use in their effort to master the foreign language. It is well beyond the scope of this study to report on unconscious processes and strategies that take place in the learner's mind.

In addition, we shall try to classify the LS we have identified. For such a classification we shall use O'Malley et al.'s classification framework which they suggested in their 1985 and 1987 studies (see 3.4.1. above) and in which they distinguished three types of LS: (i) Metacognitive LS, (ii) Cognitive LS, and, (iii) Socio-affective LS (although the latter will be not be the main focus of our investigation for reasons we gave earlier, (see 3.3.2.)). We have adopted this framework because we think it accounts for learners' LS more satisfactorily than any other available model, and because it is consistent with the cognitivist approach we have adopted in our study.

Our second objective will be to look at the interaction of these LS with the acquisition of particular language skills (such as 'Speaking', 'Writing', 'Listening', and 'Reading') and various language items (such as 'Grammar', 'Vocabulary', 'Pronunciation', and so on).

Our third objective will be to look at the relationship, if any, between the learners' degree of proficiency in English and their use of LS. That is to say, whether

learners' proficiency in the TL affects the type and frequency of the LS which are used. Our assumption is that learners' proficiency may have an effect on the LS used. We must point out however, that we are well aware that learners' proficiency in the TL is not the only criterion that determines the use or non-use of learning strategies. It is quite possible that some LS may have been taught by teachers, or may have been acquired in other learning activities and then transferred to the learning of the TL. A comprehensive investigation of these factors is very difficult to carry out because of the complexity inherent to the investigation of the learners' background. Despite this difficulty however, and as a corollary to our main research, we shall attempt to gather some information on the background of our learners and their teachers.

On the basis of these objectives and assumptions, we are therefore led to formulate three (3) Research Questions:

The first Research Question, can be formulated as follows :

Since conscious learning strategies are used by all foreign language learners can we therefore establish the overall patterning of these LS, and if so will these LS fit in the classification framework we have adopted ?

Our second Research Question will be:

Can particular LS be associated with the acquisition of specific skills and language learning activities or is this occurrence random ?

Finally, our third Research Question can be formulated as follows:.

Is the productivity of LS affected by the learners' stage in the acquisition process (i.e. First or Fourth Year at University) and/or their proficiency in the FL in any given stage (i.e. 'Good' or 'Less Good' ones ) ?

### 4.3. Design

We shall now turn to discussing the parameters involved in our experiment.

#### 4.3.1. Choice of Informants:



#### 4.3.1.1. Students:

Our students are young Algerian students, aged 18-24 (see 1.3.3.3.), registered for a four-year course at the Department of English, University of Algiers, and leading to the 'Licence d'Anglais' (BA in English Studies). They are all assumed to have followed a normal schooling scheme, which implies that they would have studied English in secondary school for at least six years, before entering University.

These subjects have been divided into two main groups: In the first group (henceforth GI), there were 99 First-Year students who have been studying English at the University for a few months only.

The second group (henceforth GII), consists of 72 Fourth-Year students.

#### 4.3.1.2. Teachers

There are approximately 45 teachers, all of them Algerian, in the English Department. (see 1.3.3.2.). They will all be given a Questionnaire to which they will be asked to answer anonymously.

#### 4.3.2 Eliciting Instruments.

We originally intended to use three different eliciting instruments: (i) Questionnaires, (ii) Interviews, and (possibly), (iii) Classroom Observation.

As already pointed out, the investigation of learners' cognitive strategies has relied either on 'Observation' of learners in the execution of the learning task, or on the use of verbal report data, and sometimes on both, although the former was reported by many researchers in LS investigations as having many limitations (see 3.5.1. above). We had originally planned to use both methods in our own research although we were expecting some problems in carrying out the former.

There were two main reasons behind this choice. First, we thought that the use of both eliciting tools would have allowed us to collect the maximum amount of data about LS use among our learners, and secondly it would have increased the reliability of our findings in as much as these would have been the result of a 'triangulation' approach: First, learners would have been asked to answer in writing (through the Questionnaire), then they would have given their answers orally (through the Interview), and finally, their learning behaviours would have been observed in the classroom environment. Unfortunately, since 'Observation' turned out impossible to be carried out, we had therefore to rely on the Questionnaire and the Interview. These two instruments were

chosen as our verbal report data because of their potential contribution for cross-validation.

Our verbal report data have been collected through the use of questionnaires and interviews whose design was made on the basis of the recommendations put forward by investigators in cognitive psychology and in FL acquisition on the one hand, (see 3.5. above) and, on the other hand, by leading researchers in educational psychology (Borg and Gall, 1983 , Ary et al. (1985), Wiersma, 1986, and Borg, 1987) who set out the parameters that such tools should include, particularly in terms of validity and reliability, if they were to be considered as reliable and valid investigating tools.

These instruments were previously tried in a pilot study which was carried out in March-April 1988 with a sample of teachers and First and Fourth-Year students at the University of Algiers. The final version which we administered in our experiment and which we discuss below, is the version which we constructed on the basis of the teachers' and students' observations and recommendations.

We shall now turn to discussing each of the research tools we have designed.

#### **4.3.2. A Teachers' Questionnaire.**

The questionnaire for teachers (see Appendix 6) has been introduced because we feel that the information it will provide will help us to complement the information obtained from the students' questionnaires on the one hand, and on the other hand, inform us on teachers' awareness (or lack of it) about LS.

The following points will be investigated:

(i) General background information, with a particular emphasis on their teaching experience, their qualifications and their field of research. (Questions: 1 to 23 )

(ii) Information on their teaching practices and in particular whether they explicitly teach the use of various LS. (Questions: 24 to 43 )

(iii) Their awareness of the role of various affective and psychological factors in the acquisition process. Thus, the following factors have been included:

- Aptitude (Questions 44 - 46)

- Motivation (Questions 47 - 51)

- Difficulty in language learning (Questions 40 - 43 and 52 - 57 )



- The role of L1 (and L2) in the learning process (Questions 58 - 60 )

#### **4.3.2.2. Students' Questionnaire.**

For practical reasons, our Questionnaire has been divided into two main parts:(i) Part One (Questions 1 to 36) aimed at assessing the general background of our students, and (ii) Part Two (Questions 37 - 80) aimed at assessing their beliefs about the TL and the learning process as well as their use of learning strategies (Questions 37 to 80 ).

##### **4.3.2.2.1. Part One: Assessing Students' Background.**

We believe that information on students' background, as Cohen and Rubin (1976), and Abraham and Vann (1987) pointed out, is an important factor in understanding how FL learners confront their learning task. We therefore think that the investigation of our learners' background will give us a better understanding of their learning behaviour, and ultimately, will help us to understand their use (or non-use) of LS. (Appendix 7)

The following points will be investigated:

- (i) Their general educational and linguistic background. (Questions: 1 to 5 )
- (ii) Their previous learning of English: i.e we shall try to determine the nature of the teaching materials and teaching methods they have been exposed to before entering University. (Questions: 6 to 20 )
- (iii) Their previous encounter (if any) with LS: i.e. whether their teacher have made them aware of the usefulness of LS in aiding the acquisition process. At the same time, this section will also help us to determine the extent to which LS used by our students can be attributed to previous teaching. (Questions: 21 to 30 )
- (iv) Their reasons for choosing English as a subject: Our personal teaching experience has shown that many students study English because they have no other alternative we thus wanted to establish the actual proportion of the students involved. (Questions: 31 , 32 )
- (v) Their self-evaluation of various skills. (Questions: 33 to 36 )

#### 4.3.2.2.2. Part Two : Assessing Students' Beliefs and Their Use of LS

In addition to learners' background, their beliefs about the TL, its native speakers and the learning process itself, play an important role in the acquisition process. As already pointed out by many researchers (see 3.4.3. above), we think that determining learners' beliefs can contribute greatly to our understanding of the acquisition process. (Appendix 7)

The following points will be investigated.

(i) FL Aptitude: Are students aware that some people are likely to be more successful than others at acquiring a FL and how do they explain that ? (Questions: 37 to 41, and 57 )

(ii) Motivation: We shall try to determine how motivated our students are in undertaking studies leading to the 'Licence'. (Questions: 58 to 62 )

(iii) Difficulty in Language Learning: Students usually hold a certain number of beliefs, which may be right or wrong, about the inherent difficulty of learning English (eg length of time required, degree of difficulty compared to other languages and so on). (Questions 45, 65, 66 )

(iv) The Nature of Language Learning: We shall investigate learners' beliefs about the learning process in general, and the role English plays as a window on other cultures and people. (Questions 42 to 44, 46, 50, 51, 52 to 56,)

(v) Awareness and Use of LS. (Questions: 47, 48, 49, 63, 64, 67, 68 to 71, and 72 to 80 )

Given the length of the Questionnaire we could not include all the questions we originally intended to, so we had to include them in the Interview.

#### 4.3.2.3. Students' Interview.

The aim of the Interview (Appendix 8) which concentrates exclusively on LS will be to:

(i) Complement our findings in the Questionnaire about the existence of LS.

(ii) Help us to refine the typology of LS which our Questionnaire could have suggested



(iii) Complement the information obtained in the Questionnaire to analyse the connection between LS and specific skills: Learners will be given various tasks (Vocabulary retention, memorisation, semantic guessing, reading comprehension, and so on), and asked to comment on their LS while they are performing the task.

(iv) Look at the possibility that the learners' stage in the acquisition process may have an effect on the productivity of the LS which will be used. This will be achieved by interviewing separately intermediate and advanced students, and recording the amount of LS they use while they are answering.

The following points will be investigated:

(i) Opening questions: these are questions irrelevant to the investigation itself, but which are meant solely to make the student feel at ease. (Questions: 1 to 5)

(ii) Learning in general: This section will investigate the LS which students use in the learning process. Its emphasis is on learners' learning styles, memorisation techniques, and their ways of dealing with errors. (Questions: 6 to 22)

(iii) Learning specific language items: We shall look at the LS which students use when acquiring Grammar, Vocabulary and the Sound System. (Questions : 23 to 30)

(iv) Acquiring language skills: We shall look at the LS used in connection with the acquisition of Speaking (Questions 31 to 40), Listening, (Questions 41 to 50) Writing (Questions 51 to 57) and Reading (Questions 58 to 65).

#### **4.3.2.4. Classroom Observation:**

The Questionnaire and Interview constitute what we referred to earlier, as our verbal data. We originally hoped that these data would be complemented by some sessions of 'Classroom Observations' of our students. We assumed that despite the shortcomings and limitations of this eliciting method, its use in conjunction with verbal report data could yield interesting information.

We were quite aware, from personal experience, that there would be some difficulty in implementing it because of the reluctance that most teachers characteristically express when they are asked to allow an independent observer in their classroom. This reluctance very often becomes open refusal if the observer is going to take notes during the session. For this reason, we thought it would be a better solution if the Head of the English Department would allow us to take on some teaching sessions in 'Oral' and 'Written' English so that we may be able to observe these students during our own classroom sessions.

However, it turned out that, for practical reasons (before our arrival students were on strike for many weeks and thus failed to cover large parts of their course) neither observation of other teachers classroom sessions nor observation of our own teaching were possible. We thus had to rely exclusively on our eliciting instruments, and in particular on students answers to the open-ended questions and learning tasks which, to some extent, replaced the intended classroom observation sessions.

We shall now turn our attention to discussing the way these instruments have been constructed. We shall consider three main points: (a) the type of questions we have included, (b) the type of LS involved, and (c) the areas of language acquisition they cover.

### 4.3.3. Organisation of the Eliciting Instruments

#### 4.3.3.1. The Students' Questionnaire:

##### 4.3.3.1.1. Type of Questions Used:

We used four types of questions:

(i) Scalar: (i.e. Students were asked to classify various statements along a scale, usually from 1 (strongly agree) to 5 (strongly disagree).

(ii) Ranking: (i.e. Students were asked to rank various statements according to the importance each of them had (from most to least important.)

(iii) Yes/No/Don't know/questions: Students had to tick the statement they choose.

(iv) Multiple Choice Questions: A question was given various alternative answers, and students were asked to select one (sometimes more) particular answer(s).

These various types of questions are distributed as follows in the Questionnaire. (Table 4.1.)

SCALAR	RANKING	YES/NO	M C Q
37,38,39,40,41 42,43,44,45,46, 47,48,49.	50,51,52,53,54 55,56	57,58,59,60, 61,62,63,64	65,66,67,68,69, 70,71,72,73,74, 75,76,77,78,79, 80.

Table 4.1 Types of questions included in the students' Questionnaire.



#### 4.3.3.1.2. Type of LS Used:

In our discussion of the various LS above (see 3.4.1.) we have established two main types of strategies: metacognitive and cognitive ones. With very few exceptions, all the strategies we have included in the Questionnaire have been borrowed from the findings of previous researchers, Bialystok (1979), and O' Malley (1985), the latter in particular have suggested a list of LS which subsumes most of the strategies suggested so far by other researchers. We shall now turn to describing and defining the various strategies we have included in our Questionnaire.

##### (i) Metacognitive LS.

1) Self-Monitoring: Correcting one's speech for accuracy in pronunciation, grammar, vocabulary, or for appropriateness related to the setting or to the people who are present.

2) External Monitoring: (i.e Monitoring from an external source). These corrections are made by someone else, usually the teacher, or occasionally a native speaker.

3) Monitoring Others: Checking other people's speech to detect errors.

4) Self-Evaluation: Checking the outcome of one's own language learning against an internal measure of completeness and accuracy.

(This is summarised in Table 4.2.)

LS	Number of LS	Question Number
1)Self-Monitoring	[4]	48,49,71c,74b
2)(External) Monitoring	[2]	71a , 71b
3)Monitoring Others	[1]	63
4)Self-Evaluation	[1]	72b
	Total : [8]	

Table 4.2. : Distribution of metacognitive LS in the Questionnaire

##### (ii) Cognitive LS.

1) Formal Practising: The learner practises the language code in order to master the rule system of the foreign language.

2) Translating (from or into French): The learner uses French either to translate from English lexical items, expressions and grammar rules, or simply uses French words and expressions and applies French grammatical rules when speaking or writing English.

3) Translating (from or into Arabic): The learner uses Arabic to understand English words, expressions and grammatical rules, and sometimes uses Arabic grammatical constructions when speaking or writing English.

4) Translating (from or another language): In this case the language used is a variety of Berber.

5) Being Active: This is a risk-taking strategy in which the learner who is aware of the inadequacy of his speech (or writing) nevertheless carries on speaking (or writing). What matters for him is to convey his message irrespective of the shortcomings (lexical, grammatical etc.) of the language produced. It may also be used for 'Listening' and 'Reading', in which case the learner is trying by all means to understand what he is listening to or reading. It also involves the learner volunteering for the various activities in class. This question may be seen as a CS but because of its potential contribution to learning was included in our investigation.

6) Questions for Clarification : The learner shows no hesitation in asking for help either the teacher or another fellow student (or the speaker) to understand the language when confronted with a difficulty.

7) Resourcing: The learner uses target language reference materials (Dictionary, textbook, grammar book and other available TL materials) to help him in his learning.

8) Contextualisation: The learner places a word or phrase in a meaningful language sequence.

9) Repetition: The learner imitates a language model, including overt practise and silent rehearsal.

10) Memorising: The learner uses various techniques to memorise lists of words, idiomatic expressions grammar rules and so on.

11) Deduction: The learner consciously applies rules to produce or understand the target language.



12) Avoidance: The learner consciously avoids using a particular word or structure which he is not sure of.

13) Participating: The learner participates in interaction with others in order to increase his knowledge of the TL. This may be seen as a social strategy but is included there for reasons given above.

(This is summarised in Table 4.3.)

LS	Number of LS	Question Number
1) Formal Practising	[6]	68d,68e,68f,69f,69i,75a
2) Translating (from or into French)	[6]	67c,69c,70a,73b,76b,77b
3) Translating (from or into Arabic)	[5]	67b,69b,70a,73a,77a
4) Translating (from/into another language)	[2]	73c,77c
5) Being Active	[7]	72a,73d,74a,75b,76c,77d,77e
6) Question(s) for Clarification	[5]	78a,78b,79a,79b,79c
7) Resourcing	[5]	64,69a,69h,76a,78c
8) Contextualisation	[4]	67a,68c,69e,70b
9) Repetition	[3]	47,68a,69g
10) Memorising	[2]	68b,69d
11) Deduction	[2]	67d,70c
12) Avoidance	[2]	76d,78d
13) Participating	[5]	80
	Total:[48]	

Table 4.3. : Distribution of Cognitive LS in the Questionnaire

#### 4.3.3.1.3. Areas of Language Investigated:

The metacognitive and cognitive LS we mentioned above try to investigate various areas of language, which are summed up as follows (Table 4.4. )

Areas of Language Acquisition		Question Number
Learning in General	Learning Styles	47,48,49,63,64, 71 [3] <sup>(1)</sup> ,72[2]
Learning Specific Items	Vocabulary	69[9],70 [4]
	Grammar	67, 68 [6]
Learning Different Skills	Speaking	48,49,73[4],74[2], 75[2],76[4],79[3], 80[5].
	Listening	77[5],78[4],79[3]
	Reading	77,78.
	Writing	73,74,75,76

(1) The figure in brackets [ ] shows the number of LS this particular question contains.  
 4.4. Areas of language acquisition investigated by the metacognitive and cognitive LS included in the Questionnaire.

In answering the questionnaires students would have been made to retrospect on their learning process, and in most cases retrospection would have been delayed because the learning task(s) on which they are questioned would have taken place sometime before. We therefore needed to call upon learners' immediate retrospection and introspection when they were confronted to a particular learning task. We also had to rely on their self-report and self-observation comments during the performance of this particular task. This is why we have constructed our students' Interview.

Furthermore, the students' answers to the Interview matched with his/her answers to the Questionnaires, will, we are convinced, yield important, reliable information.

#### 4.3.3.2. The Interview:

Similarly to our discussion about the Questionnaire we shall now turn our attention to discussing the Interview in terms of (a) the type of questions used, (b) the type of LS used, and, (c) the areas of language acquisition these LS cover.

##### 4.3.3.2.1. Type of Questions Used.

In the Interview, we shall use five types of question:

(i) Scalar,

(ii) Multiple Choice Questions, and



(iii) Yes/No questions, already discussed above (4.3.3.1.1)

(iv) Open-Ended Questions: In this type of question, students are asked specific questions about the acquisition of various language items to which they can answer freely. It is hoped that from the analysis of these answers we shall find evidence for the use of LS.

(v) Tasks: Students will be asked to execute various language tasks (eg, Reading a short text, answering questions and so on) in the hope that in the course of their answers they will provide further evidence of LS use.

The last two sections of the Interview have been introduced in to the Interview to make up for the classroom observation sessions we could not hold. The following areas will be covered :

(i) LS used for the acquisition of various skills :

- a) Speaking (Question 40)
- b) Listening (Question 50)
- c) Writing (Question 57)
- d) Reading (Question 65)

For each of these skills students were given an open-ended question in which they were encouraged to list the particular strategies they normally use to help them acquire these various skills.

(ii) LS used for the acquisition of various language items. For instance ,

- a) The Sound-System (Questions 23, 25)
- b) Determining the meaning of a new word  
(Question 28)
- c) Grammar (Question 30)

For each of these areas of the FL students were also given a series of open<sup>n</sup>-ended questions in which they were encouraged to think about and suggest all the LS they normally used when dealing with these situations.

## (iii) Various practical activities :

a) steps involved in understanding the meaning of a new word (Question 26) . Students in each group were given a sentence in which we included a lexical item which they would have normally had difficulty with (This was previously confirmed by their teachers to whom we had previously submitted the examples). Thus, for First-Year students we chose the words `staggered' , while for Fourth-Year students we chose the word `setbacks'. In each case, students were asked to read the sentence for themselves first, and then tell us the steps they went through to arrive at the meaning of this particular item.

## b) Reading Comprehension :

Students in each group were given a cloze-type text which was chosen with the help of their respective teachers in order to avoid having too difficult texts (see Text I for First-Year students and Text II for Fourth-Year students in App. 8 ). Each student was first asked to read the text for himself/herself and then tell us the steps he/she went through to arrive at the answer. We must pointed out that what we were primarily interested in this section was not so much the correctness of the answer as the actual strategies which students used to arrive at that particular answer.

The procedure followed for the inclusion of each of these sections in the Interview was as follows: Each time we covered a particular area of the FL acquisition process in which students were given a series of LS to choose from, we then offered them the possibility to come up with their own list of LS which they normally used in this acquisition of this particular area of the FL.

These various types of questions are distributed as follows in the Interview. (Table 4.5.)



TYPE OF QUESTION	QUESTION NUMBER
SCALAR	6,7,8,9,10,11,12,13,14,15,17, 18,19,31,32,33,34,35,41,42,43, 44,51,52,53,54 .
MULTIPLE CHOICE QUESTIONS	21 [4] , 22 [8] , 24 [4],27[4] 29 [4], 36 [2], 37 [5], 38 [3] 39 [3], 45 [4], 46 [5], 47 [5] 49 [4], 55 [4], 60 ,61 [3], 62 [7] , 64 [4]
YES / NO	20, 58 .
OPEN-ENDED QUESTIONS	16, 23, 25, 28, 30, 40, 48, 50, 57, 59, 63, 65 .
TASKS	26 , 56 .

Table 4.5. Distribution of the various types of questions included in the students' Interview

#### 4.3.3.2.2. Type of LS used.

Similarly to the Questionnaire, most of the LS used in the Interview are based on O'Malley's list we mentioned earlier, the reason being that the Interview was primarily seen as a tool for cross-validation of the findings yielded by the Questionnaire. There were however, some strategies which for reasons we mentioned earlier, were exclusively used in the Interview.

##### *(i) Metacognitive LS:*

The first three metacognitive LS have been already discussed above. The fourth one 'Planning', which refers to the LS in which the learner is planning for and rehearsing linguistic components necessary to carry out an upcoming language task, was not originally included in the Questionnaire.

These LS are distributed as follows (Table 4.6.)

LS	Number of LS	Question Number
1) Self-Monitoring	[9]	21c, 21d, 36b, 60, 61a, 62b, 62d, 62e, 62f .
2) Monitoring Others	[11]	9, 44, 45a, 45b, 45c, 45d 46a, 46b, 46c, 46d, 46e, 46f.
3) External Monitoring	[6]	21a,21b,22a[2],22b[2].
4) Planning	[1]	11
	Total: [27]	

Table 4.6. Distribution of the various metacognitive LS in the students' Interview

(ii) *Cognitive LS:*

Similarly, some cognitive LS were not originally included in the Questionnaire mainly because of its length, have been added afterwards in the Interview.

1) **Functional Practising:** The learner uses this strategy to increase his exposure to the TL for communication.

2) **Inferencing:** The learner uses available information to guess meanings of new items, predict outcomes, or fill in missing information.

3) **Miming:** The learner uses mimicry to learn new sounds for instance, or to express something he does not have the necessary words for , hoping that the interlocutor will provide the missing word(s) and thus, learn something new. This strategy which may be seen as a social LS has been included because of its potential contribution to learning.

These LS are distributed as follows (Table 4.7.)



LS	Number of LS Question Number	
1) Formal Practising	[11]	6, 7, 10, 39a, 39b, 39c, 51, 64a, 64b, 64c, 64d
2) Functional Practising	[11]	31,37a,37b,37c,37d,37e, 38a, 38b, 38c, 42, 58
3) Being Active	[6]	8, 13, 17, 18, 19, 36a .
4) Resourcing	[9]	12, 24d, 29d, 41, 43, 49b, 52, 53, 54 .
5) Memorising	[5]	15, 27c, 29a, 29b, 29c.
6) Inferencing	[7]	20, 24a, 24b, 32, 35, 47c, 55a
7) Question for Clarification	[5]	24c, 47a, 47b,47d, 49a .
8) Translation from/into Arabic	[2]	27a , 55b .
9) Translation from/into French	[3]	27b, 55c, 61c .
10) Contextualisation	[2]	27d, 49c .
11) Avoidance	[6]	47e,49d,55d,61b, 62a, 62c
12) Miming	[2]	33, 34
	Total: [69]	

Table 4.7 Distribution of the various cognitive LS in the students' Interview

#### 4.3.3.2.3. Areas of Language Acquisition covered by these LS.

Similarly to the Questionnaire these LS were aimed at investigating various areas of language acquisition. (Table 4.8)

#### 4.3.4. Procedure:

Our discussion of the procedure will involve two aspects. First, we shall discuss the way the various eliciting instruments will be administered, and second, we shall specify the scoring procedure which will be followed in order to exploit the results which will allow us to draw our conclusions.

AREAS COVERED		Question Number
LEARNING IN GENERAL	Attitude and Motivation	6 - 13
	Memory	15
	Learning Styles	17, 18, 19, 21 [4]
	Pronunciation	24 [4]
LEARNING SPECIFIC ITEMS	Vocabulary	27 [4]
	Grammar	29 [4]
	Speaking	31 - 35 , 36[2], 37[5]
	Listening	38 [3] , 39 [3] 41 - 45 , 46 [5] ,47[5] 49 [4]
LEARNING DIFFERENT SKILLS	Reading	51 - 54 , 55 [4]
	Writing	58, 60, 61 [3], 62 [7], 64 [4]

TOTAL LS USED : 96 [89]<sup>1</sup>

Table 4.8. Areas of language acquisition investigated by these LS included in the Interview

#### 4.3.4.1. Carrying out the Experiment

(a) With the Students:

(i) *The Questionnaire:*

The Questionnaire was carried out in the period December to February 1989, and was given to all First and Fourth-Year students. However, because of its length it had to administered on two separate occasions, Part One first, followed by Part Two.

---

<sup>1</sup> The figure in brackets represents the actual maximum number of strategies students could use.



To ensure that each student's answers to both parts will, later on, be put together, we gave each student a card bearing a random number which he/she was asked to write on each Part. In addition, students were given explanations in Arabic and French about the purpose of the experiment and what was expected of them. They were also asked to keep the card with them, as their number was to be used for the Interview in which some of them were going to take part.

This procedure was already successfully tried when we carried out our pilot-study the year before. Its advantage lies mainly in the anonymity it confers to the respondents who are encouraged to answer as honestly as they can, and in the fact that it avoids having them give answers which would have been aimed at pleasing either their teacher (who in some cases, was present) or the researcher himself.

This anonymity was stressed further in the cover letter which was provided with our Questionnaire. This letter (see Appendix 7) gave them all the necessary details about the research, and thanked them for their contribution.

*(ii) The Interview:*

Because of the large number of students involved (approximately 200 students), it was practically impossible to interview them all. Thus, in order to make sure that the sample we chose in the First and Fourth year was representative of the whole population, we adopted the following procedure: Since in each Year, students were divided into four (4) different groups we decided to select in each group, five students who were at the top of their class (i.e. 'good' students) and five other students who were at the bottom (i.e. 'less good' students). This procedure allowed us to select in each Year, a total of 20 'good' students and 20 'less good' students. Thus, in this way, we only had to interview a total of 40 students in each Year, which means for both Years, we had a total of 80 students, which we think is a representative sample of the whole student population.

This selection was made possible thanks to the help of the teachers and the Department's administration which gave us access to students' records. But since students were not informed about this selection procedure they were all asked to keep the card which has been given to them for the Questionnaire so as to give the impression that the selection was random.

*(b) With the Teachers:*

Since the pilot-study we conducted with some teachers proved very successful and the rate of returned copies was we decided to give our final version of the Teachers'

Questionnaire to all forty (45) members of staff of the English Department. A cover letter was provided (see Appendix 6) to explain the purpose of the research and to reassure them about the total anonymity of their answers.

#### **4.3.4.2. Recording the Information and Exploiting the data:**

##### **4.3.4.2.1. Recording the Information:**

We have devised various instruments which allowed us to record the information yielded by the Questionnaire and the Interview.

##### **4.3.4.2.1.1. Questionnaires.**

Summary sheets (see Appendix 9 for Teachers and Appendix 10 for Students) will help us to transfer teachers' and students' responses for an immediate reading. The first column of the summary sheet is for the teacher's (or student's) number, and each remaining column is for the responses given to each question.

##### **4.3.4.2.1.2. Interview:**

An Interview guide (see Appendix 11) was established for each respondent whose answers were recorded while he/she was answering the Interview.

##### **4.3.4.2.2. Exploiting the Data:**

The exploitation procedure of our data which we shall discuss in details when we will be dealing with each eliciting instrument, will lead us to use two types of statistical tests: (i) Descriptive, and (ii) Inferential statistics.

##### **4.3.4.2.2.1. Descriptive Statistical Tests:**

We shall use descriptive statistics in order to display the important features of the data, particularly those in Part One of the students' Questionnaire, and those in the teachers' Questionnaire. We shall thus establish various tables which will show the raw data in a systematic form (i.e. frequency distribution), then we shall summarise all the important features of the data using numerical indices (Mean, Standard Deviation)



#### 4.3.4.2.2. Inferential Statistical Tests.

As Miller points out (1974:66):

...statistical inference seeks to go beyond the mere description of experimental data, and to establish the cause of the difference between the results of the experimental groups.

We shall use a t-test to determine whether the learners' stage in the acquisition process and their proficiency in any one stage has an effect on the productivity of the LS used .

Our test will be a two-tailed one, and we shall not consider our results significant unless the significance level is below five per cent.

## CHAPTER FIVE

### RESULTS and DISCUSSION

#### 5.1. Results

##### 5.1.1. The Teachers' Questionnaire

We shall first look at the results we obtained after the analysis of the answers and then we shall discuss their implications. For practical reasons, we have decided to include all the result tables in the Appendices section, because there are too many of them. However, in order to help the reader retrieve easily any table related to a particular question, we have provided below a table (Table 5.1) which gives a clear indication of the Appendix and Table numbers corresponding to each particular question.

##### 5.1.1.1. Results

The first section of the Teachers' Questionnaire (Questions 1 to 24) covers various aspects of their general background. When discussing the results we shall mention various percentage figures which represent the actual number of teachers who selected a particular answer. To enable the reader to establish the actual number of teachers which corresponds to a given percentage figure we have provided in App. 12 a Table of Correspondence for each of the percentage figures mentioned.

##### *(i) Age and Sex (Questions 1 and 2):*

The majority of teachers fall in the 30-40 age group (App.13 Table 1). If we include in this group the teachers whose age group is between 40 and 50, we shall see that 30 of them (76 per cent of the staff) are aged between 30 and 50, which means that the Department has a relatively young staff, and as Table 2 (App.13) shows, they are, in their majority, female.

##### *(ii) Previous teaching experience in secondary school: (Questions 3 to 5).*

To our surprise only 6 teachers (i.e. 15 per cent) said they had previously taught in a secondary school before joining university. (App. 13 Table 3) and that their average teaching experience ranged from 3 to 5 years (App. 14 Table 4 ). This suggests



that the majority of teachers have started teaching at university level just after they finished their postgraduate studies.

Question Number	App. Number	Table Number
1	13	1
2	13	2
3	13	3
4	14	4
5	14	5
6	14	6 and 7
7	15	8
8	15	9
9	15	10
10	15	11
11	16	12
12	16	13
13	17	14
14	17	15
15	17	16
16	18	17
17	18	18
18	18	19
19	19	20
20	19	21
21	16	13
22	19	21
23 and 24	19	22
25	20	23
26	20	24
27	20	25
28	20	26
29	21	27
30	21	28
31	21	29
32	21	30

Table 5.1 Appendix and Table Numbers Corresponding to each Question in the Teachers' Questionnaire

33	22	31
34	22	32
35	22	33
36	22	34
37	23	35
38	23	36
39	23	37
40	23	38
41	24	39
42	24	40
43	24	41
44	25	42
45	25	43
46	25	44
47	26	45
48	26	46
49	26	47
50	26	48
51	27	49
52	27	50
53	27	51
54	27	52
55	28	53
56	28	54
57	28	55
58	28	56
59	29	57
60	29	58

Table 5.1 (cont.) Appendix and Table Numbers

Corresponding to each Question in the Teachers' Questionnaire

*(iii) Degrees and Qualifications (Questions 6 to 11):*

Most teachers, (25, i.e. 65 per cent) hold the Magister or an equivalent degree (eg M. Phil. or French Doctorate). Only a small minority (6, i.e. 15 per cent) hold a Ph.D. or equivalent degree. Some teachers (8, i.e. 20 per cent) reported holding a B.A. only. These are in fact, assistant-teachers who are registered for the Magister degree



and to whom the Department has offered a few teaching hours (usually 5 to 6 hours) in their respective research field. (App.14 Tables 6 and 7).

As for the countries where these postgraduate degrees have been obtained (App. 15 Tables 7 and 8), they are principally Great Britain. (24 M.Phil. and 5 Ph.D.), and the U.S. (1 Ph.D.). These are the same countries to which most teachers have been, at one time or another, for a short course in their respective subject. (App. 15 Table 9 and 10).

Despite what one may see as a high level of qualification of the staff, very few among them have had any training in educational psychology nor in pedagogy (App.16 Table 12). Only 8 teachers (20 per cent) said they had specific training in this field. This confirms our earlier suggestion that most teachers have started their teaching career at university level without having attended a specific teacher-training course.

*(iv) Subject(s) taught and research interests: (Question 12 to 16)*

We were fortunate enough in our enquiry to gather answers from teachers of all the subjects taught in the English Department. The distribution of the teachers according to the subject(s) they teach is shown in App.16 (Table 16). The comparatively higher number of teachers in Linguistics and other related subjects (Phonetics) shows the emphasis which the syllabus puts on these areas of language teaching. As for their research interest(s), if we exclude the teachers who are registered for the Magister (App.17 Table 14), and those who are registered abroad (App 17. Table 16) for a postgraduate degree abroad (App. 18 Table 17), only 9 teachers (23 per cent) said they were engaged in some form of personal research: 5 of them were working as a team to produce a literature textbook, 2 other teachers said they were each writing a book, but did not say which ones, and 2 others said they were carrying out a personal research project in Applied Linguistics. (App.17 Table 15.).

*(v) Subject(s) taught and teaching experience in this field: (Questions 17 to 24).*

In addition to having teachers from all the subjects taught in the Department, we also had samples of teachers from the First to the Fourth Year. Thus, we had 12 First-Year teachers, 10 from the Second, 11 from the Third and 6 from the Fourth Year (App.18 Table 18). Their teaching experience at university level ranged from 5 to 20 years (App.19 Table 20), the majority however, 19 of them, (i.e. 48 per cent) had between 5 and 10 years experience. A very small proportion, only 4 (10 per cent), said they had taught in other institutions, mainly in ESP (i.e. English for Specific Purposes) (App. 19 Table 22).

The second section (Question 25 to 39) of this Questionnaire was aimed at investigating their teaching practice(s) as well as their awareness about the usefulness of giving students various 'tricks' (i.e. LS) which would help them in the acquisition process. We shall look now at each of the points which were included.

*(i) Use of Arabic or French in class and whether any feedback investigation has been carried out: (Questions 25 to 29)*

Teachers at secondary and university levels have specific official instructions to use neither Arabic nor French as a medium of instruction for the teaching of English. Translation, even as a classroom exercise, is banned from all classes. Given this fact, we nevertheless knew from personal experience that teachers did use at least one of these two languages in their class on various occasions, and therefore we tried to discover the extent to which they did so. Thus, our results show (App.20 Table 23) that although no teacher uses any of these languages on a regular basis, they nevertheless acknowledge, in their majority, that they sometimes had resort to one of these languages. The occasions on which they did (App. 20 Table 23) could mainly be linked to their desire to save time in class: for example to explain difficult abstract words or technical and scientific items, and less often in Reading. On the whole thus, the use of either French or Arabic was only seen as time-saving device. When asked about whether they carried out any feedback investigation to give their students the opportunity to evaluate the content and methods of their teaching, very few said they did: Only two teachers said they did so (App.20 Table 25) and both admitted that this had helped them a lot in bringing in some changes to the content of their course, and to some extent, to their teaching approach (App 20 Table 26). The majority of those who did not carry out such an investigation (i.e the 'Don't' knows', App.21 Table 27), admitted in private conversation, that even if they wanted to, they would not know how to design an efficient questionnaire to implement it.

*(ii) Do they give their students specific 'tricks' for:*

*(a) Memorising various language items (Questions 30 to 33)*

As expected, very few teachers said they gave their students some 'tricks' or 'techniques' which would assist them in memorising various linguistic items (App.21 Table 28): only 10 (i.e. 25 per cent) said they did so sometimes, while the majority (29, (i.e. 74 per cent) admitted they never did. Those who did usually showed their students various ways in remembering the meaning or pronunciation of a difficult word, or the date of an important historical event (App.21 Table 30). We must point out however, that there was a striking contradiction in teachers' attitude regarding this particular



point. For, when they were asked if they thought that the use of such tricks could contribute to facilitating the learning process, 15 teachers (i.e. 38 per cent) (App. 21 Table 29) said they did.

(b) Expressing themselves (Questions 34-35 and 39):

A pattern similar to the one described above emerges: very few teachers actually give their students any trick at all to help them express themselves. Out of the 21 teachers who said their teaching was related in one way or another to teaching 'Speaking', only 6 said they often did, while 8 others said they did so only sometimes (App.22 Table 32). Additionally, they were asked whether they drew their students' attention to the importance of gestures in conversation: only 5 teachers said they sometimes did, while the others admitted they never did so (App.22 Table 33). The only instance where the majority of the teachers said they did teach their students specific tricks, was in showing them how to ask for clarification from their interlocutor when they found themselves in difficulty (App.23 Table 37).

(c) Writing (Questions 36, 37):

Teachers seem to be more aware of the importance of helping students with their writing. Thus, when asked for instance, whether they showed their students how to use dictionaries and reference materials 9 out of the 15 teachers involved, said they sometimes did (App. 22 Table 34). Similarly, when asked whether they showed their students how to write in various styles, 12 out of the 18 teachers admitted they did (App. 23 Table 35).

(d) Reading (Question 38):

Reading as a specific subject does not exist in the syllabus of the 'Licence'. Teachers have always been left to decide for themselves how best to approach this skill. Judging from the answers given by the teachers who are in one way or another, involved in the teaching of this subject, we can see that many among them (App. 23 Table 36) said they tried to help their students by giving them various techniques which could help them improve their reading ability.

The third and final section of this Questionnaire was aimed at investigating the teachers' beliefs about and attitude towards the learning process in general, as well as their awareness about the importance of various learners' affective and psychological factors in the learning process. We shall discuss each of these two points below.



*(i) Beliefs about and Attitude towards the learning process:(Questions 40 - 43 , and 52 - 57 )*

In this section we were primarily concerned with the effect these beliefs could have on their own teaching practices. Thus, when we asked them whether they would interrupt a student to correct his erroneous speech: 16 teachers (i.e. 41 per cent) said they would, while 23 (58 per cent) said they would allow their students to finish speaking and only then would they correct the error(s) (App.23 Table 38). However, when they were asked whether they believed that allowing students to make errors could contribute to improve their fluency in the FL, only 9 said it would, while the majority, 30 (i.e. 76 per cent) expressed the opposite view (App.23 Table 39). This 'traditional' attitude towards errors was strengthened by their answers to the following question in which they were asked if they believed that it would be better for their students not to say anything rather than produce erroneous English: the overwhelming majority, 30 teachers (i.e. 76 per cent), agreed (App.24 Table 40). This view was further reinforced by their answers to the next question with which 34 teachers (i.e. 87 per cent) agreed that it would be better for their students to speak or write very little but do it accurately rather than speak or write extensively but in erroneous English (App 24 Table 41).

Having looked at errors, we then looked at their attitude towards the learning process in general and the acquisition of various language skills in particular. When they were asked to say if they thought that English was an easy language when compared to other foreign languages available in the Institute (German, Russian, Spanish), opinions were divided: 24 teachers (61 per cent) said they thought it was, while 15 (i.e. 38 per cent) thought it was not (App. 27 Table 51). The same question about the degree of difficulty was asked about the various skills, and there a widely held agreement that 'Writing' was the most difficult skill for their students to acquire. Thus, on the basis of the answers we obtained this is how teachers would rank the various skills in decreasing order of difficulty: First, and therefore most difficult skill to acquire, 'Writing', followed by 'Reading', 'Speaking' and finally, 'Understanding' (i.e. Listening Comprehension) (App.27 Table 52).

Further evidence for the degree of difficulty which 'Writing' represents for their students can be found in the teachers' answers to the next questions about understanding and producing written English: 34 teachers (87 per cent) said that understanding written English was the most difficult skill for their students to acquire (App.28 Table 53), while 35 (89 per cent) said that it was more difficult for their students to produce written English than to understand it (App.28 Table 54).



*(ii) Awareness of various affective and psychological factors: (Questions 44 to 49)*

Their awareness of their students' Attitude (Question 44-45) and Motivation (Question 46 to 49) were the two main factors we investigated. Thus, there was a unanimous agreement among teachers (100 per cent) that some students were better at learning English than others (App. 25 Table 42). When asked to give the reason(s) the majority (28 teachers, i.e. 71 per cent) attributed it principally to learners' motivation (App. 25 Table 43). When further questions about the type of motivation, i.e. integrative or instrumental (see 2.2.3.4.3. above), they thought was involved, the majority of the teachers mentioned the former: They pointed out that their students showed great interest in having penfriends in Britain and in watching, whenever possible, English films and TV programmes (App.26 Table 45).

Similarly, most teachers agreed that their students were more interested in the Anglo-Saxon way of life and culture (App. 26 Table 46) than in other Third-World English-speaking countries (App.26 Table 47). As for their students' future job prospects, most teachers (25 teacher, i.e. 64 per cent) were convinced that because their students were studying English, a language very high in demand, they had thus better job prospects than other students in the Arts and Social Sciences (App.27 Table 49). However, when asked whether their students were worried about finding a job (28 teachers, i.e. 71 per cent) said they did not know, only 3 said their students were actually worried (App.26 Table 47).

The last three questions were devoted to the investigation of their awareness about the role of the mother tongue (Arabic) as well as the role of their students' second language (French) in the learning process, and the extent to which one or both, interfered with the acquisition of English. Judging from their answers we can say that most teachers (28, i.e. 71 per cent) agree that students with a bilingual background (i.e. fluent in both Arabic and French) did occasionally perform better at learning English than monolingual ones (App. 28 Table 56). But when it comes to determining which language interferes most with the acquisition of English, opinions seemed to be equally divided: 31 said they thought Arabic did interfere sometimes (App. 29 Table 57), while at the same time 27 said that French too, did interfere sometimes with the acquisition of English (App.29 Table 58 ).



### 5.1.1.2. Conclusions:

We shall now discuss the conclusions these findings suggest.

First, in terms of the teachers' general background : The staff in the English Department is relatively young and largely female. Very few teachers have had previous teaching experience in secondary education, nor have they attended any specific teacher-training course. Although their degrees and qualifications appear to be, in most cases at least, of relatively high standard and acquired mostly in English-speaking countries, one cannot help to think however, that the lack of previous teaching experience and/or specific training in educational psychology and pedagogy could have impaired, at least in the first few years of their teaching career, the efficiency of their teaching. However, most of the teachers said they had attended at least one short course abroad in their respective field. These are courses which are usually held by the British Council in Britain in summer. Interesting and useful as these may be, they nevertheless cannot compensate for their lack of experience and/or training.

On average, the teaching experience of the majority of teachers does not exceed ten years, which is a relatively short period if one takes into account the fact that the English Department has been in existence for nearly thirty years. As for teachers who, in one way or another, are involved in some form of research, their number may seem relatively small, but when replaced in the general social, economic, and academic environment in which teachers work, it becomes easily understandable : There are so many difficulties of all sorts that in the long term most of them simply give up.

Second, in terms of the teachers' teaching practices, including the use of learning strategies and their attitude towards the learning process: Their rejection of Arabic and/or French on a regular basis in their teaching was expected. Most of them acknowledged using either or both of these languages only as a time-saving device. Teachers in their majority have also acknowledged the fact that to some extent, they were aware of the existence of learning strategies, but they did not teach them to their students, except on rare occasions and in most cases, only incidently. This is a surprising attitude because many among them acknowledged the fact that the teaching of various learning 'tricks' (by which we meant strategies) could improve greatly the acquisition process. As for their attitude towards learners' errors, it can be qualified as 'traditional' in as much as their teaching emphasises correctness at the expense of appropriateness. Furthermore, most teachers still believe in the efficiency of a 'grammar-based' approach in which accuracy is more important than communicative ability.



Third, in terms of their awareness of various affective and psychological factors. Most teachers believe that their students are highly motivated in acquiring knowledge about the way of life and culture of native speakers, hence their great interest in watching English films and TV programmes, and in establishing contacts with penfriends. They also believe that their students have better job prospects than other students from the same faculty, which to some extent is quite true. Teachers nearly unanimously agree that motivation is a determining factor in the acquisition of a FL, and they believe that the higher this motivation is the better the students will learn the language. As for the role of the mother tongue or the second language in the acquisition process, most teachers believe that students have the same chances of learning English, and that interference from either language is, to varying extent, common to all learners irrespective of their linguistic background.

### **5.1.2. The Students' Questionnaire:**

As already pointed out, this Questionnaire was divided into two different parts which were administered on two separate occasions: Part One (Questions 1 to 36) which dealt mainly with the investigation of the students' background, and Part Two (Questions 37 to 80) which was mainly concerned with the students' beliefs and their use of LS. We shall discuss each part separately.

#### **5.1.2.1. Part One: Students' Background**

Similarly to the Teachers' Questionnaire we shall first look at the results and then, discuss their implications.

##### **5.1.2.1.1. Results**

The investigation of our students' background concentrated on five different but related areas which we shall discuss under five main headings. Similarly to our discussion of the Teachers' Questionnaire and in order to ensure the normal flow of text, we shall include all our result tables in the Appendices section, and in order to help the reader find the appropriate Appendix and Table numbers which corresponds to any particular question, we have provided Table 5.2 below. In addition, we have provided the reader with a Table which gives the number of students which corresponds to each of the percentage figures we shall mention (Appendix 30).

The first section (Question 1 to 5) was aimed at establishing the general background of the students. Thus, we first looked at their age. Our results show that the average age among First-Year students (henceforth GROUP I, or GI for short) is 21, and for the Fourth Year, 24 (henceforth GROUP II, or GII) (App. 31 Table 1). In both

Years more than 70 per cent of the students were female (App. 31 Table 2). The majority of students in both GI and GII come from Algiers or its immediate surroundings, and have followed all their secondary education in the same school (App.31 Table 3)

Question Number	App. Number	Table Number
1	31	1
2	31	2
3	31	3
4	32	4
5	32	5
6	32	6
7	33	7
8	33	8
9	33	9
10	34	10
11	34	11
12	34	12
13	35	13
14	35	14
15	35	15
16	36	16
17	36	17
18	36	18
19	37	19
20	37	20
21	38	21
22	38	22
23	38	23
24	39	24
25	39	25
26	39	26
27	39	27
28	40	28
29	40	29
30	40	30
31	41	31
32	41	32
33	41	33
34	42	34 and 35
35	43	36 and 37
36	44	38 and 39

Table 5.2 Appendix and Table Numbers Corresponding to each Question in the Students' Questionnaire (Part One)



The investigation of their linguistic background showed some rather unexpected features. Thus, most students, (65 per cent in GI and 64 per cent in GII), said they could read French more easily than Arabic, and could also write it more fluently (App.32 Table 4).

In 'Reading', only 4 per cent in GI and 1 per cent in GII said they found French difficult to read, but 23 per cent and 22 per cent for each group respectively, said Arabic presented them with the greatest difficulty. The same pattern emerged for 'Writing': 22 per cent in GI and 31 per cent in GII said they found Arabic most difficult to write, while only 4 per cent and 9 per cent for GI and GII respectively said they had great difficulty with French.

The last point in this first section was devoted to investigating whether students had any choice in secondary school between English and others foreign languages: Only 2 per cent in GI and 20 per cent in GII (App.32 Table 5) said they had, which means that the majority of the students had to study English in secondary school because they had no other alternative. The implication of this point will be discussed later.

In the second section ( Questions 6 to 20 ) we looked at various aspects of the students' previous learning experience of the English language.

*(i) About their teacher(s) (Questions 6- 9)*

Very few students in both years had the opportunity to study English with a native speaker: only 17 per cent in GI and 19 per cent in GII said they had ( App.32 Table 6 ). However, as we shall see later in our discussion, these figures may be misleading because the nationality of the teachers involved was neither British nor American. When asked how often their Algerian teacher(s) used English in class, there was a great agreement among students in both groups: Thus, only 15 per cent in GI and 16 per cent in GII said their teacher used English all the time in class, while 80 per cent and 70 per cent in GI and GII respectively said their teacher did so most of the time (App.33 Table 7), implying thereby that their teachers did have resort to either Arabic or French in class on some occasions. When asked specifically how often their teachers had resort to translation in either language, 22 per cent in GI and 21 per cent in GII said they often did, while 63 per cent and 68 per cent in each group respectively, said their teachers did so only occasionally (App.33 Table 8). The circumstances in which either language was used were mainly related with 'Speaking' and to a lesser extent, with 'Reading' (App.33 Table 9).



*(ii) About the availability of various learning aids: (Questions 10 - 13 and 20)*

Our aim in asking these questions was to find out whether various supplementary educational materials were available to students or not, and if any, to what extent their teachers encouraged them to make use of them. It emerges from the students' answers that there were very little of these in their immediate environment. For instance, 41 per cent in GI and 47 per cent in GII (App.34 Table 10) said they had access to such materials in their own school or its immediate surroundings; And when asked if they ever had the opportunity to listen to radio broadcasts in English or watch English films and/or TV programmes, only 9 per cent in GI and 6 per cent in GII said they often had, while the majority, i.e. 46 per cent in GI and 50 per cent in GII, (App.35 Table 13), said they never had. Despite the availability of these materials for some however, teachers seem to have made very little use of them: Only 15 per cent in GI and 10 per cent in GII said they often were, but 59 per cent and 52 per cent in GI and GII respectively said their teachers never did (App.34 Table 11).

*(iii) About classroom activities (Questions 14 - 19):*

In this section we wanted to know the kind of classroom activities language teachers mostly concentrated on so that ultimately, we may be able to find out if teachers introduced their pupils to the use of various learning strategies, and if they did, to what extent they did so.

It emerges from students' answers that the most common activity which their teachers concentrated on in class was 'Speaking' (60 per cent in GI and 58 per cent in GII), followed by 'Listening', 'Reading', and 'Writing' (App.35 Table 14). The activity which most teachers seem to pay least attention to turned out to be 'Pronunciation' (i.e. explicit phonetic lessons). We then tried to see whether their teachers used exclusively the textbook which the school had provided them with or whether they used additional materials: 55 per cent in GI and 54 per cent in GII said their teachers used only the textbook, while 44 per cent and 31 per cent for GI and GII respectively, said their teachers used other additional materials in class (App.35 Table 15).

The next set of questions was aimed at investigating the specific language activities which teachers concentrated on in their classes. Thus, we asked them to say how often their teachers required them to memorise various items 'by heart': 16 per cent in GI and 19 per cent in GII said they often were, while 44 per cent and 51 per cent for GI and GII respectively, said they also were, but only sometimes (App.36 Table 16). We then tried to know the kind of language items teachers usually asked them to



memorise: 90 per cent in both GI and GII said 'Irregular Verbs', followed by 'Lexical Items' and 'Parts (or whole) of a Dialogue' (App. 36 Table 17).

As for the specific type of exercises which teachers used in class, it emerges that they gave very little attention to activities like 'using a dictionary', or 'how to make exposes and activity reports'. The type of exercise which seems to have been mostly used however, is the use of idioms and idiomatic expressions.

The third section thus, was primarily concerned with the investigation of LS use in these classroom activities.

*(i) In 'Reading' and 'Writing': (Questions 21 - 25)*

Very few students (17 per cent in GI and 7 per cent in GII) said their teachers often gave them hints on how to read a text quickly, the majority (41 per cent and 47 per cent in GI and GII respectively) said their teachers actually never did (App.38 Table 21). Even fewer students said they were given hints on how to deal with a technical or scientific text (App.38 Table 22). In 'Writing', the same pattern emerges: Very few hints were given to learners on how best to take notes during a lecture for instance: only 6 per cent in GI and 7 per cent in GII said their teachers did, which means that the majority of the learners were never given any guidance about this particular point (App. 38 Table 23). The only exception however, turned out to be with letter writing: 56 per cent in GI and 50 per cent in GII said their teachers did give them hints on how to write different types of letters (App.39 Table 24).

*(ii) In 'Speaking' and 'Listening' (Questions 26, 27, 29, and 30)*

When asked if they were given hints on what to do in case they were involved in a conversation and found themselves unable to understand the speaker, only 24 per cent in GI and 20 per cent in GII, said they were (App.39 Table 26). Similarly very few students said they were given any hint on what to do when they were unable to find a word or expression they wanted to use in a conversation: only 34 per cent in GI and 36 per cent in GII said their teachers did so (App.39 Table 27). The only instance in which teachers seemed to be aware of the importance of teaching such 'tricks' was related to the acquisition of 'Irregular Verbs': 60 per cent in GI and GII said their teachers had given them specific hints on how to memorise these items (App.40 Table 28).

A similar attitude emerges in the way their teachers' dealing with 'Listening Comprehension'. For instance, only 32 per cent in GI and 19 per cent in GII (App.40 Table 29) said their teachers had given them hints on the kind of information to concentrate on when they were listening to a tape, thus leaving the majority of students

with no specific guidance in this area of the language. But judging from the students' answers, it seems that many teachers tried to draw their students' attention on the importance of gestures in communication: 46 per cent in GI and 40 per cent in GII said their teachers had given them hints on this point (App.40 Table 30).

The fourth section of the Questionnaire (Questions 31 and 32) is to be seen as a source of complementary information to answers given earlier by these students (see discussion of Question 5 above). We were primarily interested in evaluating the extent of students' motivation as well as their and reason(s) for choosing English, and their views about their future job prospects. We assumed from personal experience that a sizeable proportion of students were studying English merely because they had no other alternative. It turned out that only 17 per cent in GI and 18 per cent in GII said they were in the English Department because they had no other alternative (App.41 Table 31) implying thereby, that the majority were studying English because they chose to do so. As for their views about their future job prospects, 60 per cent in GI and 63 per cent in GII, said they intended to teach, while 20 per cent and 21 per cent in each group respectively, said they intended to carry out postgraduate studies. A small proportion of students (15 per cent in GI and 11 per cent in GII) said they still did not know what they would do (App.41 Table 32).

The last section of the Questionnaire (Questions 33 to 36) was aimed at investigating the students' evaluation of themselves at acquiring various language skills, as well as their likes and dislikes of various aspects of language learning. For instance, when students were asked to give an assessment of themselves as learners, only 1 student in both GI and GII said they thought they were 'excellent' learners, while the majority (65 per cent in GI and 72 per cent in GII) said they thought they were only 'fair' learners. A small proportion of students (19 per cent and 23 per cent in each group respectively) said they thought they were 'good' learners. (App. 41 Table 33). The same general pattern emerges when students were asked to give their own evaluation at learning various skills, evaluation which ranged from 'excellent' to 'poor': In GI for instance, only one student said he was 'excellent' at 'Writing', while the majority (63 per cent ) said they were 'fair', and a small proportion (21 per cent) said they were 'good'. In 'Reading', 4 students said they were 'excellent', but 49 per cent said they were 'good', and only 4 per cent said they were 'poor' (App.42 Table 34). The same pattern emerges for the other skills: few students claim to be 'good' learners, and even fewer claimed to be 'excellent', the majority of students saw themselves as 'fair' learners only.

Similarly to GI, very few students in GII saw themselves as 'excellent' at the various skills: The majority said they were either 'good' or 'fair', and a small proportion of students acknowledged being 'poor' learners (App.42 Table 35). As for their likes



and dislikes regarding the various language learning activities, the majority of students in both GI and GII (51 and 38 per cent for each group respectively) expressed their preference for 'Oral English' (i.e. classes of spoken English), while 'Writing' was said to be the least liked subject in both years (App.43 Table 36 for GI and Table 37 for GII). These figures can be better understood in the light of students' answers to the following question in which they were asked to say which aspect(s) of the language they thought was most difficult for them to acquire. In both groups, the majority of students (nearly 42 per cent in both groups) put 'Writing' first, i.e. as being the most difficult, while 'Speaking' came last on the scale of difficulty, i.e. being the easiest skill to acquire (App. 44 Table 38 for GI and Table 39 for GII) We shall now turn to discussing the conclusions these results suggest

#### **5.1.2.1.2. Conclusions for Part One:**

The general picture which emerges from the investigation of our students' background is that the student population is relatively young and largely female. The investigation of their linguistic background has revealed some surprising facts: Thus, although all the students had followed a completely Arabised primary and secondary education in which French was only taught as a foreign language, they nevertheless confessed in their majority, that they had more difficulty in writing and reading Arabic than French. These findings, if corroborated by other research, may prove to be politically embarrassing and particularly worrying for those in charge of the educational system, but this is well beyond the scope of the present research.

The second surprising element our findings have brought up, was the fact that the majority of the students claimed they had no choice in their secondary school between English and another foreign language. Surprising because officially, secondary schools must offer, in addition to French, a choice of at least three (3) foreign languages, which are usually English, Spanish, and German. It thus appears that many secondary schools are simply ignoring official instructions in this field. The main reason is probably due the fact that there is a crucial shortage of textbooks and teaching materials for these languages.

As for the nationality of their teachers, it turns out that in their majority they were Algerian. There was however, a small proportion of teachers to whom students have referred to as 'natives' but who are in fact either Indian or Pakistani citizens working in Algeria under various cultural and scientific cooperation schemes. Algerian teachers, according to their students, used English in class most of the time and never had resort to translation on a regular basis; The only instances in which they did use either Arabic or French had to be seen as a time saving device only, such as explaining



a difficult word or expression. On the basis of personal experience, we suspect however, that Arabic and /or French are used on a much larger scale than actually conceded.

It is also clear, judging from students' answers that very few had access to additional (i.e. 'extra muros') materials, like TV programmes, films, newspapers, magazines and so on. In fact, such materials are available either at the British Council for instance, or the Cultural Service at the American Embassy, but teachers have always shown a great reluctance to use them because they meet various difficulties: lack of school funds, lack of transport facilities, red tape to unravel and so on, the effect of which is to deprive students from such additional educational aids. It is probably because of these difficulties that most teachers prefer to use the textbook they have been provided with, at the exclusion of any other additional materials.

We can now understand probably better why so many students had no alternative but to study English at the University: Since all the available subjects in the Arts and Social Sciences have been Arabised, and since, as already pointed out, many students had problems in reading and writing Arabic, added to the fact that the only foreign language available in their school was English, it became therefore inevitable that most of them found themselves with no other alternative but to study English. Finally, the students' own evaluation in the various language skills has shown that for most of them the subjects they liked were easy to learn while the subjects they disliked turned out to be more difficult to acquire.

#### **5.1.2.2. Part Two: Students' Beliefs: (Questions 37 to 46, 50 to 52 and 65 to 67, and 71)**

The second part of the Questionnaire, as already pointed out, was meant to investigate two main areas: First, students' beliefs about various factors involved in the learning process, and second, their awareness about and use of learning strategies. We shall discuss now each of these points.

##### **5.1.2.2.1. Results:**

The investigation of students' beliefs concentrated on four main areas which we shall discuss under four corresponding sections. Similarly to our discussion of the students' background all our result tables have been included in the Appendices section. Table 5.3 below gives the Appendix and Table numbers which correspond to each question.



*(i) Students' Beliefs about various aspects of aptitude in FL learning:  
(Questions 37 to 41, and 57)*

When they were asked (Q. 37) whether success in acquiring a foreign language depended on possessing a particular ability (i.e. aptitude) 82 per cent in GI (among which 18 per cent 'strongly') believed that not all people could learn equally successfully a foreign language: some were more successful than others because they had a particular aptitude for it. The same beliefs were expressed by students in GII in which 79 per cent (among which 30 per cent 'strongly') expressed the same belief (App. 45 Table 40). When asked to say (Q.39) if they thought that mono- or bilingualism, or even multilingualism had a facilitating or hindering effect on the acquisition of an additional (foreign) language (by which we meant English) the majority of students in both groups (62 per cent in GI and 76 per cent in GII, App. 45 Table 42 and App. 46 Table 43) said that knowledge of French, for instance, could help in learning English. However, when they were asked if knowledge of Arabic could have the same facilitating effect (Q.38), 50 per cent in GI and 47 per cent in GII (App.45 Table 41) said it could. As for the possible interference of the student's mother tongue with the acquisition of the foreign language (Q. 41 ), 48 per cent and 56 per cent for each group respectively, said they believed it did (App.46 Table 44)

Question Number	App. Number	Table Number
37	45	40
38	45	41
39	45	42
40	46	43
41	46	44
42	49	54
43	49	55
44	49	56
45	48	51
46	50	57
50	50	58
51	51	59
52	52	60
53	52	61
54	53	62
55	53	63
56	54	64
57	46	45
58	47	46
59	47	47
60	47	48
61	47	49
62	48	50
65	48	52
66	48	53
71	54	65

Table 5.3 Appendix and Table Numbers Corresponding to each Question in the Students' Questionnaire (Part Two)

Finally, we asked students if they could evaluate their own ability (i.e. aptitude) at learning English ( Q. 57) : 37 per cent in GI and 33 per cent in GII said they believed they had such an ability, while 17 per cent and 20 per cent in each group respectively said they thought they did not (App.46 Table 45).

(ii) *Learners' beliefs about the nature of the learning process:* (Questions 42 to 44, 46, 50 to 56, and 71)

We started by looking at their beliefs about the nature of the language learning process. We first investigated their beliefs about learning English in general (Questions 42 to 44). For instance, when asked about the kind of 'atmosphere' they thought should surround the learning process in class (Q. 42),93 per cent in GI believed (among which



60 per cent `strongly) that a relaxed atmosphere in which learners felt at ease, contributed greatly to improving the learning process. In GII these figures were 90 and 48 per cent respectively (App. 49 Table 54). They were also asked to say what was the best way to learn `good' English (i.e. `good' in terms of correctness and appropriateness) (Q. 44) : 59 per cent in GI and 66 per cent in GII said by attending formal classes (App. 49 Table 56). There was also a great agreement in both groups, 80 per cent in GI and 69 per cent in GII, that the intellectual skills required for learning a foreign language were different from those required for other academic subjects, like Economics, Psychology and so on (Q. 43) (App. 49 Table 55).

We then tried to investigate their beliefs about error-making during the acquisition process and how these should be dealt with. We asked them for instance, to say how important they thought the correction of errors contributed to improving the learning of the FL (Q. 46): In GI 96 per cent (among which 31 per cent `strongly') agreed that having one's errors corrected was very important and was in fact, crucial in improving one's performance in the FL. In GII, 86 per cent (40 per cent `strongly') expressed the same belief (App.50 Table 57). The next question was aimed at determining the particular stage in the learning process in which they believed these corrections should be made (Q. 71): 45 per cent in GII and 34 per cent in GII said they preferred to be corrected only after they had finished speaking, while 24 and 18 per cent for each group respectively, said they would not mind being interrupted by their teacher in order to be corrected. There was however, a sizeable proportion of students (34 and 42 per cent for GI and GII respectively) who said they just preferred to have their errors pointed out to them by their teacher and then, be left to bring in the necessary corrections by themselves (App.54 Table 65).

The next area investigated was related to the acquisition of various language skills. We wanted to find out about learners' beliefs concerning their perceived degree of importance of each skill in the FL acquisition process. First, we asked them to rank in order of importance in the acquisition process various linguistic levels (Q. 51): 55 per cent in GI and 63 per cent in GII believe that the acquisition of the sound system and pronunciation rules came first (App. 51 Table 59). As for the acquisition of language skills (Q. 52), the majority of students in both groups (70 per cent in GI and 69 per cent in GII ) believed that `Speaking' should be acquired first, followed by `Writing' , and `Listening'. `Reading was seen as the least important skill to acquire (App. 52 Table 60).

After they expressed their perceived order of importance for each of these skills, students were then asked to express their beliefs about various learning activities within each of these skills. Thus, for `Reading' for instance (Q.53), we gave students a choice

of four different activities (App.52 Table 61). There was a large agreement among all students (85 per cent in GI and 70 per cent in GII) that what should be emphasised most in a Reading Course was the ability to learn how to extract the general meaning from a particular text; This was followed by the ability to read a text written in general English, as opposed to the ability to understand a scientific text which was seen as important by only 5 per cent in GI but by 47 per cent in GII ( App.52 Table 61). As for 'Writing' (Q. 54), very few students believed that the ability to write technical or scientific text played an important part in the acquisition of this skill (7 per cent in GI and 5 per cent GII), instead, the majority of students, 76 per cent and 75 per cent in each group respectively, believe that the ability to write 'general English' was the most important one to acquire (App.53 Table 62).

In 'Listening' (Q.55 ), 53 per cent in GI and 56 per cent in GII, said they believed that 'understanding lectures' was the most important ability to develop, followed by the ability to understand films and TV programmes. The ability which students saw as least important was the ability to understand different varieties of English (App. 53 Table 63).

Finally in 'Speaking' (Q. 56), both groups agreed that the two most important abilities that should be developed are the ability to speak about (a) formal topic(s) and to be able to carry out an informal conversation (App. 54 Table 4).

*(iii) Students' beliefs about their own motivation for studying English:  
(Questions 58 to 62)*

In our discussion of 'Motivation' earlier, (see 2. 2. 3. 4.3. above), we distinguished between 'Instrumental' motivation (i.e. motivation to use the language as a useful instrument for improving qualification, i.e. job prospects), and 'Integrative' motivation (i.e. motivation to communicate and mix with the language community). Thus, we tried to cover, albeit very briefly, both aspects in our investigation. For the latter for instance (Q. 58 and 59) the majority of the students in both groups (86 per cent in GI and 76 per cent in GII) said they were very keen to study English because of its use as a universal medium of communication and as an opening on other cultures (App. 47 Table 47). As for the former, i.e. whether their degree would give them better job opportunities, (Q. 60) students' answers varied according to the year to which they belonged : Thus, 48 per cent in GI and 38 per cent in GII, believed it would, while 25 and 36 per cent in group respectively said it would not. A large proportion of students in both groups answered they 'did not know', 25 and 18 per cent in GI and GII respectively (App. 47 Table 48).



*(iv) Beliefs about the difficulty in learning a FL: (Questions 45, 65, and 66)*

When asked how difficult they thought the English language was (Q.66) for them, the majority of students in both groups (65 per cent in GI and 49 per cent in GII) said that English was a language of 'medium difficulty', only 20 and 22 per cent for each group respectively, said they thought it was a 'difficult' language to learn. Only a small minority, 10 per cent in GI and 19 per cent in GII, answered it was an 'easy' language (App. 48 Table 53). When they were asked to say what they thought about the general difficulty in learning a foreign language and the time it would take, the majority thought it would take at least 3 to 5 years to acquire (App.48 Table 52).

**5.1.2.2.2. Conclusions for Part Two:**

The vast majority of First and Fourth-year students agree that learning an FL requires special abilities which not everybody possesses. They also strongly believe that the knowledge of one or more languages, greatly improves the ability to acquire an additional language. Furthermore, if one of these languages has many similarities with English, eg French, then the facilitating effect will be even greater. In expressing their beliefs about the nature of the FL acquisition process, most students in both years, believe that the acquisition of 'good' English can only be achieved in a formal classroom environment, and they also strongly believe that having a relaxed and friendly atmosphere in class in which students feel at ease, can help greatly in enhancing the learners' performance in the foreign language. Another important factor in this context, is their teacher's attitude towards errors. The majority of students in both groups believe that they should not be interrupted while speaking, instead they would rather see their teacher let them finish and only then, suggest the necessary corrections. Some students go even further: They would rather prefer not to have their errors corrected at all, they simply want their teacher to point out these errors to them and allow them to make the necessary corrections themselves.

In the acquisition of the various skills and which among these was most important to acquire first, students in both groups agree in their majority that 'Speaking' (i.e. using the language) is the most important one: The ability to speak fluently the language is seen by most students as a sign that learning is successful. The next important skill to acquire, according to students, is 'Writing', followed by 'Listening' and finally Reading'. There was a large agreement among students in both years about the specific learning activities which, according to them, should be developed within each of these skills. In 'Speaking' for instance, they think that what should be developed first and foremost, is the ability to carry out an informal conversation without

too much hesitation. Very few students in either year believe that the ability to speak about a technical or scientific subject is an important one to develop.

In 'Writing', most students in both groups believe that enabling students to write about general topics is the first ability that should be developed. To a lesser extent, they also believe that a course in 'Writing' should enable them to answer tests. But similarly to 'Speaking', very few believe that developing an ability to write technical or scientific texts is an important one.

The rejection, by students in both groups, of what is commonly known as ESP in 'Speaking' and 'Writing', is rather surprising and disappointing because the Department of English has always been encouraged by official educational authorities to develop the teaching of this particular area of the language which until very recently was still taught. Unfortunately, because of a crucial shortage of ESP-trained teachers and teaching materials, this subject has come to be totally neglected, and for the past two years, has been completely withdrawn from the curriculum.

In 'Reading', which is probably the most neglected skill in the degree curriculum because it does not exist as an independent subject, most students believe that the ability to extract the general meaning from a text is what should be developed first. However, unlike the previous two skills in which both groups rejected the development of the ability to handle scientific English, in 'Reading' instead, great discrepancies appeared in the answers given by either First or Fourth-year students: Thus, whereas very few students in GI think it is important, quite a large proportion of students in GII expressed the opposite view. We think that this discrepancy can be explained in terms of a greater awareness on the part of Fourth-year students of the importance of this variety of English. This may be due to two main reasons. First, because of the various teaching sessions they have attended, as part of their training programme, in various educational institutions (secondary schools, institutes of technology and so on), they have now become aware that they may well be required to teach not in a traditional secondary school, but in a technical or scientific institution. Second, many Fourth-Year students would have already started exploring and even applying, for a job outside the teaching career, and they have now come to realise that the only jobs available are the ones offered by various international firms operating in the country which are in their totality primarily concerned with a specific technical or scientific field.

Finally, in 'Listening', students in both groups agree that understanding lectures and TV programmes and films are the first abilities that should be developed.



As far as students' motivation is concerned, the majority of students in GI and GII show that they are highly motivated in establishing and maintaining contacts with English-speaking people as well as getting familiar with their way of life, Art and Culture (i.e. 'integrative' motivation). But when it comes to job prospects (i.e. 'instrumental' motivation), many students particularly those in the Fourth-year, expressed great anxiety about their future. These worries are well-founded because Algeria has been badly hit by world economic crisis, and is undergoing a critical phase in its economic development, the result of which is high unemployment at all levels.

### 5.1.2.3. Students' Use of LS:

Having established all the information background about the teachers and their students, and looked at the students' beliefs, we shall now turn to discussing the learning strategies which they used in the Questionnaire. We must stress at this stage, that our discussion of the strategies used in the Questionnaire (and the Interview) is essentially geared towards providing evidence for the discussion of our first research question. Thus, we shall not concern ourselves here with the differences in LS use between First and Fourth-Year students. This point will be discussed later. Before discussing our findings we shall first explain the procedure we have followed to obtain our results.

#### 5.1.2.3.1. Procedural points:

Our discussion of the students' use of the learning strategies included in the Questionnaire (and later on, in the Interview) will be carried out into two different steps. First, we shall discuss the results in general: For this purpose we shall establish the number of strategies each student has reported using and for the purpose of our discussion, we shall consider this figure as the student's score (App. 56 and 57 give a detailed list of these results for GI and GII, respectively). These scores will then be turned into a frequency table which has the advantage over the listing of the scores given in App.56 and 56 of showing for each group of students (i) the minimum and maximum scores we recorded, and (ii) the frequency with which a particular score occurred. These results will then be discussed in terms two statistical measures, i.e. the mean (henceforth,  $\bar{X}$ ) which will allow us to see the average number of LS used in a particular group of students, and the standard deviation (henceforth SD) which will help us to discuss very briefly, the dispersion of the scores above and below the mean within each group .(1)

Second, we shall discuss the use of the strategies proper. For this purpose, we shall look at the various questions which illustrate a particular strategy, either cognitive

---

<sup>1</sup> For all the statistical formulae see Appendix 58

or metacognitive, and record all the instances of use which students have reported, (see Table 5.7 for an example of the results we obtained for a metacognitive strategy, and Table 5.9 for an example of the results obtained for a cognitive strategy). Then, on the basis of these results, we shall establish for each type of strategy (i.e. metacognitive or cognitive) a summary table (eg. Table 8 below ) which will show the instances of use for each of the corresponding LS. This point will be discussed in more details later.

#### 5.1.2.3.2. Discussion:

There were 62 LS included in our Questionnaire, (8 metacognitive and 54 cognitive ones , see 4.3.3.1.2. above); However, because some of the questions had multiple answers from which learners could choose only one answer, the actual maximum number of LS that each student could thus use, i.e. his/her maximum score, was 38 (6 metacognitive and 32 cognitive LS). This is summarised in Table 5.4 below.

	Cognitive	Metacognitive	TOTAL
Total Number of LS Available in the Questionnaire	54	8	62
Maximum Number of LS each student could use	32	6	38

Table 5.4 Summary of the total number of LS available in the Questionnaire and the actual number each student could use

All the scores we obtained in each group have been turned into the frequency table below which gives us a clearer picture of the distribution of the scores (Table 5.5). This table shows for instance, that for the lowest scores, 3 students in GI but none in GII scored 17 (i.e. used 17 LS) and that for the highest scores, 3 students in GI and 2 in GII scored 29. The advantage this table has over the list of scores given in Appendix 56 and 57 is that it shows at one glance, all the scores which have been obtained as well as the frequency with which they occurred.



Score	Frequency	
	GI	GII
17		3
18	1	4
19	6	7
20	8	8
21	10	11
22	14	7
23	7	6
24	15	7
25	14	5
26	7	6
27	5	2
28	6	1
30	1	1
31	-	1
32	1	-
33	1	1

Table 5.5 Frequency Distribution of LS Use in the Questionnaire in the First (GI) and Fourth Year (GII)

This table however, tells us very little about the actual distribution of the scores in either group, and even less about their dispersion above and below the mean. This is why, in order to discuss these results, we established for each group of students, their mean ( $\bar{X}$ ) and standard deviation (SD) (Table 5.6)

	$\bar{X}$	SD
GI (N = 99)	24	3.03
GII (N = 72)	23	3.45

Table 5.6 Mean and SD for GI and GII in the Questionnaire

These figures show that both First and Fourth-Year students have made an extensive use of LS: an average of 24 in GI and 23 in GII, which represents the use of 63 per cent and 60 per cent in each group respectively, of the total number of the available LS in the Questionnaire. The SD will help us to look at the dispersion of these

scores in each group. As this table shows, it is nearly similar in both groups: there is an average of 3 LS above and below the mean in each group. We shall discuss later, whether the differences in the mean score and SD of the two groups is statistically significant or not.

We shall now turn to discussing the use of the various LS included in our Questionnaire. We shall first discuss metacognitive strategies and then cognitive ones.

*(i) Metacognitive LS:*

Table 5.7 below obtained for the strategy 'Self-Monitoring' for instance, is an illustration of the procedure we have followed for each of the metacognitive strategies contained in the Questionnaire in order to establish later on, the summary table for all the strategies belonging to this type.

Question Number	GI		GII	
	N	%	N	%
(1)	9	9%	7	10%
(2)	30	30%	31	43%
48 (3)	15	15%	8	11%
(4)	40	40%	19	27%
(5)	16	16%	2	3%
(1)	10	10%	7	10%
(2)	39	39%	20	23%
49 (3)	16	16%	9	13%
(4)	18	18%	26	36%
(5)	16	16%	8	12%
71c	34	43%	34	47%
74b	87	87%	54	75%

Table 5.7 Example of the results obtained for the Use of the LS 'Self-Monitoring' in the Questionnaire.

This Table, like all similar ones we shall refer to in our discussion of LS is to be read as follows: The column on the left-hand side shows the question number (henceforth Q.) in which this LS was used. Each question may have only one answer (eg Q. 71c), or various alternative ones, in which case we give, for each answer, its own results: For instance in Q. 48, students were asked to rank on a scale of agreement/disagreement, (from (1) to (5)), various statements. Thus our results show for each statement, the number of students who have selected it. The next two columns,



symbolised GI (for the First Year) and GII (for the Fourth), give for each Year (i) the number of students (symbolised (N)) who used this particular LS, and (ii) the percentage figure (%) which this number (N) represents in the whole group. Thus for instance, if we look at the LS used in Q.74b, we can say that 87 First-year students (i.e 87% of the whole group) have used this LS, while in the Fourth Year this LS was used by 54 students (i.e 75 per cent of the group).

Having established similar tables for all the metacognitive LS which we shall discuss below, we then arrived at our summary table which shows the instances of use we recorded for each LS of this type. (Table 5.8)

Strategy	GI		GII	
	N	%	N	%
Self-Monitoring	52	52%	38	53%
External-Monitoring	35	35%	19	27%
Monitoring Others	87	87%	48	67%
Self-Evaluation	53	53%	27	37%

Table 5.8. Summary Table of Metacognitive LS use in the Questionnaire

What this table shows is that First-Year students showed a tendency to use more metacognitive strategies than their counterparts in the Fourth-Year. It does not tell us however, the circumstances or the extent to which each of these strategies has been used. This is why we shall now turn to discussing in details the various questions which illustrate each of these strategies.

'Self-Monitoring': (illustrated by Questions: 48, 49, 71c and 74b) (see Table 5.7 above for details).

The first question (Q.48) was aimed at investigating the extent to which learners exercised control over their own production of the TL: Our results show that in GI, 39 per cent of the students agree (9 per cent 'strongly') that they do not worry too much about errors they make while speaking; The proportion of students in GII who agree with this statement is even higher, 53 per cent (among which 10 per cent 'strongly'). As for the next question in which they were asked whether they would not say anything in English unless they were sure it was accurate (Q.49), 49, percent in GI (10 per cent 'strongly') agree they would, whereas in GII the number of students who

agreed was 37 per cent (10 per cent 'strongly). When asked whether they usually correct their errors by themselves (Q.71c), 34 per cent GI and 47 per cent in GII said they did. Finally, when asked whether they usually thought carefully about what they were going to say or write (Q. 74b), 87 per cent and 75 per cent in each group respectively, said they did.

**'External Monitoring': (Questions 71a, and 71b)**

(The instances of use for this LS are summed up in App.66 Table 1)

This LS was said to be used to a lesser extent than the previous one. The relatively low use of this LS by students in both groups suggests that in their majority, they did not have resort to this type of strategy which could mainly exemplified by the intervention of the teacher to correct them. Thus when asked whether they preferred, among other alternatives, to be interrupted by their teacher in order to have their errors corrected (Q. 71a), only 24 per cent in GI and 18 per cent in GII said they would. This suggests that the majority of students in both groups preferred to use an alternative strategy. This was confirmed by their answers to the next question (Q. 71b) in which 45 per cent of the students in GI and 33 per cent in GII said that they preferred to have their errors pointed out to them and be left to bring in the necessary corrections by themselves.

**'Monitoring Others': (Question 63)**

(The instances of use for this LS are summed up in App.66 Table 2)

Students in both groups made an extensive use of this strategy. 87 per cent in GI and 67 per cent in GII said they did correct mentally to themselves other students' speech.

**'Self-Evaluation': (Question 72b)**

(The instances of use for this LS are summed up in App.66 Table 3)

When asked if they usually limited what they said to what they could actually express in correct English, we obtained completely different results in each group. In GI for instance, 53 per cent said they usually did, while in GII only 37 per cent said they did. We shall now turn to discussing the use of cognitive LS.



*(ii) Cognitive LS.*

Table 5.9 below which we established for the strategy 'Formal Practising' is an illustration of all the other tables we established for this type of strategy and is to be read in the same way as 5.7 above.

Question Number	GI		GII	
	N	%	N	%
68d	42	42%	17	24%
68e	29	29%	6	8%
68f	61	61%	40	55%
69f	3	3%	5	7%
69i	64	64%	46	64%
75a	69	69%	41	57%

Table 5.9 Use of the LS 'Formal Practising' in the Questionnaire.

On the basis of this table and all other similar tables established for each LS of this type, the following summary table has been established. (Table 5.10)

LS	GI		GII	
	N	%	N	%
Formal Practise	45	45%	26	36%
Translating (from/into French)	35	35%	20	28%
Translating (from/into Arabic)	12	12%	4	6%
Translating (from/into another language)	4	4%	3	4%
Being Active	24	24%	20	28%
Question for Clarification	44	44%	25	35%
Resourcing	65	65%	40	56%
Contextualisation Repetition	22	22%	29	40%
Memorising	51	51%	25	25%
Deduction	25	25%	19	27%
Avoidance	5	5%	6	8%

Table 5.10 Summary Table of Cognitive LS use in the Questionnaire

This table shows that some strategies have been extensively used (eg 'Contextualisation', 'Resourcing'), while others have been used to a much smaller extent

(eg 'Translating', 'Repetition'). In order to see the circumstances in which each of these strategies was reported to have been used we shall now turn to discussing each of them.

'Formal Practising': (Questions 68d, 68e, 68f, 69f, 69i, and 75a)

(see Table 5.9 above for the instances of use)

Students in both groups have acknowledged the use of this LS but did so to varying extent. Some instances of this strategy were used less than others. For instance, when they were asked whether they used grammar books to learn further a new grammar structure (Q.68d), 42 per cent in GI and 24 per cent in GII said they did. Alternatively when asked whether they usually looked up in a dictionary this same structure (Q.68e), 29 per cent in GI and only 6 per cent in GII, said they did. However, when asked when asked if they used this particular structure in speech and writing in order to practise it and hence, learn it better (Q.68f), 61 per cent in GI and 55 per cent in GII said they did. The same strategy was said to be used to learn new vocabulary items (Q.69i): 64 per cent of the students both in GI and GII said that the best way for them to learn these items was to use them in every day conversation and in their writing.

Finally, when asked if they tried to remember and use in conversation or in writing some models of English they had previously studied (Q.75a), 69 per cent and 57 per cent in each group respectively, said they did.

'Translating from/into French':(Questions 67c, 69c, 70a, 773b, 76b, 77b.)

(The instances of use for this LS are summed up in App. 67. Table 4)

When asked whether they learned better if a new grammar rule was given to them in French (Q.67c), 63 per cent in GI and 65 per cent in GII said they did. However when asked the same question about new vocabulary items (Q. 69c), only 38 per cent in GI and 17 per cent in GII said they learned better if they wrote these items down together with their French equivalent. Even less students, 22 per cent in GI and 7 per cent in GII, said they preferred their teacher to introduce new lexical items with an explanation in French (Q.70a).

Surprisingly however, when students were asked whether they used, mentally, translation from/into French while speaking or writing (Q.73b), 29 per cent in GI and 36 per cent in GII acknowledged they used such a strategy. This point was further reinforced by their answers to the following question in which they were asked if while writing for instance, they would fill in the blanks with French words (Q. 76b): 30 per



cent in GI and 20 per cent in GII said they usually did. Finally, when asked whether they automatically translated into French what they would be reading or listening to (Q.77b), 30 per cent in GI and 15 per cent in GII said they did.

‘Translating from/into Arabic’: (Questions 67b, 69b, 70a, 73a, 77a)

(The instances of use for this LS are summed up in App. 67 Table 5)

This LS turned out to be less extensively used than we actually expected, particularly among Fourth-Year students. Thus, when we asked them for instance, whether they translated into Arabic new grammar points which their teacher had just introduced (Q.67b), only 6 per cent in GI and 3 per cent in GII said they usually did. As for lexical items (Q.69b), only 8 per cent in GI and 2 per cent in GII said they used equivalent translation in Arabic to learn them better. Furthermore, when asked whether they learned better if their teacher introduced new lexical items with an explanation in Arabic (Q.70a), 22 per cent in GI and 7 per cent in GII said they did. As for using Arabic mentally when speaking or writing (Q.73a), only 13 per cent in GI and 6 per cent in GII said they did. Finally, when asked whether they used Arabic while listening or reading (Q.77a), 13 per cent in GI and 7 per cent in GII said they did.

‘Translating from/into another language’: (Questions 73c, 77c)

(The instances of use for this LS are summed up in App. 68 Table 6)

This is a strategy that concerns relatively few students, because normally only a small proportion among them would be in possession of one of the varieties of the Berber language. This was confirmed by the very low figures given in our table. For instance, when we asked students if, apart from French or Arabic, they used another language to help them in their learning, only 4 per cent in GI and 2 per cent in GII said they did. Nearly the same proportion of students said they used this language in Listening or Reading (Q.77c).

‘Being Active’: (Questions 72a, 73d, 74a, 75b, 76c, 77d, and 77e)

(The instances of use for this LS are summed up in App. 68 Table 7)

Students were asked whether they would carry on speaking irrespective of the errors they would be making in the process (Q.72a): 43 per cent in GI and 51 per cent in GII said they usually did. However, when they were asked whether, while speaking or writing, they would think exclusively in English or use another language (Q. 73d), only



13 per cent in GI and 8 per cent in GII said they would think exclusively in English. When asked if they spoke and wrote without worrying too much about their errors (Q. 74a), 12 per cent in and 10 per cent in GII said they did.

Next, they were asked if they would stop speaking or writing because they were unable find a particular word or expression they wanted to use (Q. 76c): only 2 per cent in GI and 6 per cent in GII said they would, which suggests that the majority of students in both groups would strive to get their message across despite this difficulty. When 'Listening' or 'Reading', students in both groups showed a greater use of LS. Thus, when asked whether they used to think and understand exclusively in English while performing either skill (Q.77d), 39 per cent in GI and 44 per cent in GII said they did so.

'Questions for Clarification': (Questions 78a, 78b,79a, 79b, and 79c)

(The instances of use for this LS are summed up in App. 69 Table 8)

This LS turned out to be extensively used in both groups. Thus, when students were asked whether they asked their teacher to explain a word they did not understand (Q.78a), 41 per cent in GI and 35 per cent in GII said they did so. Alternatively, instead of their teacher, they would also ask a fellow students (Q.78b): 42 per cent and 27 per cent in each group respectively, said they did so. They were also asked whether they did ask the speaker to repeat what he or she has just said to help them understand better (Q. 79a), 62 per cent and 35 per cent for GI and GII respectively said they did.

Alternatively, instead of asking the speaker to repeat what he/she has just said, 32 per cent in GI and 20 per cent in GII said they would ask him/her to explain just the word or expression they did not understand (Q. 79b). Finally, when in the same situation, 45 per cent in GI and 25 per cent in GII said they would just ask the speaker to simply repeat only the word or expression they did not understand.

'Resourcing': (Questions 64, 69a, 69h, 76a, and 78c)

(The instances of use for this LS are summed up in App. 69 Table 9)

This LS was also extensively used in both groups, particularly in two instances. First, when they were asked whether they did use all available means to guess something they did not understand (Q.64), 62 per cent in GI and 68 per cent in GII said they did. Second, when they were asked whether they looked up in a dictionary new words they met while reading for instance, (Q.78c), 93 per cent in GI and 82 per cent in



GII said they did. The other instances for this type of LS in this section were not used to the same extent but were nevertheless reported to be used by large numbers of students. For instance, when they were asked whether used a dictionary to check new words which their teacher had just introduced (Q. 69h). 58 per cent in GI and 47 per cent in GII said they usually did. Finally, when they were asked to say what they usually did when they could not find a particular word or expression (Q. 76a), 53 per cent in GI and 33 per cent in GII said they usually tried to find other words in English which would express the same idea.

‘Contextualisation’: (67a, 68c, 69e, and 70b)

(The instances of use for this LS are summed up in App. 70 Table 10)

Students in both groups have made an extensive use of this LS as well. Thus when they were asked whether they preferred to learn a grammar rule using only English (Q.67a), 63 per cent in GI and 65 per cent in GII, said they learned better in this way. Similarly, when they were asked them if they used the newly learned grammar structures in various sentences in order to learn them better (Q. 68c), 61 per cent and 41 per cent for GI and GII respectively, said this was they used to learn these points. As for learning new lexical items (Q.69e), 49 per cent in GI and 35 per cent in GII said that the best way in which they learned them was to use them in various sentences. Finally, we asked them to say how best they preferred their teacher to introduce new lexical items (Q.70b), 69 per cent in GI and 72 per cent in GII said they learned better if their teacher gave all the explanations in English.

‘Repetition’: (Questions 47, 68, and 69g)

(The instances of use for this LS are summed up in App. 70 Table 11)

Most students saw ‘Repetition’ as a relatively important strategy in the learning process. Thus, 37 per cent in GI (among 23 per cent ‘strongly’) believe that it helps in mastering a FL (Q.47), whereas in GII the proportion of students who think so turned out to be much higher, 89 per cent altogether (among which 54 per cent said ‘strongly’). However, when we asked them to say if they used repetition to memorise grammar structures (Q.68a), only 23 per cent in GI and 19 per cent in GII, said they did so. Finally, when asked to answer the same question about lexical items, (Q.69g), 15 per cent and 11 per cent for GI and GII respectively said they used such a strategy to learn new lexical items.

‘Memorising’ (Questions 68b, 69d)

(The instances of use for this LS are summed up in App. 71 Table 12 )

For new grammar structures (Q.68b) as well as lexical items (69d) most students, particularly those in GI, said that the best way they used to memorise these items was to write them down many times until they remembered them well.

‘Deduction’: (Questions 67d, 70c)

(The instances of use for this LS are summed up in App. 71 Table 13)

This LS was used to a relatively smaller extent than the other LS. For instance, only 25 per cent in GI and 22 per cent in GII said they learned better a grammatical rule if they themselves if they discovered it by themselves from various examples (Q.67). Similarly, 25 per cent and 32 per cent in GI and GII respectively, said they learned new lexical items better if they were left to discover the meaning by themselves (Q.70c).

(The instances of use for this LS are summed up in App. 71 Table 14)

This is the least used cognitive LS by both First and Fourth-Year students. Thus, only 7 per cent in GI and 8 per cent in GII said that they give up expressing a particular idea if they could not find the right word or expression (Q.76d), implying therefore that the majority in both groups would try to find alternative ways to express it. Similarly, only 3 and 8 per cent for GI and GII respectively, said that they usually give up reading or listening if they met words they could not understand. The rest of the students would thus try to use all the available means to find an answer to the problem.

‘Participating’ : (Question 80)

(The instances of use for this LS are summed up in App. 72 Table 15)

In the last question of our Questionnaire we asked students to evaluate the extent to which they participated in classroom activities. Only 16 per cent in GI and 10 per cent in GII said they were ‘very active’, whereas the majority of students, 72 per cent in GI and 64 per cent in GII, fell within the group of either ‘active’ or ‘moderately active’ students. Only a small proportion, 12 per cent and 18 per cent for GI and GII respectively, said they were either ‘not very active’ or ‘not active at all’.



### 5.1.3. The Interview

We included 96 LS in the Interview (27 Metacognitive and 69 Cognitive ones, see 4.3.3.2.3. and Table 4.8. above), but similarly to the Questionnaire the actual maximum number each student could use was 80 (23 metacognitive and 57 cognitive ones)

This is summarised in Table 5.11 below.

	Cognitive	Metacognitive	TOTAL
Total Number of LS Available in the Interview	27	69	96
Maximum Number of LS each student could use	23	57	80

Table 5.11 Summary of the total number of LS available in the Interview and the actual number each student could use

#### 5.1.3.1. Procedural Points:

The exploitation procedure we followed for the Interview was similar to the one we already described for the Questionnaire with one major difference however. Since we had selected in each Year a group of 'good' students and a group of 'less good' ones (see 4.3.4.1. above), our discussion will concentrate on each of the groups within a particular Year. For instance, for First-Year students (which we have previously symbolised GI), we shall compare the results of the group of 'good' students to which we shall henceforth refer as GIA, with the group of 'less good' ones, to which we shall henceforth refer as GIB. The same procedure will be followed for students in the Fourth Year. This is summarised in Table 5.12 below.

First Year	Fourth Year
GIA N = 22	GIIA N = 15
GIB N = 24	GIIB N = 17

Table 5.12 Distribution of 'good' and 'less good, students in each Year with their corresponding number (N)

We shall now discuss our findings for each year separately.

### 5.1.3.2. Results for First-Year Students:

All the scores we obtained for each group have been turned into the frequency table below (Table 5.13) which gives us a clearer picture of their distribution. The scores are in increasing order.

As this table shows, among the lowest scores only one student in GIB scored 56, while among the highest scores only 1 student in both GIA and GIB scored 62. Only 2 students in GIA obtained the maximum score (63).

What these results suggest is that the LS included in the Interview have been used to a large but varying extent by students in both groups. In order to discuss these results further, we shall use two descriptive statistical measures similar to the ones we used for our discussion of the LS included in the Questionnaire (table 5.14).

Score	Frequency	
	GIA	GIB
40	-	1
46	-	1
47	-	1
48	1	4
50	2	4
51	-	3
52	-	1
53	2	1
54	6	2
55	3	3
56	-	1
57	1	-
58	1	1
60	2	2
61	1	-
63	2	-

Table 5.13 Frequency distribution of LS Use in the Interview in the First Year

The figures in Table 5.14 below, confirm our earlier observation that LS have been used extensively in both groups. They also show that students in GIA have made use of a relatively higher number of LS (58) than their fellow students in GIB. The



lowest SD in the former, suggests that the dispersion of the scores above and below the mean in this group is less marked than in the latter. We shall see later whether these differences are statistically significant or not.

	GIA	GIB
$\bar{X}$	58	51
SD	4.69	5.04

Table 5.14. Mean and SD in the Interview for the two Groups in the First Year

We shall now turn to discussing the extent to which these LS have been used in each group. We shall first discuss metacognitive LS.

(i) *Metacognitive LS :*

Table 5.15 summarises all the instances of use of this type of strategy.

Question Number	GI A		GIB	
	N	%	N	%
Self-Monitoring	11	49%	10	42%
Monitoring Others	12	55%	13	53%
External Monitoring	12	55%	17	73%
Planning	22	100%	24	100%

Table 5. 15 Summary Table of Metacognitive LS Use in the Interview (First Year)

Similarly to the Questionnaire, First-Year students in both group A and group B have made an extensive use of metacognitive strategies. For instance, an average of 11 students in Group A (i.e. 49 per cent of the Group) and 10 in Group B (i.e. 42 per cent) have reported using 'Self-Monitoring'. However, in order to see the extent to which and the circumstances in which each of these strategies was used we shall now turn to discussing each of them in detail..

'Self-Monitoring': (Questions 21c, 21d, 36b, 60, 61a, 62b, 62d, 62e, and 62f)

(The instances of use for this LS are summed up in App.72 Table 16)

Some instances of 'Self-Monitoring' strategies have not been used at all by students in either group (eg Q. 21c, 21d and 62d), but others have been used to varying degrees. Thus, when asked for instance, if they revised an essay they have just written to check for errors (Q.62e), 13 per cent in GIA and only 4 per cent in GIB said they usually did. But when they were asked to say which aspect of the language they paid most attention to and constantly checked for errors when they were writing an essay for instance, 68 per cent in GIA and 70 per cent in GIB selected 'Grammar', while 68 and 50 per cent for each group respectively, mentioned 'Vocabulary'. Furthermore, when asked whether while writing they checked for errors which their teacher had previously pointed out to them (Q.62b), 59 per cent in GIA and 50 per cent in GIB said they did.

'Monitoring Others' : (Questions 9. 44. 45a, 45b, 45c, 45d, 46a, 46b,46c, 46d, and 46e )

(The instances of use for this LS are summed up in App. 73 Table 17)

This strategy, in many instances, was more extensively used than the previous one. For instance, when students were asked if they corrected mentally to themselves other students' speech (Q.9), 54 per cent in GIA and 95 per cent in GIB said they 'often' did, while 45 and 4 per cent for each group respectively said they did so only 'sometimes'. When asked if they paid particular attention to their teacher's speech in order to learn from it (Q.44), the near totality of students (95 per cent in GIA and 90 per cent in GIB) said they 'often' did. As an additional source of information, they were asked to say to which particular linguistic feature they paid most attention to when someone was talking to them (Q.45) : 100 per cent in both groups put 'stress' (Q.45a) in first position, followed by 'gestures' (Q. 45c) and 'intonation' (Q.46b).

Finally, when they were asked on which aspect of the utterance they mostly concentrated on in order to understand someone who was talking to them rapidly (Q.46), stress was here again, pointed out by the majority of students in both groups :54 and 70 per cent for GIA and GIB respectively, while 31 per cent in GIA and 29 per cent in GIB said they concentrated on the speaker's gestures, and 22 and 45 per cent for each group respectively, said they concentrated on the speaker's face.

'External Monitoring': (Questions 21a, 21b, 22a, and 22b)

(The instances of use for this LS are summed up in App.74 Table 18)

By 'External-Monitoring' we meant the degree of teacher's intervention which the students thought would help them most in the various stages of the learning process.



Thus, when we asked them to say what kind of external monitoring they preferred in the early stages of the learning process (Q.21a), the majority of students in both groups, (90 per cent in GIA and 95 per cent in GIB ) said they learned better when they were firmly guided by their teacher. However, when they were asked the same question, but this time about later stages, we obtained quite different answers. Thus, for the 'Intermediate' stages of the learning process for instance, 77 per cent in GIA and 95 per cent in GIB said they also preferred to be firmly guided by their teacher while for the 'Advanced' stages, only 45 per cent in GIA but 87 per cent for GIB said they still learned better if they were firmly guided by their teacher. It appears therefore, that better students tend to be more and more autonomous as they advance in their learning process requiring therefore less and less intervention from their teacher, whereas less good students tend to rely heavily on their teacher in all the stages of the learning process.

'Planning': (Question 11)

(The instances of use for this LS are summed up in App.74 Table 19)

This strategy has also been extensively used. Thus when they were asked to say if they planned and thought exclusively in English while studying, 54 per cent in GIA and 50 per cent in GIB said they 'often' did, while 45 and 50 per cent for each group respectively said they did so 'sometimes'.

(ii) We shall now turn to discussing *cognitive* LS.

Table 5.16 summarises all the instances of use for this type of strategy.

LS	GIA		GIB	
	N	%	N	%
Formal Practice	11	47%	10	41%
Functional Practice	8	37%	7	29%
Being Active	7	31%	6	26%
Resourcing	9	40%	6	26%
Memorising	10	45%	12	51%
Inferencing	14	65%	13	54%
Question for Clarification	6	27%	7	30%
Translating (from/into Arabic)	6	27%	8	31%
Translating (from/into French)	7	31%	13	53%
Contextualisation	19	84%	9	38%
Avoidance	5	21%	10	42%
Miming	22	100%	23	98%

Table 5.16. Summary Table of Cognitive LS use in the Interview (First Year)

Cognitive strategies have been used to varying extent by both groups. For instance, 'Formal Practice' has been used by nearly the same proportion of students in both groups, but if we look at 'Contextualisation', we can see that while 19 students in Group A (i.e. 84 per cent) have reported using this strategy, in Group B instead, only 9 students (i.e. 38 per cent) said they did. In order to see to what extent and the circumstances in which each of these strategies was used we shall now discuss them in detail.

'Formal Practising': (Questions 6, 7, 10, 39a, 39b, 39c, 51, 64a, 64c and 64d)

(The instances of use for this LS are summed up in App.75 Table 20)

When students were asked how often they found themselves repeating words or phrases after their teachers in class (Q.6), 81 per cent in GIA and 4 per cent in GIB said they often did, while 18 and 58 per cent for each group respectively said they did so only sometimes. Similarly when asked how often they answered to themselves questions that were asked of the entire class (Q.7), 50 per cent in GIA and 25 per cent in GIB said they often did, but 36 and 20 per cent for each group respectively said they did so only sometimes. When they were asked to say what steps they followed in order to give an oral presentation in class (Q.39a), 81 per cent in GIA and 79 per cent in GIB said they usually wrote it and read it out in class, while 18 and 16 per cent for each group respectively said they just wrote down notes and then elaborated from there.



They were then asked whether they practised reading aloud in order to improve their pronunciation and intonation (Q.51): 40 per cent GIA and 12 per cent in GIB, said they often did, while 45 and 72 per cent for each group respectively said they did so only sometimes. Finally, when asked about what they usually did with an essay which their teacher had just handed them back (Q.64b), all students in both groups said they would read it for its comments, while 40 per cent in GIA and 20 per cent in GIB said they would rewrite it for themselves taking into account their teacher's comments.

‘Functional Practising: (Questions 31, 37a, 37b, 37c, 37d, 37e, 38a 38b, 38c, 42, and 58)

(The instances of use for this LS are summed up in App. 76 Table 21)

When we asked students if they used to speak English with their teachers after class (Q.31), 13 per cent in GIA and 12 in GIB said they often did, while 40 and 8 per cent for each group respectively, said they did so only sometimes. They were then asked to say what they usually did when they could not find a word they would have liked to use in a conversation (Q.37), 45 per cent in GIA and 50 per cent in GIB said they would even use a French word to keep the conversation (Q.37a) going, while 18 and 29 per cent for each group respectively, said they would try to describe the word (Q.37b), and 86 and 70 per cent for each respectively said they would try to paraphrase the word or expression they needed (Q. 37c). Quite a large proportion of students in both groups, 72 per cent in GIA and 50 per cent in GIB said they would also use gestures to get their message across.

As for their attitude in conversation (Q.38), 27 per cent in GIA and 54 per cent in GIB said they usually mostly listen (Q.38a), while 50 and 45 per cent for each group respectively, said they talk as much as the others, and a small proportion in both groups said they talk more than anyone else. Finally, when asked whether they had penfriends with whom they corresponded regularly (Q.58) 51 per cent in GIA and 16 per cent in GIB said they had.

‘Being Active’: (Questions: 8, 13, 17, 18, 19, and 36a)

(The instances of use for this LS are summed up in App. 77 Table 22)

We asked students to say whether they volunteered to answer in class (Q.8): 18 per cent in GIA and 4 per cent in GIB said they ‘often’ did while 36 and 25 per cent for each group respectively said they did so only sometimes. This means that in GIA

nearly 46 per cent volunteer very rarely or never. The corresponding proportion in GIB is much higher, 71 per cent.

Similarly, when asked how active they usually were in group activities (Q.13), 67 per cent in GIA said they were either very active or active, whereas in GIB 49 per cent of the students gave a similar answer. However, when asked how often they felt embarrassed if they were questioned in class (Q.17), 23 per cent and 54 per cent for each group respectively said they 'often' were, while 55 per cent in GIA and 25 per cent in GIB said they felt so only 'sometimes'. Similar patterns emerged for the questions dealing with their involvement in class (Q. 18 and 19): 'good' students tend to be more involved and enterprising than less good students.

'Resourcing': ( Questions : 12, 24d, 29d, 41, 43, 49b, 52, 53, and 54)

(The instances of use for this LS are summed up in App. 78 Table 23)

In many instances, this strategy was said to be extensively used by students in both groups. When they were asked for instance, whether they looked up in a dictionary the words they could not pronounce (Q.24d), 36 per cent in GIA and 54 per cent in GIB said they did. Similarly, when we asked them to say if they studied in grammar books the points which their teacher had just introduced (Q.29d), 40 per cent and 12 per cent in each group respectively said they did. When asked how often they listened to radio or tape recordings primarily to improve their pronunciation (Q.41) the majority of students in GIA said they did so sometimes (59 per cent) and only 5 per cent said they often did. But in GIB the majority (58 per cent) said they rarely did so. Similarly when asked if they consulted a dictionary when they heard (a) word(s) they had never met before (Q.49b), 59 per cent and 45 per cent in each group respectively, said they did. Finally, in the last three questions (Q. 52, 53 and 54) we wanted to know whether they used to read various reading materials in order to improve their learning of English. Their answers show that on the whole, students in GIA had resort to this strategy more often than their fellow students in the other group.

'Memorising': (Questions: 15, 27c, 29a, 29b, and 29c)

(The instances of use for this LS are summed up in App. 79 Table 24)

When we asked students to say if they usually memorised dialogues, stories, and so on, for further use in their writing or speech (Q.15), we obtained completely different answers: while in GIA 72 per cent of the students said they often did, the remaining students said they did so only sometimes. In GIB instead, 62 per cent said



they did so only sometimes while only 8 per cent said they often did. When it comes to memorising lexical items (Q. 27c) the strategy most students reported using, particularly in GIB (in which 79 per cent of the students said they did) was to write these items down many times until they remember them well. In GIA 45 per cent said they did so. Finally, in the last question (Q.29) they were asked what strategy they used to best remember a grammar structure they had just studied: the majority of students in both groups said they did so by remembering the examples associated with the rule (29c), while others said by simply learning it by heart.

'Inferencing': (Questions 20a, 24a, 24b, 32, 35, 47c and 55a)

(The instances of use for this LS are summed up in App. 80 Table 25)

The first question was aimed at investigating whether students preferred to figure out the language by themselves (i.e. deduction) or whether they preferred to be given all the rules by their teacher (Q.20a): It thus emerged that 59 per cent in GIA and 29 per cent in GIB said they preferred to guess; And when asked to say what they usually did when they found themselves confronted to (a) word(s) they could not pronounce (Q.24b), 59 per cent and 58 per cent in each group respectively said they usually tried to remember some previously learned rule and see if it could be applied in this case. Next, we looked at their strategy when they were involved in a conversation. We asked them if, taking into consideration the general context, they were able to provide the missing words in case the speaker faltered, 77 per cent in GIA and 54 per cent in GIB said they could. Finally, when we asked to say which strategy they used to find the meaning of a word they did not know while reading, 86 and 38 per cent for each group respectively, said they usually tried to deduce its meaning from clues in the sentence.

'Questions for Clarification': (Question 24c, 47a, 47b, 47d, and 49a)

(The instances of use for this LS are summed up in App. 80 Table 26)

These questions were primarily aimed at investigating the students' willingness to ask either their teacher or a fellow student, or any other person familiar with the FL for help in order to improve their understanding of a particular point. Thus, we asked them to say for instance, if they would ask a fellow student to help them pronounce a difficult word they had never met before (Q.29c): only 9 per cent in GIA and 7 per cent in GIB said they would. We then asked them to say if they asked their interlocutor to repeat something they did not understand (Q.47), 18 per cent and 25 per cent in each group respectively said they did. However, when the rest of the students (i.e. 59 per



cent in GIA and 29 per cent in GIB) found themselves in the same situation they said they would usually ask someone else to explain it to them. Finally, we asked them to say which strategy they used when following a lecture they heard (a) word(s) they did not understand (Q. 49), 27 per cent and 9 per cent in each group respectively said they would ask a fellow student to help them understand.

**‘Translating from/into Arabic’: (Questions 27a, 55b)**

(The instances of use for this LS are summed up in App. 81 Table 27)

The two instances in which students were asked to say if they used such a strategy turned out to be relatively little used. Thus, when we asked them for instance, if they learned new lexical items by translating them into Arabic (Q.27a), only 27 per cent in GIA and 37 per cent in GIB said they did. Similarly when they were asked to say if, while reading, they tried to find the Arabic equivalent of some difficult words they came across, 27 and 25 per cent in each group respectively said they did.

**‘Translating from/into French’: (Questions 27b, 55c, and 61c)**

The instances of use for this LS are summed up in App. 81 Table 28)

In both groups the use of French as a learning strategy turned to be more extensive than the use of Arabic. The same questions which have been used above about the use of Arabic in various areas of the language were also asked for the use of French. Our results show that for lexical items for instance, (Q.27b), 40 per cent in GIA and 50 per cent in GIB said they learned them better if they associated these with their French equivalent. In Reading, students also acknowledged they made a greater use of French (Q.55c). Finally, we asked them if they used various French words in their essay to replace English words they did not know, 9 per cent and 29 per cent in each group respectively said they did.

**‘Contextualisation’: (Questions 27d, and 49c)**

(The instances of use for this LS are summed up in App. 81 Table 29)

When students were asked to say what was the best way for them to learn new lexical items (Q. 27d), 90 per cent in GIA and 25 per cent in GIB said by using them in various sentences. They were also to say what they did if they found themselves unable to understand particular words during a lecture (Q. 49c), 77 per cent and 50 per cent in



each group respectively said they usually pay attention to the general context and environment in which these words were being used.

'Avoidance' (47e, 49d, 55d, 61b, 62a, and 62c)

(The instances of use for this LS are summed up in App. 82 Table 30)

There were only few instances in which this strategy was reported to be used. Thus, when we asked them for instance to say what they did when they found themselves confronted to a word or expression they could not understand during a lecture (Q.49d), 9 percent in GIA and 45 per cent in GIB said they would ignore it. Similarly when they were asked to say what they did in case they met in their reading words they could not understand, (Q.55d), 4 per cent in GIA said they would ignore it and carry on reading, but 70 per cent in GIB said they did so. As for Writing 54 per cent in GIA said they usually avoided writing a sentence in which they knew they would need a word they were not able to find, (Q. 61b): In GIB, 33 per cent said they would do so. Finally, when we asked them to say errors how they dealt with the errors which their teachers had pointed out to them before (Q.62c), 18 per cent 45 per cent for each group respectively said they avoided using these particular points.

On the whole therefore, most students and particularly among 'good' ones, do not have often resort to avoidance strategies. Instead they try to solve the difficulty they meet through the use of other more active strategies.

'Miming': (Questions 33, and 34)

(The instances of use for this LS are summed up in App. 82 Table 31)

This LS was said to be used extensively by all students regardless of their level of proficiency. In both instances, there was 100 per cent use.

We shall now turn to discussing the results for Fourth-Year students.

### 5.1.3.3. Results for Fourth-Year Students

We shall use the same procedure we followed for the discussion of First-Year students. However, since we already mentioned the content of the various questions we shall refer to, we shall limit ourselves in this section to discussing the results only.

We first established the frequency table for the scores we recorded (Table 5.17 ).

Score	Frequency	
	GI A	GI B
48	-	1
50	-	2
51	1	-
52	1	-
53	-	2
54	1	6
55	-	3
56	2	-
57	-	1
58	-	1
59	3	-
60	2	2
61	1	1
62	3	1
63	-	2
65	1	-

Table 5. 17 Frequency distribution of LS use in the Interview in the Fourth Year

This table shows that the scores obtained by Fourth-Year students ranged from (48), the minimum score which was achieved by one student in GI B, to (65), the maximum score which was achieved by only one student in GI A. This suggests that, on the whole, GI students showed more instances of LS use than their fellow students in GI (see Table 5.13 ). But in order to have a clearer view of the average LS use as well as the dispersion of the scores in each group, we established their mean and SD (Table 5.18 ).

	GI A	GI B
$\bar{X}$	58.53	52.64
SD	3.97	3.93

Table 5.18 Mean and SD in the Interview for the two groups in the Fourth Year.

When this table is compared with Table 5.14 above, we can see that First and Fourth-Year students show similar patterns in their means ( $\bar{X}$ ). For instance, the group of 'good' students have a relatively higher score than students in the group of 'less good' ones. However, when we look at the standard deviation (SD) in each Year, a striking difference appears: While in GI the SD between the two groups is relatively important,



in GII instead, it is nearly similar. This would suggest that among Fourth-Year students the dispersion of the scores within each group tends to be the same. We shall discuss later whether these differences are statistically significant or not.

We shall now turn to discussing the extent to which these LS have been used in each group. We shall first discuss metacognitive LS.

*(i) Metacognitive LS:*

Table 5.19 below summarises all the instances of use for this type of strategy.

LS	GII A		GII B	
	N	%	N	%
Self-Monitoring	10	66%	8	48%
Monitoring Others	11	70%	11	62%
External Monitoring	7	47%	9	54%
Planning	15	100%	12	71%

Table 5.19 Summary of Metacognitive LS use in the Interview (Fourth Year)

We shall now discuss the instances of use of each of these strategies.

*'Self-Monitoring':*

(The instances of use for this LS are summed up in App. 83 Table 32)

The same pattern of LS use as the one described for GI emerges in the answers of Fourth-Year students. Thus, some instances of 'Self-Monitoring' strategies as illustrated in questions 21c, 21d, and 62d have not been used at all, while others have been used extensively: Questions 60, and 62 for instance. Thus, only 33 per cent in GIIA and 17 per cent in GIIB said they revised their essays to check for the errors they could have committed.

As for the aspect of language which they paid most attention to when writing, all the students in both groups put 'grammar' in first position. Similarly, the majority of students in both groups, 100 per cent and 52 per cent for each group respectively, said they paid particular attention to the mistakes which have been previously pointed out to them by their teachers so that they do not make them again.

*'Monitoring Others':*

(The instances of use for this LS are summed up in App. 84 Table 33)

Most of the strategies students had to chose from have been extensively used in both groups. Thus, 93 per cent in GIIA and 88 per cent in GIIB said they either often or sometimes found themselves correcting mentally other people's erroneous speech. Similarly, all the students in both groups said they listened to teachers for the way they expressed themselves in order to learn from their speech.

There was also a very high rate of LS use when they were asked about which aspect of the language they mostly concentrated on when someone was speaking to them: 100 per cent in both groups said that 'stress' and 'intonation' were the most important ones to them. Finally, a large proportion in GIIA (53 per cent) but only 17 per cent in GIIB said they concentrated on the speaker's gestures to help them understand.

'External Monitoring' :

(The instances of use for this LS are summed up in App. 85 Table 34)

Similarly to First-Year students we wanted to know how those in the Fourth Year viewed the teacher's intervention in the learning process. Thus, all the students in GIIA and 94 per cent in GIIB said that on the early stages they wanted to be firmly guided by their teacher. But in the 'Intermediate' stage, 53 per cent and 76 per cent for each group respectively said they still wanted to be firmly guided. As for the 'Advanced' stage, only 20 per cent for GIIA and 35 per cent for GIIB said they wanted to be firmly guided by their teacher.

Thus a similar pattern to the one described for both groups in GI emerged. Even in the 'Advanced' stage in which Fourth-Year students were assumed to be, there still were many students who preferred to be firmly guided by their teachers. As expected, the majority of the students involved belonged to the group of 'less good' students.

'Planning' :

(The instances of use for this LS are summed up in App.85 Table 35 )

This strategy was also used extensively by students in both groups. However, students in GIIA reported using this strategy more often than those in GIIB. We shall now turn to discussing the use of cognitive strategies by Fourth-Year students.



*(ii) Cognitive LS:*

Table 5.20 below gives a summary of all the instances of use for this type of strategy.

LS	GII A		GII B	
	N	%	N	%
Formal Practice	8	53%	8	47%
Functional Practice	6	40%	5	28%
Being Active	5	36%	6	37%
Resourcing	12	82%	8	47%
Memorising	8	53%	8	47%
Inferencing	10	67%	11	65%
Question for Clarification	5	33%	4	21%
Translating (from/into Arabic)	3	20%	9	53%
Translating (from/into French)	2	18%	2	12%
Contextualisation	14	97%	9	53%
Avoidance	6	40%	7	41%
Miming	15	100%	17	100%

Table 5.20 Summary Table of Cognitive LS use in the Interview (Fourth Year)

As this table shows students in both groups have reported using all the strategies included in the Interview. However, the extent to which each of these strategies was said to be used varied greatly. Thus, in order to see the degree to which each of these has been used and on what occasion(s) they were used we shall now discuss the various questions which illustrated this type of strategy.

**'Formal Practising':**

(The instances of use for this LS are summed up in App. 86 Table 36)

In some instances this strategy was used extensively while in others it was largely ignored. For instance, all the students in GIIA and 80 per cent in GII B said they either repeated 'often' or 'sometimes' words and phrases after their teachers in order to learn them and use them afterwards. Similarly, the majority of students in both groups (73 per cent and 58 per cent in each group respectively) said they spoke to themselves in English, either often or sometimes. But, when it came to writing, and particularly about re-writing their essays in order to submit their work again to their teacher, no

student in either group said they did, only a few said they did rewrite it but only for themselves (40 per cent in GIIA and 29 per cent in GIIB).

Finally, only 40 per cent and 23 per cent in each group respectively, said they often read newspapers, magazines, and so on, primarily in order to improve their reading comprehension ability. Some students reported doing so as well, but only sometimes (45 and 58 per cent in each group respectively).

**'Functional Practice':**

(The instances of use for this LS are summed up in App.87 Table 37)

When we compare the use of this LS to the preceding one we can see that it was used less extensively. Thus, only 26 per cent in GIIA and none in GIIB said they often spoke with their teachers after class, while 40 and 11 per cent for each group respectively said they did so only sometimes.

When we asked them if, while speaking, they would use a French word to replace an English word they could not find, 40 per cent in GIIA and 23 per cent in GIIB said they would do so in order to get their message across. Alternatively, if they found themselves in a similar situation, the majority of students (100 per cent and 82 per cent for each group respectively) said they would try to paraphrase the word(s) they needed instead. As for their participation in a conversation very few students said they talked more than any one else (6 and 5 per cent respectively). The majority of the students in both groups said they were more likely to simply listen (53 and 82 per cent respectively). Finally, few students in either group had penfriends with whom they corresponded regularly: 40 per cent in GIIA and 23 per cent in GIIB said they had.

**'Being Active':**

(The instances of use for this LS are summed up in App.88 Table 38)

Very few students in both groups said they often volunteered to answer questions in class if they thought they knew the answer: 20 per cent in GIIA and 11 per cent in GIIB said they did so. The majority of those who said they did so only sometimes belonged to GIIB (60 per cent), whereas in GIIA only 29 per cent said they did so. As for their participation in a conversation 26 per cent in GIIA but none in GIIB said they were very active, while 46 and 35 per cent in each group respectively said they were just active.



The majority of students in GIIB (74 per cent) said they were either moderately active or not active at all. These answers can be better understood in the light of the following question in which they were asked to express the extent to which they felt embarrassed when they had to intervene in class: Only 13 per cent in GIIA but 58 per cent in GIIB said they were often embarrassed, while 60 and 41 per cent in each group respectively said they felt so only sometimes. This embarrassment was illustrated further by their attitude towards asking questions in class: 26 per cent but none in GIIA said they often did, whereas 40 and 29 per cent in each group respectively said they did ask questions but only sometimes, which means that in GIIB nearly 70 per cent of the student never or very rarely asked questions in class.

Similar patterns emerged in their answers to an identical question (Q.19). Finally, students in both groups (53 and 58 per cent in each group respectively) said they did try to communicate their ideas even if they knew that in the process they would be making errors.

#### 'Resourcing'

(The instances of use for this LS are summed up in App. 89 Table 39)

Like First-Year students, both groups in the Fourth Year, and particularly those in GIIA, have made an extensive use of this strategy. Thus, all the students in GIIA and 41 per cent in GIIB said they sometimes watched films and TV programmes in order to improve their English. The majority of the students in the latter however, (58 per cent) said they rarely did so. But when they were asked whether they used a dictionary to look up difficult words they could not pronounce, 66 per cent and 52 per cent in each group respectively said they did. Similarly, 80 per cent and 52 per cent in each group respectively, said they used reference materials to study further some grammar points which they had seen earlier in class.

As for listening to radio or tape recordings in order to improve their pronunciation, 93 per cent in GIIA and 70 per cent in GIIB said they did so sometimes. When it came to checking difficult words in a dictionary, 73 per cent and 41 per cent for each group respectively said they usually did. Finally, the last three questions were mainly concerned with the use of 'Reading' as a means of either furthering their knowledge of new lexical items, or improving their reading ability: The pattern that emerged in students' use of the various strategies shows that students in GIIA did have resort to the various LS more extensively than those in GIIB.

#### 'Memorising':

(The instances of use for this LS are summed up in App. 90 Table 40)

Many students in both groups said they memorised dialogues, stories and so on, from their readings in order to use them later: Thus 86 per cent in GIIA and 41 per cent in GIIB said they often did.

When it came to memorising new lexical items, 93 per cent and 47 per cent in each group respectively said the strategy they used most often was to write these items down many times until they remembered them well. Finally, when the same question was asked but about grammar structures which have just been studied, only 6 per cent in GIIA and 5 per cent in GIIB said that the LS they most often used to remember them was by learning them as grammatical formulae, while 40 and 58 per cent for each group respectively said that they learned them better if they remembered them as verbal rules, and finally, 80 per cent and 64 per cent in each group respectively, said they preferred to learn these points by remembering the examples associated with the rules.

When we look at students' answers to this last question the interesting feature which emerge is that some strategies turned out to be used simultaneously, i.e. A combination of more than one strategy was used for learning a specific item. This point will be discussed later.

#### 'Inferencing':

(The instances of use for this LS are summed up in App.90 Table 41)

Students who preferred to figure out the language by themselves instead of having the teacher give them the rules were more numerous in GIIA than in GIIB. Thus, in the former 73 per cent said they preferred to learn in this way, whereas in the latter only 35 per cent said they used this strategy to learn better, which means that the majority prefer to be given the rules by their teacher.

When confronted to a word they could not pronounce, 66 and 47 per cent in each group respectively, said they usually tried to guess. The strategy they would use in both groups in comparatively similar proportion in order to understand a joke they would have missed was to try and think about the way it was told. Finally, when it came to the strategy they would use in order to understand a word they did not know while reading was to try and guess its meaning from clues in the sentence.

#### 'Questions for Clarification':

(The instances of use for this LS are summed up in App.91 Table 42)



Most students in GIIA, 53 per cent, but only 35 per cent in GIIB said they usually required the help of the teacher or another fellow student to help them pronounce a difficult word for instance.

However, when outside the classroom very few students in either group would ask questions which would help them understand better. For instance, only 6 per cent in GIIA and none in GIIB said they would ask questions to someone who had just told them a joke they could not understand, but some of them said they would nevertheless ask someone else to explain it to them (40 per cent and 17 per cent in each group respectively). Finally, no student in GIIA and few ones in GIIB only (11 per cent) said would ask a fellow student to explain to them words which they could not understand during a lecture.

**'Translating from/into Arabic':**

(The instances of use for this LS are summed up in App. 91 Table 43)

The only instance when this strategy was said to be used was in connection with the acquisition of lexical items: 40 per cent in GIIA and 76 per cent in GIIB said they learned English words better when they associated them with their Arabic equivalent. However, none in GIIA and only 35 per cent in GIIB said that they would try and find, while reading, the Arabic equivalent word for some difficult English one.

**'Translating from/into French':**

(The instances of use for this LS are summed up in App.92 Table 44)

This strategy turned out to be less used than we actually expected. Thus for the acquisition of lexical items for instance, only 26 per cent in GIIA and 11 per cent in GIIB said they did use French in order to learn them better. Even fewer students (13 and 11 per cent in each group respectively) said they would think of a French equivalent for a difficult English word they would meet.

Finally, very few students acknowledged the use of French words in their essays to replace some English words which they could not find: Only 13 per cent in GIIA and 11 per cent in GIIB said they did.

**'Contextualisation':**

(The instances of use for this LS are summed up in App. 92 Table 45)

This LS was among the most extensively used cognitive strategy in both groups. For instance, 93 per cent in GIIA and 29 per cent in GIIB said that the best way they learned new words was to write them down many times in meaningful sentences. Similarly, when they were asked about which strategy they would use if they found themselves unable to understand some of the words that a lecturer would have been using, all GIIA students and 70 per cent in GIIB said they would pay particular attention to the context in which these words would have been used.

**`Avoidance':**

(The instances of use for this LS are summed up in App. 93 Table 46)

Unlike First-Year students who tried not to use this strategy in favour of other more active strategies to compensate for their lack of knowledge in a particular area, students in the Fourth Year seem to have more often resort to avoidance strategies . Thus, 13 per cent in GIIA and 29 per cent in GIIB said they gave up paying attention to a lecture in which they would meet important words they could not understand. Similarly, when writing the majority of students in both groups (80 and 82 per cent respectively) said they would rewrite a sentence if they realised they could not find the word(s) they needed.

**`Miming':**

(The instances of use for this LS are summed up in App. 93 Table 47)

Like First-Year students, those in the Fourth Year, irrespective of the group to which they belonged have made an extensive use of this strategy.

We have now looked at all the LS which have been included in the Questionnaire and the Interview, and as our discussion of the results has shown, students in both the First and Fourth Year appear to have made an extensive use of these strategies. However, the objection that can be raised against our relying exclusively on these results to support our claim that all students, irrespective of their degree of exposure to the TL (i.e. GI or GII) and their learning stage in the foreign language ( i.e. Group A or B), make use, albeit to varying degrees, of various LS to help them acquire the foreign language, is that the strategies which students have reported using were already included in our eliciting instruments, and thus, they could have simply used them because they were suggested to them.



What we need therefore, in order to discuss our research questions later, is further corroborative evidence for these preliminary findings. Furthermore, for this evidence to be convincing, students should be seen performing various language learning tasks during the process of which they should be seen using learning strategies without any external intervention. It is for this purpose that we included in the Interview various open-ended questions and language learning activities (see 4.3.3.2.1. above) with the purpose of providing such evidence.

#### 5.1.3.4. Productivity of the LS in the Open-ended Questions and the Language Learning Tasks:

We shall first give a summary of the various language learning areas covered by the open-ended questions and learning tasks (to which we shall henceforth refer as 'Tasks') included in the Interview. (Table 5.21 )

LANGUAGE SKILLS	OPEN-ENDED QUESTIONS		TASKS TO PERFORM
	Various Lang. Items	Learning in General	
Speaking (Q. 40)	Learning the Sound System (Q. 23-25)	Memorisation (Q.16)	Steps involved in understanding the meaning of a new word (Q.16)
Listening (Q.50)	Learning the meaning of a new word (Q.28)	Taking Notes (Q.48)	Reading Comprehension (Q.56)
Reading (Q.57)	Learning Grammar (Q.30)	Keeping track of errors (Q.59,62a, and 63)	
Writing (Q. 65)			

Table 5.21 Language Learning Areas covered by the Open-ended Questions and Tasks in the Interview.

As this table shows, we have tried to cover in this section of the Interview most of the areas involved in FL acquisition. Our principal aim in doing so was to collect as many instances of LS use as possible to use as evidence in support of our first research

question. This is why, at this stage, we shall neither consider the differences in LS use between First and Fourth-Year students on the one hand, nor the differences between 'good' or 'less good' ones within each Year on the other hand. This will be discussed later.

The following procedure was followed in order to obtain the summary tables below. First, we looked at the transcripts of students' answers to the various open-ended questions and tasks (see App. 61 for an illustration ), and then, we analysed these statements for evidence of LS use. The strategies we identified were then labelled and classified in terms of the particular language skill or language item with which they were used.

We must be point out that if the labelling of some strategies proved easy because similar ones were already used in either the Questionnaire or the Interview, in many instances we had to provide our own labelling for many strategies which were suggested by students in both Years. These will be discussed in more details below.

Thus, Table 5.22 below gives a summary of the strategies which have been used in connection with the acquisition of the four language skills.



	SPEAKING	LISTENING	READING	WRITING
<b>(i) Metacognitive LS :</b>				
Self-Monitoring	x	-	-	x
Monitoring Others	x	x	-	-
External Monitoring	-	-	-	-
Selective Attention	-	x	x	-
Planning	x	-	-	x
Delaying	-	x	-	-
<b>(i) Cognitive LS :</b>				
Functional Practice	x	-	-	x
Formal Practise	x	-	x	x
Avoidance	x	x	x	x
Being Active	x	-	-	-
Question for Clarification	-	x	-	-
Translating (French)	x	x	x	x
Translating (Arabic)	-	-	x	-
Guessing	-	x	-	-
Repetition	-	x	-	-
Resourcing	-	x	x	-
Inferencing	-	-	x	-
Memorising	-	-	x	-

(x) indicates that this LS was used  
 (-) indicates that the LS was not used

Table 5.22 LS used in answering the various open-ended questions and performing the various Tasks related to the Acquisition of Language Skills

Table 5.23 below shows all the strategies which have been used in connection with the acquisition of various language items, and finally, Table 5.24 shows all the LS which have been used during the investigation of the learning process in general.

	Sound System	New Word	Grammar
<b>(i) Metacognitive LS :</b>			
Self-Monitoring	x	-	-
Monitoring Others	x	-	-
Selective Attention	x	-	-
Planning	-	x	-
Self-Management	-	-	x
<b>(i) Cognitive LS :</b>			
Formal Practise	x	-	-
Translating (French)	-	x	-
Repetition	x	x	-
Resourcing	-	-	x
Contextualisation	-	x	-
Memorising	-	x	x
Imagery	-	x	-

Table 5.23. LS used in answering the various open-ended questions and performing the various Tasks related to the Acquisition of Language Items

	Memorisation	Taking Notes	Errors
<b>(i) Metacognitive LS :</b>			
Self-Monitoring	-	-	x
Monitoring Others	-	-	x
External Monitoring	-	-	x
Self Management	-	-	x
Directed Attention	-	-	x
Selective Attention	-	x	-
<b>(i) Cognitive LS :</b>			
Formal Practise	x	-	x
Being Active	-	-	x
Translating (French)	x	x	x
Translating (Arabic)	x	x	x
Imagery	x	-	-
Auditory Representation	x	-	-
Mnemonic	x	-	-
Memorising	-	x	-

Table 5.24. LS used in answering the various open-ended questions and performing the various Tasks related to Language Learning in General.



Once the LS which students have made use of were listed in terms of the type to which they belonged (i.e. metacognitive or cognitive), we then tried to summarise for each of the areas we covered the actual number of strategies which belong to either type (i.e. by looking in each column at the number of (x)). Thus, our results are summed up in the table below (Table 5.25 ).

	Metacognitive LS	Cognitive LS	TOTAL
Speaking	3	6	09
Listening	3	5	08
Reading	1	8	09
Writing	2	4	04
Learning the Sound System	3	2	05
Learning New Words	1	5	06
Learning Grammar	1	3	04
Memorisation	-	4	04
Taking Notes	1	1	02
Keeping track of Errors	5	3	08

Table 5.25 Summary of the LS which have been used in each area of the learning process.

For 'Speaking' for instance, this table shows that a total of 9 different strategies have been used among which 6 were cognitive LS and 3 metacognitive ones. The actual number of strategies which each student in either group has used will be discussed later.

Finally, before looking at our research questions proper, we think it necessary to give the definitions of the strategies which have been used by students but which we have not covered in our earlier discussion (see 4.3.3.1.2. and 4.3.3.2.3.).

*(i) Metacognitive LS:*

1) 'Selective Attention': In using this strategy, the learner decides in advance to attend to specific aspects of language input or situational details that will prompt the retention of language input.

2) 'Directed Attention': In this case, the learner decides in advance to attend in general to a learning task and to ignore irrelevant distractors.

3) 'Self-Management': The learner tries to understand the conditions that help one learn and arranges for the presence of those conditions.

4) 'Delaying ': The Learner asks the speaker to repeat what he/she has just said so that he can think more carefully about what he has just heard.

*(ii) Cognitive LS:*

1) 'Imagery ': The learner relates new information to visual concepts in memory via familiar easily retrievable visualisations, phrases or locations.

2) 'Auditory representation': The learner remembers the sound or similar sound for a word, phrase, or longer sequence.

3) 'Mnemonics' (Association): The learner uses various techniques to aid his memorisation.

## **5.2. Discussion of the Research Questions :**

We have now discussed all the instances of LS use provided in our Questionnaire, Interview and Tasks. On the basis of these results we shall now turn to discussing our research questions.

### **5.2.1. First Research Question :**

We shall discuss this question in two different stages. First, we shall look at the overall distribution of LS among First and Fourth Year students respectively, and second, we shall see whether these LS fit within the classification framework we have adopted.

In support of our first claim we can say confidently, that our findings provide strong evidence for our claim that LS are inherent to the learning process and that all learners, irrespective of their stage in the learning process or their proficiency in any given stage will have an extensive resort to learning strategies during the acquisition process.

In the Questionnaire for instance, First and Fourth-Year students have shown that they used these LS in all the areas of the learning process. As our findings show (Table 5.6) an average of 23 strategies was used in the Fourth Year and 24 in the First



Year. This suggests that in both Years, at least 60 per cent of the available strategies were reported to have been used. The same pattern emerges when we look at the Interview (Table 5.14). The average number of LS used was 55 and 53 LS for each group respectively, which represents at least, 66 per cent of all the available LS in the Interview.

If in addition, we consider the combined answers of the students who answered the Questionnaire and the Interview, we shall see that out of a total of 118 LS (i.e. 38 included in the former and 80 in the latter), First-Year students have reported an average use of 77 LS (which represents 65 per cent of the total number of the available LS), while Fourth-Year students used an average of 78 LS (i.e 66 per cent of the total number of LS).

However, as already pointed out, relying exclusively on these results to support our claim could have been criticised on the ground that these LS were already available in the eliciting tools and therefore, their extensive use by all the students was but the result of chance. This is why we think that our strongest corroborative evidence comes from our findings in the analysis of students' answers to the various open-ended questions and their dealing with the language learning tasks (Tables 5.22 to 5.24 above). These findings show convincingly, that students irrespective of the Year or the particular group within this Year to which they belong, have all reported using various strategies in the process of acquiring the foreign language. Furthermore, they have also shown that they could report and describe the strategies they used. This shows that as we assumed, students could have access to these strategies .

As for the classification of these LS, the framework we adopted to classify the various strategies included in the Questionnaire and the Interview, turned out to account satisfactorily for all the strategies which students have come up with either in the Questionnaire, the Interview or the various open-ended questions and language learning tasks. That is to say that all the strategies we recorded could be classified as either belonging to the metacognitive or cognitive type.

The extent to which each type has been used as well as the specific strategies which illustrate each of them and the differences in LS use between First and Fourth-Year students will be discussed later. As for the extent to which specific LS have been used in connection with a particular area of the language, this will now be discussed in our second research question

### 5.2.2. Second Research Question:

Our discussion of the second research question will also be carried out in two separate stages. First, we shall discuss the results and how these have been obtained, and then we shall discuss the question proper in relation with each of the language acquisition areas we have covered in our investigation.

#### 5.2.2.1. Results

Before looking at our results we shall first explain the procedure we have followed to obtaining them.

##### 5.2.2.1.1.1. Procedural points.

In order to arrive at the summary table which will be at the basis of our discussion (Table 5.27), we first looked, for each group of students, at all the instances of LS use for each skill (eg Writing, Reading, and so on) and language learning activity (learning Grammar, Vocabulary, and so on) which were included in each of the eliciting instruments, and we then established the total number of times each strategy was used in connection with this particular area of the language. For instance, these are the results we obtained for the LS used in connection with 'Speaking' in the Interview. (Table 5.26).

LS	First Year		Fourth Year	
	GIA	GIB	GIIA	GIIB
(i) Cognitive :				
- Functional Practise	34	22	14	10
- Formal Practise	12	5	10	11
- Avoidance	10	14	4	5
- Being Active	7	5	14	12
- Questions for Clarification	12	10	12	15
- Translating (French)	8	6	10	14
(ii) Metacognitive :				
- Self Monitoring	13	12	10	12
- Planning	7	2	8	7
- Monitoring Others	14	16	17	14

Table 5.26 LS used in connection with acquisition of 'Speaking' in the Interview.



Thus, from this table we can say that for all the questions related to the acquisition of 'Speaking' contained in the Interview, we recorded 34 instances of use of 'Functional Practice' among the group of 'good' students (GIA) in the First Year and 22 instances in the group of 'less good' ones (GIB), whereas in the Fourth Year, we recorded 14 instances of use in GIIA and 10 in GIIB.

We then listed in the same way, all the LS used in connection with the same skill in the Questionnaire, and finally in the open-ended questions and tasks. All these results have been merged into one single table which we shall use to discuss each area of the language. For 'Speaking' for instance, Table 5.27 illustrates the final results of our investigation about the LS which were associated with this skill in all the eliciting instruments.

This Table can be read either vertically or horizontally. Horizontally, it shows for each LS the number of instances it was used by First and/or Fourth-Year students (which we symbolised (1) and (4) respectively) in each of the eliciting instruments: the Questionnaire, (we symbolised (Qre)), the Interview (we symbolised (Int.)) and the various open-ended questions and language learning tasks (we symbolised Tasks). The column entitled 'Total', summarises for each group the number of instances of use we recorded throughout the experiment for a particular LS. Thus, for the First Year for instance, if we look at 'Formal Practise', we can see that it was used in a total of 113 instances: 69 times in the Questionnaire, 27 in the Interview, and 17 in the Tasks.

Vertically, it gives for each group of students the illustration of the various cognitive and metacognitive strategies which were used in a particular eliciting instrument for a given group of students. The row entitled 'Total' gives for each year the total number of LS (both cognitive and metacognitive) which have been used in a particular instrument. Thus, if we look at First-Year students, we can see that the total number of LS they used in the Questionnaire is 435, while in the Interview there were 404 LS, and in the Tasks, 209.

	Qre		Interview		Tasks		TOTAL	
	1	4	1	4	1	4	1	4
(i) Cognitive LS:								
- Formal Practise	69	41	27	32	17	21	113	94
- Functional Practise	-	-	166	98	56	24	222	122
- Being Active	55	48	19	18	12	26	86	92
- Questions for Clarification	139	80	-	-	22	27	161	107
- Translating (Arabic)	19	6	-	-	-	-	19	6
- Translating (French)	55	54	-	-	14	24	69	78
- Translating (another Lang.)	4	5	-	-	-	-	4	5
- Avoidance	7	6	-	-	24	9	31	15
- Inferencing	-	-	74	61	-	-	74	61
- Miming	-	-	91	45	-	-	91	45
(ii) Metacognitive LS :								
- Self-Monitoring	87	54	27	14	25	22	139	90
- Monitoring Others	-	-	-	-	30	31	30	31
- Planning	-	-	-	-	9	15	9	15
<b>TOTAL :</b>	<b>435</b>	<b>294</b>	<b>404</b>	<b>268</b>	<b>209</b>	<b>199</b>	<b>1048</b>	<b>761</b>

Table 5.27 LS used in connection with the Acquisition of Speaking' in the various eliciting instruments.

We shall first look at language skills, and then with the other language learning activities.

#### 5.2.2.1.1.1. Language Skills

We shall discuss the various language skills as they appear Table 5.21. above, i.e. Speaking, Listening, Reading and Writing.

#### 5.2.2.1.1.1.1. Speaking

We shall discuss the results for each year separately. In the First Year (GI) we recorded a total of 1048 instances of LS use in all three instruments 870 (83 per cent) of these were cognitive strategies and the remaining ones, 178 (i.e. 17 per cent) were



metacognitive. The former were exemplified by 10 different strategies and the latter by only 3 different ones (see Table 5.27 above). If we look at the specific LS used in either type we shall see that some have been used more extensively than others. For instance, among cognitive LS 'Functional Practise' was used in 222 instances, which represent 25 per cent of the total cognitive LS use, while 'Question for 'Clarification' was used in 161 instances (i.e 18 per cent), and 'Formal Practise' 113 times (13 per cent).

As for metacognitive ones, 'Self-Monitoring' was by far, the most extensively used strategy, while 'Planning' was used in only a few instances. Furthermore, we can also notice that while some LS, like 'Translating' from/into either language were used exclusively in the Questionnaire, others instead, like 'Formal Practice' occurred in all three instruments, and others were used in at least two instruments, for instance 'Questions for Clarification' can be found in the Questionnaire and the Tasks. Metacognitive LS also follow the same pattern.

The frequency of occurrence of these LS is summed up in Table 5.28 below which gives for each strategy, the total number of instances it was used throughout the experiment. The strategies have been classified in decreasing order of use, and for each of them we give the percentage it represents in relation to the type of LS (either metacognitive or cognitive) to which it belongs.

Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Functional Practice	222	25%
2)	Question for Clarification	161	18%
3)	Formal Practise	113	13%
4)	Miming	91	11%
5)	Being Active	86	10%
6)	Inferencing	74	9%
7)	Translating (French)	69	8%
8)	Avoidance	31	3%
9)	Translating (Arabic)	19	2%
10)	Translating (another Language)	4	1%
	(ii) Metacognitive LS:		
1)	Self-Monitoring	139	78%
2)	Monitoring Others	30	17%
3)	Planning	9	5%

Table 5.28 Frequency of LS use in connection with the Acquisition of 'Speaking' in the First Year.

As this table shows, a strategy like 'Translating' into either French or Arabic has been used very little. We recorded only 69 instances of 'Translating' from or into French, and 19 for Arabic. There were however, some strategies which were extensively used: for instance, 'Functional Practise', 'Question for Clarification' and 'Formal Practise' were among the most recurring strategies in connection with 'Speaking'.

As for metacognitive LS, among the three types used, 'Self-Monitoring' by itself, represented 78 per cent of all the LS of this category.

When we look at the results for Fourth-Year students (GII), a nearly identical pattern emerges. Thus, we recorded a total of 761 instances of LS use, among which 625 (i.e 82 per cent of all the LS used) were cognitive ones and were exemplified by 10 different strategies, similar to the ones used by students in GI, and 136 were metacognitive ones, and were exemplified by 3 different strategies similar to those used in GI (see Table 5.27. above).

We must point out that the smaller figures for LS use obtained in 'Speaking' for GII, and all the other areas of the foreign language which we shall discuss, must not be taken as an indication that less strategies have been used by Fourth-Year students. In fact, this is mainly due to the relatively smaller number of students in GII (N =72) when compared to the number of students in GI (N = 99). Evidence for this can be found in the average number of LS use (i.e. Mean) we established for each group: Thus, in GI the average number of LS use for 'Speaking' was 7.22 per student, whereas in GII it stands at 7.31. This shows that there was a nearly identical proportion of strategies used by students in each group. As for the frequency distribution of these LS we can see (Table 5.29 below) that 'Functional Practise' for which we recorded 122 instances of use (i.e. 19 per cent of the total use of cognitive LS) was the most extensively used strategy, closely followed by 'Questions for Clarification', (with 107 instances of use), and 'Formal Practise' (with 94 instances). If we compare these results with the ones we obtained for GI (see Table 5.28. above), we shall see that as far as the frequency of occurrence of these LS is concerned, it is exactly identical. The same pattern emerges for the LS which have a low frequency of occurrence as well. In GII, like GI, 'Translation' from/into French or Arabic were among the least used LS.

Similarly to GI, some LS have occurred more often with one type of eliciting instrument than with another. Thus, (see Table 5.27. above), 'Questions for Clarification' occurred only in the Questionnaire, and the Interview, while 'Formal Practise' and 'Being Active' were used in all 3 instruments, and 'Miming' occurred exclusively in the Interview.



As for metacognitive LS, similarly to the use made by students in GI, 'Self-Monitoring' turned out to be the most extensively used strategy: We recorded 90 instances of use (i.e. 66 per cent of all metacognitive LS use in 'Speaking'), followed by 'Monitoring Others' which was used less often, and finally 'Planning' used to a much smaller extent still. The distribution of these LS in the various eliciting instruments turned out to be identical to the one described for GI. For instance, 'Self-Monitoring' occurred in all the instruments, while the two other LS occurred exclusively in the Tasks section.

Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Functional Practice	122	19%
2)	Question for Clarification	107	17%
3)	Formal Practise	94	15%
4)	Being Active	92	14%
5)	Translating (French)	78	11%
6)	Inferencing	61	9%
7)	Miming	45	7%
8)	Avoidance	15	3%
9)	Translating (Arabic)	6	1%
10)	Translating (anotherLanguage )	5	1%
	(ii) Metacognitive LS:		
1)	Self-Monitoring	90	66%
2)	Monitoring Others	31	22%
3)	Planning	15	11%

Table 5.29 Frequency of LS use in connection with the Acquisition of 'Speaking' in the Fourth Year

These findings lead us to make two different observations, and we say observations, because at this stage our evidence is still sketchy to say conclusions: First, it becomes clear that all students, irrespective of the learning stage to which they belong, tend to use the same learning strategies when dealing with the acquisition of a particular area of the foreign language. Furthermore, some of these strategies, either cognitive or metacognitive, tend to be used more often than others by both advanced and less advanced students. This suggests that some LS tend to occur more often with one type of eliciting instrument than with another. But, as we already pointed out, these are to be taken only as preliminary conclusions in need of further corroborative

evidence which we shall try to find in our discussion of the remaining areas of language acquisition.

#### 5.2.2.1.1.1.2. 'Writing'

All the instances of LS use we have recorded for the acquisition of this skill are summed up in Table 5.30 below.

Thus, for GI we recorded a total of 731 instance of LS, among which 418 (i.e 57 per cent) were cognitive strategies and 313 were metacognitive ones. The former were illustrated by 7 different strategies and the latter by only two. Similarly to the acquisition of 'Speaking', cognitive LS have been used more extensively than cognitive ones. Furthermore some LS in either type, have been used more often than others. For example, we recorded 189 instances of use for 'Formal Practise', while 'Functional Practise' has only been used in 25 instances (the frequency of occurrence of all the LS encountered are summed up in Table 5.31 below). As for their distribution in the various eliciting tools we can see that it follows the same pattern as the one we already described for 'Speaking'. Some cognitive LS occurred in all the instruments (eg 'Formal Practise' and 'Translating from/into French') while others have occurred in only two, for instance, 'Functional Practise' and 'Avoidance' which appeared in the Interview and Tasks, but not in the Questionnaire. Finally, some strategies like 'Translating from/into Arabic' and 'Being Active' occurred exclusively in the Questionnaire.

The striking feature in this distribution is that the strategies which students in GI have used in one or more eliciting instruments, turned out to be similar to the ones used by students in GII in exactly the same instruments. For instance 'Formal Practise' was used by both groups in all the instruments, but 'Functional Practise' in both GI and GII, was only used in the Interview and Tasks, and 'Translating' in either French or Arabic was used exclusively in the Questionnaire. If we look at the two metacognitive LS used, we shall see that 'Self-Monitoring' was used by both groups in all the eliciting instruments, while 'Planning' was only used in the Interview and Tasks by both groups.



	Qre		Interview		Tasks		TOTAL	
	1	4	1	4	1	4	1	4
(i) Cognitive LS:								
- Formal Practise	64	41	88	52	32	20	189	113
- Functional Practise	-	-	15	10	10	15	25	25
- Being Active	53	42	-	-	-	-	53	42
- Translating (Arabic)	16	5	-	-	-	-	16	5
- Translating (French)	58	52	9	4	12	7	79	63
- Translating (another Lang)	4	5	-	-	-	-	4	5
- Avoidance	-	-	34	35	18	11	52	46
(ii) Metacognitive LS :								
- Self-Monitoring	87	54	117	95	25	27	229	176
- Planning	-	-	55	70	29	26	84	96
<b>TOTAL :</b>	<b>287</b>	<b>199</b>	<b>318</b>	<b>266</b>	<b>126</b>	<b>106</b>	<b>731</b>	<b>571</b>

Table 5.30 LS used in connection with the Acquisition of Writing' in the various eliciting instruments.

Metacognitive strategies showed the same tendency as well: 'Self-Monitoring' have been used in 229 instances in all three instruments, while 'Planning' has only been used in 84 instances and occurred in all the instruments but the Questionnaire.

The table below (Table 5.31) shows that some cognitive or metacognitive strategies have been used more extensively than others: 'Formal Practise', for instance represents 37 per cent of all cognitive LS use, while 'Translating from/into Arabic' represents only 3 per cent of all the instances of use of this type of LS. Similarly when we look at metacognitive strategies, we can see that although only two different strategies have been used, 'Self-Monitoring' represents by itself, 73 per cent of all metacognitive LS use in the acquisition of 'Writing'.

Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Formal Practise	189	45%
2)	Translating (French)	79	18%
3)	Being Active	53	12%
4)	Avoidance	52	12%
5)	Functional Practise	25	6%
6)	Translating (Arabic)	16	3%
7)	Translating (another Language)	4	1%
	(ii) Metacognitive LS:		
1)	Self-Monitoring	229	73%
2)	Planning	84	26%

Table 5.31 Frequency of LS use in connection with Acquisition of 'Writing' in the First Year

For students in GII, we have recorded a total of 571 LS which were subdivided into 229 cognitive LS (i.e. 62 per cent of the total use of strategies) and 272 metacognitive ones. These were illustrated by the same LS as the ones already described for GI, and their distribution in the various eliciting instruments was similar to the one we discussed for GI (see Table 5.30 above). What differs however, is their frequency of occurrence in each group. Thus, in both groups for instance, the first two cognitive strategies which occurred most often were similar i.e. 'Formal Practise' which was used in 113 instances in GI (i.e. 37 per cent of the total cognitive LS use), and in 189 instances in GII (i.e. 45 per cent of all the cognitive LS used), followed by 'Translating from/into French' (see Table 5.32 below).

The third most important strategy differs however: Thus, while in GI 'Being Active' came in third position, in GII, it turned out to be 'Avoidance' instead. As for the strategies which have been least used, i.e. 'Translating from/into Arabic' and 'from/into another language', they were identical in both groups.



Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Formal Practise	113	37%
2)	Translating (French)	63	21%
3)	Avoidance	46	15%
4)	Being Active	42	14%
5)	Functional Practise	25	8%
6)	Translating (Arabic)	5	2%
7)	Translating (another Language)	5	2%
	(ii) Metacognitive LS:		
1)	Self-Monitoring	176	64%
2)	Planning	96	35%

Table 5.32 Frequency of LS use in connection with Acquisition of 'Writing' in the Fourth Year

As for metacognitive LS, their use in GII was in every respect, similar to the use which students in GI have made of. Thus, there were only two strategies used: 'Self-Monitoring' and 'Planning'. The former was most extensively used in both groups: It represents 64 per cent of the total use of this type of LS.

#### 5.2.2.1.1.1.3. 'Listening'

All the strategies used in connection with 'Listening' in all the eliciting instruments, are summed up in Table 5.33 below.

For First-Year students we recorded a total of 986 instances of LS use, among which 677 (i.e. 69 per cent) were cognitive strategies which were exemplified by 11 different strategies, and 309 were metacognitive ones, and were illustrated by 3 strategies. The distribution of these LS shows some interesting features: While for both GI and GII most of the cognitive LS were used in the Interview and the Questionnaire, most metacognitive strategies instead, were mainly used in the Tasks section.

	Qre		Interview		Tasks		TOTAL	
	1	4	1	4	1	4	1	4
(i) Cognitive LS:								
- Functional Practise	-	-	38	30	-	-	38	30
- Being Active	73	55	-	-	-	-	-	-
- Questions for Clarification	222	120	30	12	-	-	252	132
- Translating (Arabic)	13	7	-	-	-	-	-	-
- Translating (French)	30	11	-	-	23	14	53	25
- Translating (another Lang.)	4	5	-	-	-	-	-	-
- Avoidance	3	8	-	20	18	13	21	47
- Inferencing	-	-	16	18	-	-	16	18
- Resourcing	93	59	46	71	12	28	151	158
- Contextualisation	-	-	-	27	-	-	-	27
- Guessing	-	-	-	-	21	27	21	27
- Repetition	-	-	-	-	35	43	35	43
(ii) Metacognitive LS :								
- Monitoring Others	-	-	235	203	31	33	266	236
- Selective Attention	-	-	-	-	20	21	20	21
- Delaying	-	-	-	-	23	9	23	9
<b>TOTAL :</b>	<b>438</b>	<b>265</b>	<b>35</b>	<b>381</b>	<b>283</b>	<b>188</b>	<b>986</b>	<b>834</b>

Table 5.33 LS used in connection with the Acquisition of 'Listening' in the various eliciting instruments

The frequency of use for each of these LS is summed up in the table below (Table 5.34)



Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Question for Clarification	252	37%
2)	Resourcing	151	22%
3)	Being Active	73	11%
4)	Translating (French)	53	8%
5)	Functional Practise	38	6%
6)	Repetition	35	5%
7)	Avoidance	21	3%
8)	Guessing	21	3%
9)	Inferencing	16	2%
10)	Translating (Arabic)	13	2%
11)	Translating (another Language)	4	1%
	(ii) Metacognitive LS:		
1)	Monitoring Others	266	86%
2)	Delaying	23	7%
3)	Selective Attention	20	6%

Table 5.34 Frequency of LS use in connection with Acquisition of 'Listening' in the First Year.

As this table shows, the two cognitive strategies which were most extensively used in connection with the acquisition of 'Listening' were 'Questions for Clarification' (for which we recorded 252 instances of use (i.e. 37 per cent of all the cognitive strategies used), and 'Resourcing' which was used in 151 instances (i.e. 22 per cent). The other strategies have been used to a much smaller extent, and some in fact, were used in nearly insignificant number. For instance, 'Inferencing' represented only 2 per cent of all the LS of this type, and 'Translating' in either Arabic or another language was even less used: We recorded only 13 and 4 instances respectively. However, 'Translating from/into French' was more extensively used than the other translating strategies: we recorded 53 instances of use (i.e. 8 per cent of cognitive LS use).

Similarly, among the metacognitive strategies 'Monitoring Others' represented by itself 86 per cent of the total use of this type of strategy. The other two were nevertheless used to a much smaller extent.

As for students in GII, we recorded a total of 834 instances of LS use which were subdivided into 568 cognitive LS (i.e. 68 per cent of the total LS use) and 266 metacognitive ones. The former were illustrated by 12 different strategies and the latter, by 3 different ones. Students in GII have used a strategy which we did not find

among GI students ('Contextualisation'). The distribution of these strategies in the various eliciting instruments (see Table 5.33 above) is nearly identical to the one we described for GI, except for 'Avoidance' and 'Contextualisation' which were used by students in GII in the Interview but not by GI students in any of the instruments.

Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Resourcing	158	27
2)	Question for Clarification	132	23%
3)	Being Active	55	9%
4)	Repetition	43	7%
5)	Avoidance	41	7%
6)	Functional Practise	30	5%
7)	Contextualisation	27	4%
8)	Guessing	27	4%
9)	Translating (French)	25	4%
10)	Inferencing	18	3%
11)	Translating (Arabic)	7	1%
12)	Translating (another Language)	5	1%
	(ii) Metacognitive LS:		
1)	Monitoring Others	236	88%
2)	Selective Attention	21	8%
3)	Delaying	9	3%

Table 5.35 Frequency of LS use in connection with Acquisition of 'Listening' in the Fourth Year

Although the same strategies (apart from 'Contextualisation') were used, the frequency with which they have occurred differs from one group to another (see Table 5.35 above). Thus, while the cognitive strategy which occurred most often in GI was 'Questions for Clarification', in GII it was 'Resourcing', and while 'Translating from/into French' for instance, was in the fourth position in terms of frequency of occurrence and represented 8 per cent of the total use of this type of LS (see Table 5.34 above), in GII it was in the ninth position and represented only 4 per cent of the total use of LS of this type.

The only LS which was not used by First-Year students, 'Contextualisation' occurred only in 27 instances (4 per cent of all cognitive strategies).



As for metacognitive strategies, the most extensively used one was similar to GI: 'Monitoring Others' which was used in 236 instances and represented 88 per cent of all the strategies of this type. The two other LS were used in nearly insignificant proportion.

#### 5.2.2.1.1.4. 'Reading'

All the instances of LS use we recorded for this skill are summed up Table 5.36 below.

As this table shows, students in GI have used total of 625 instances of LS; Among these 613 (i.e. 98 per cent of all the LS used in connection with this skill) were cognitive strategies, and the remaining 12 LS were metacognitive ones. The former were illustrated by 10 different strategies and the latter by only one strategy. The distribution of these LS in the various eliciting instruments (Table 5.36 below) shows that two LS have been used in all three instruments ('Translating' either into French or Arabic), while the others have been used in the Questionnaire exclusively, eg 'Being Active', or in the Tasks, eg 'Memorising'. Some LS have also occurred in at least two instruments.

	Qre		Interview		Tasks		TOTAL	
	1	4	1	4	1	4	1	4
(i) Cognitive LS:								
- Formal Practise	-	-	35	13	20	7	55	20
- Questions for Clarification	83	45	-	-	9	4	92	49
- Translating (Arabic)	13	7	16	6	11	8	40	21
- Translating (French)	30	11	9	4	19	10	58	25
- Translating (another Lang.)	4	5	-	-	-	-	-	-
- Being Active	73	55	-	-	-	-	73	55
- Avoidance	3	6	18	-	19	11	40	17
- Inferencing	-	-	39	27	22	19	61	46
- Resourcing	93	59	83	70	7	4	183	133
- Memorising	-	-	-	-	7	12	7	12
(ii) Metacognitive LS :								
- Selective Attention	-	-	-	-	12	20	12	20
<b>TOTAL :</b>	<b>299</b>	<b>188</b>	<b>200</b>	<b>120</b>	<b>126</b>	<b>95</b>	<b>625</b>	<b>403</b>

Table 5.36. LS used in connection with the Acquisition of 'Reading' in the various eliciting instruments.

When we look at the frequency of occurrence of these strategies, we can see (Table 5.37 below ) that very few cognitive strategies have been extensively used. For instance, despite the fact that 'Resourcing' comes in the first position in our table (i.e. the most recurring strategy), it was nevertheless used in only 183 instances, which represents 29 per cent of all LS use in this type.

Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Resourcing	183	29%
2)	Question for Clarification	92	77%
3)	Being Active	73	11%
4)	Inferencing	61	10%
5)	Translating (French)	58	9%
6)	Formal Practise	55	8%
7)	Translating (Arabic)	40	6%
8)	Avoidance	40	6%
9)	Memorising	7	1%
10)	Translating (another Language )	4	1%
	(ii) Metacognitive LS:		
1)	Selective Attention	12	6%

Table 5.37 Frequency of LS use in connection with the Acquisition of 'Reading' in the First Year

The other strategies were used in nearly insignificant number, eg 'Avoidance' which was used in only 40 instances (i.e 6 per cent ) and 'Translating from/into another language' which was used even less (only 1 per cent).

Metacognitive strategies have also been in relatively small number: we recorded the use of only one strategy 'Selective Attention' which was used in 12 instances only.

As for students in GII, as Table 5.36 above shows, we recorded a total of 403 instances of LS use, 383 of these (95 per cent) were cognitive strategies and only 20 were metacognitive ones. Both types of LS were illustrated by the same strategies as the ones described for GI. The distribution in the various eliciting instruments was similar to GI as well.

The frequency of use of these strategies (Table 5.38 below) is slightly different from the one described for students in GI. Thus, if 'Resourcing' remains the most



extensively used LS in GII in which it was used in 133 instances (i.e. 34 per cent of all cognitive LS use), the second most occurring strategy, unlike GI, was 'Being Active' which was used in 55 instances (14 per cent). However, the least used strategies were similar in both groups.

Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Resourcing	133	34%
2)	Being Active	55	14%
3)	Question for Clarification	49	13%
4)	Inferencing	46	12%
5)	Translating (French)	25	6%
6)	Translating (Arabic)	21	5%
7)	Formal Practise	20	5%
8)	Avoidance	17	4%
9)	Memorising	12	3%
10)	Translating (another Language )	5	1%
	(ii) Metacognitive LS:		
1)	Selective Attention	20	6%

Table 5.38 Frequency of LS use in connection with the Acquisition of 'Reading' in the Fourth Year

As for metacognitive LS, we recorded the use of only one strategy which was similar to the one used in GI and which was used in 20 instances.

Our discussion of the various skills has thus brought further evidence to our earlier suggestion that the occurrence of LS is not random: Some strategies tend to occur more often with the acquisition of one particular area of the language than with another which itself will have specific strategies associated with it. Our various Tables which show the frequency of use of these LS in both GI and GII constitute solid evidence in support of this point. Furthermore, it is now also clear that some LS tend to occur more often with one type of eliciting instrument rather than with another.

These findings also suggest that the use of specific strategies in connection with the acquisition of a particular skill can be used as an indication of the learning styles of the learners. This point will be discussed later in more details.

We shall now look for further evidence to support these preliminary conclusions in the analysis of students' use of LS in the process of acquiring other areas of the FL.

### 5.2.2.1.1.2. Language Learning Activities

We shall include in this section various aspects of the language acquisition process which we have already mentioned in our discussion of the Questionnaire (see Table 4.4.) and the Interview (see Table 4.9.), and which we subsumed under two main headings: (i) Learning specific language items, such as 'Grammar', 'Vocabulary' and the 'Sound System', and (ii) Learning in general, which covers areas like 'Learning styles', 'Errors', 'Memorisation', and 'Notes-taking'. We shall look at each point separately.

#### 5.2.2.1.1.2.1. Learning Specific Items

##### 5.2.2.1.1.2.1.1. Grammar

In the investigation of students' use of LS in the course of acquiring 'Grammar', we recorded the use of various strategies which are summed up in the table below (Table 5.39).

	Qre		Interview		Tasks		TOTAL	
	1	4	1	4	1	4	1	4
(i) Cognitive LS:								
- Formal Practise	77	63	-	-	39	28	116	91
- Translating (Arabic)	63	12	-	-	-	-	63	12
- Translating (French)	6	2	-	-	-	-	6	2
- Resourcing	-	-	12	21	28	40	40	61
- Contextualisation	124	88	-	-	-	-	124	88
- Repetition	23	14	-	-	-	-	23	14
- Deduction	25	16	-	-	-	-	25	16
(ii) Metacognitive LS :								
- Self-Management	-	-	-	-	-	14	-	14
<b>TOTAL:</b>	<b>372</b>	<b>212</b>	<b>78</b>	<b>62</b>	<b>94</b>	<b>98</b>	<b>544</b>	<b>372</b>

Table 5.39 LS used in connection with the Acquisition of 'Grammar' in the various eliciting instruments

For First-Year students we recorded a total of 544 instances of LS use, all of them cognitive and illustrated by 8 different strategies. Most of these have been used in



the Questionnaire except for one strategy, 'Memorisation', which occurred in all three eliciting instruments. Some LS occurred in two different instruments: For instance, 'Formal Practise' was used in the Questionnaire and Tasks, while 'Resourcing' was used in the Interview and the Tasks. All the remaining strategies were used exclusively in the Questionnaire.

As far as the frequency of occurrence of these strategies is concerned, as Table 5.40 below shows, 'Memorisation' was the most extensively used strategy in the acquisition of 'Grammar'. It was used in 147 instances, (i.e. 27 per cent of all the strategies used). Similarly, 'Contextualisation' was also extensively used: there were 124 instances of use (i.e. 23 per cent). Among the least used LS, 'Repetition' represented only 4 per cent of the total strategies used, while 'Translating from/into French' turned out to be even less used: we recorded only 6 instances of use which represented only 1 per cent of all the strategies used.

Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Memorisation	147	27%
2)	Contextualisation	124	23%
3)	Formal Practise	116	21%
4)	Translating (Arabic)	63	11%
5)	Resourcing	40	7%
6)	Deduction	25	5%
7)	Repetition	23	4%
10)	Translating (French)	6	1%

Table 5.40 Frequency of LS use in connection with the Acquisition of 'Grammar' in the First Year

For Fourth-Year students, we have recorded 372 instances of LS use, among which 358 (i.e. 96 per cent) were cognitive ones and illustrated by 8 different strategies which were identical to the ones used by students in GI, and 14 instances of metacognitive LS illustrated by only one strategy.

The distribution of these strategies in the various eliciting instruments turned out to be identical to the one we already discussed for GI, but in addition, students in GII unlike those in GI, have made use of a metacognitive strategy exclusively in the Tasks ('Self-Management').

The frequency of use of these LS, as Table 5.41 below shows, is different from the one we discussed for GI. For instance, the most frequent strategy used by First Year students to acquire 'Grammar' was 'Memorisation' whereas in GII it turned out to be 'Formal Practise'. In both groups, 'Contextualisation' was the second most extensively used LS, but in GII the third most important LS turned out to be 'Memorising'.

Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Formal Practise	91	25%
2)	Contextualisation	88	24%
3)	Memorisation	74	20%
4)	Resourcing	61	17%
5)	Deduction	16	4%
6)	Repetition	14	4%
7)	Translating (Arabic)	12	3%
8)	Translating (French)	2	1%
	(ii) Metacognitive LS		
1)	Self-Management	14	-

Table 5.41 Frequency of LS use in connection with the Acquisition of 'Grammar' in the Fourth Year

In both groups however, 'Translating from/into French' and 'Repetition' were among the least used strategies. In GII, the former was only used in 2 instances and the latter in only 14.

As for metacognitive LS, as already pointed out, only one strategy was used in 14 instances, and all of them in the performance of the various Tasks.

#### 5.2.2.1.1.2.2. Vocabulary

The strategies we have recorded in the investigation of Vocabulary acquisition are summed up in the table below (Table 5.42). This table shows that for students in GI, we recorded 669 instances of LS use, among which 663 (99 per cent) were cognitive strategies, and only 6 were instances of metacognitive ones. The former were illustrated by 9 different strategies while the latter was realised by one strategy only.



	Qre		Interview		Tasks		TOTAL	
	1	4	1	4	1	4	1	4
(i) Cognitive LS:								
- Formal Practise	67	51	-	-	-	-	67	51
- Translating (Arabic)	30	7	21	6	-	-	51	13
- Translating (French)	38	12	15	19	35	25	88	56
- Resourcing	115	58	-	-	-	-	115	58
- Contextualisation	118	77	26	19	18	19	162	115
- Repetition	15	8	-	-	24	15	39	23
- Deduction	25	33	-	-	-	-	25	33
- Memorisation	48	24	29	22	21	17	98	63
- Imagery	-	-	-	-	24	15	39	23
(ii) Metacognitive LS :								
- Planning	-	-	-	-	6	17	6	17
<b>TOTAL</b>	<b>456</b>	<b>270</b>	<b>91</b>	<b>66</b>	<b>122</b>	<b>117</b>	<b>669</b>	<b>453</b>

Table 5.42. LS used in connection with the Acquisition of 'Vocabulary' in the various eliciting instruments.

In terms of their distribution in the eliciting instruments, some cognitive strategies have occurred in all three. For instance, 'Memorisation', 'Contextualisation', and 'Translating from/into French'. But other LS, like 'Resourcing', 'Repetition', and 'Deduction' occurred exclusively in the Questionnaire. The only instance of.

The frequency of occurrence of these strategies in GI, as given in Table 5.43 below, shows that among cognitive LS, 'Contextualisation' was the most frequently used strategy in connection with the acquisition of 'Vocabulary': We recorded 162 instances of use (i.e. 24 per cent of all the strategies of this type). It was closely followed by 'Resourcing' for which we recorded 115 instances of use and 'Memorising' with 98 instances. The least used LS were 'Deduction' which was only used in 25 instances (i.e. 4 per cent of all cognitive LS) and 'Imagery' (4 per cent).

Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Contextualisation	162	24%
2)	Resourcing	115	17%
3)	Memorising	98	15%
4)	Translating (French)	88	13%
5)	Formal Practise	67	10%
6)	Translation (Arabic)	51	8%
7)	Repetition	39	6%
8)	Deduction	25	4%
9)	Imagery	18	4%
	(ii) Metacognitive LS:		
1)	Planning	17	

Table 5.43 Frequency of LS use in connection with the Acquisition of 'Vocabulary' in the First Year

As already pointed out, we recorded the use of only one metacognitive LS which was used in 6 instances, and all of them in the Tasks.

As for students in GII, we recorded a total of 453 instances of LS use among which 436 (i.e. 96 per cent) were instances of cognitive strategies and 17 were instances of metacognitive ones. Both strategy types were illustrated by the same strategies we mentioned for GI. The distribution of these LS throughout the eliciting instruments followed the same pattern as the one we described earlier for students in GI.

The frequency of occurrence of some of these strategies, particularly the ones which were extensively used (Table 5.44 below), differs to some extent from the order of occurrence we described earlier for GI. For instance, if 'Contextualisation' with 115 instances of occurrence (i.e. 26 per cent of all cognitive LS use) was the most extensively used LS in GII as well, the next most important LS used in this Year turned out to be different from the one used by students in GI: Fourth-Year students used 'Memorising' in 63 instances (i.e. 14 per cent). However, among the least used LS, 'Repetition' and 'Imagery' were also used with a very low frequency in both Years.



Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Contextualisation	115	26%
2)	Memorisation	63	14%
3)	Resourcing	58	13%
4)	Translating (French)	56	13%
5)	Formal Practise	51	11%
6)	Deduction	33	7%
7)	Imagery	24	5%
8)	Repetition	23	5%
9)	Translating (Arabic)	13	3%
	(ii) Metacognitive LS:		
1)	Planning	17	

Table 5.44 Frequency of LS use in connection with the Acquisition of 'Vocabulary' in the Fourth Year

#### 5.2.2.1.1.2.1.3. The Sound System

In investigating this particular area of the FL we were primarily interested in discovering the strategies which learners used in order to deal with the pronunciation of new items and ways to improve it. The reason why this area was covered exclusively in the Interview and Tasks was due to the fact that given the nature of this skill we assumed it would be easier for learners to show in practise the strategies they usually had resort to. Furthermore, we were concerned that given the limited writing abilities of First-Year students many among them would have had difficulty in putting in writing the description of the strategies they used for this particular skill.

For the investigation of this particular area of the language was restricted our questions to the Interview and Tasks only because, given its nature, we wanted to collect the students' answers orally. We thus did not include any question in the Questionnaire. All the instances of LS use are summed up in the table below (Table 5.45).

	Interview		Tasks		TOTAL	
	1	4	1	4	1	4
(i) Cognitive LS :						
- Inferencing	40	27	-	-	40	27
- Questions for Clarification	9	14	-	-	9	14
- Resourcing	21	19	-	-	21	19
- Repetition	31	27	25	23	56	50
- Formal Practise	-		20	25	20	25
(ii) Metacognitive LS:						
- Monitoring Others	-	-	15	25	15	25
- Self-Monitoring	-	-	19	21	19	21
- Selective Attention	-	-	17	18	17	18
<b>TOTAL</b>	<b>101</b>	<b>87</b>	<b>96</b>	<b>112</b>	<b>197</b>	<b>199</b>

Table 5.45 LS use in connection with the acquisition of the 'Sound System' in the Interview and Tasks.

As this table shows, students in GI had a total of 197 instances of LS use, among which 146 ( 74 per cent) were instances of cognitive LS illustrated by 5 different strategies, and 51 were instances of metacognitive ones which were illustrated by 3 different strategies. Most of the cognitive LS have occurred in the Interview, and only 'Formal Practise' and 'Repetition' were used in the Tasks. As for metacognitive LS, they were used exclusively in the Tasks.

When we look at the frequency of occurrence of these strategies (Table 5.46), we shall see that among cognitive LS, 'Repetition' with 56 instances (i.e 38 per cent of all cognitive LS use) was the most extensively used strategy, closely followed by 'Inferencing' and 'Resourcing'. The least used strategies were 'Formal Practise', for which we recorded only 20 instances of use (i.e. 14 per cent) and 'Questions for Clarification' with only 9 instances of use.



Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Repetition	56	38%
2)	Inferencing	40	27%
3)	Resourcing	21	14%
4)	Formal Practise	20	14%
5)	Question for Clarification	9	6%
	(ii) Metacognitive LS:		
1)	Self-Monitoring	19	37%
2)	Selective Attention	17	33%
3)	Monitoring Others	15	29%

Table 5.46 Frequency of LS use in connection with the Acquisition of the 'Sound System ' in the First Year

Metacognitive LS were more evenly distributed in terms of frequency of occurrence. Thus, 'Self-Monitoring' occurred in 19 instances (i.e. 37 per cent of all metacognitive LS use), closely followed by 'Selective Attention', used 17 times (i.e. 33 per cent) and 'Monitoring Others' with 15 instances of use (i.e. 29 per cent).

As for students in GII, we recorded a total of 199 LS use which were subdivided into 135 cognitive LS (i.e. 68 per cent of the total LS use) and 64 metacognitive ones. Both types of LS were illustrated by the same strategies which we discussed for GI. Similarly, their distribution in the two eliciting instruments follows the same pattern as GI as well. The frequency of occurrence although similar for cognitive LS turned out to be relatively different however, from the one we described for GI (Table 5.47).

Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Repetition	50	37%
2)	Inferencing	27	20%
3)	Formal Practise	25	18%
4)	Resourcing	19	14%
5)	Question for Clarification	9	6%
	(ii) Metacognitive LS:		
1)	Monitoring Others	25	39%
2)	Self-Monitoring	21	33%
3)	Selective Attention	18	28%

Table 5.47 Frequency of LS use in connection with the Acquisition of the 'Sound System ' in the Fourth Year

Thus, while in GI the most extensively used LS was 'Monitoring Others', in GII this strategy came last in terms of frequency. Instead, 'Self-Monitoring' turned out to be the most extensively used metacognitive LS among Fourth-Year students: We recorded 25 instances of use (i.e. 39 per cent of all metacognitive LS use). It was closely followed by 'Self-Monitoring', with 21 instances, and finally 'Selective Attention', with 18 instances. On the whole however, like GI, this type of strategy turned out to be used by students in GII to a relatively smaller extent in GII as well.

### 5.2.2.1.1.3. Learning in General

#### 5.2.2.1.1.3.1. Learning Styles

We have confined the investigation of learners' learning styles to the Questionnaire and Interview only. Table 5.48 below gives a summary of all the instances of LS use we have recorded.

	Qre		Interview		TOTAL	
	1	4	1	4	1	4
(i) Cognitive LS :						
- Formal Practise	-	-	99	84	99	84
- Resourcing	62	49	22	-	84	49
- Repetition	37	64	-	-	37	64
- Being Active	43	37	135	74	178	111
- Inferencing	-	-	20	17	20	17
(ii) Metacognitive LS:						
- Monitoring Others	88	48	35	29	133	77
- Self-Monitoring	122	98	-	-	122	98
- External Monitoring	69	37	56	91	125	128
- Self-Evaluation	53	27	-	-	53	27
- Planning	-	-	46	32	46	32
<b>TOTAL :</b>	<b>473</b>	<b>360</b>	<b>413</b>	<b>327</b>	<b>887</b>	<b>687</b>

Table 5.48 LS use in connection with learners' 'Learning Styles' in the Questionnaire and Interview

For First-Year students we recorded a total of 887 instances of LS use among which 418 (i.e. 47 per cent) were instances of cognitive LS use and 469 (i.e. 53 per cent) were instances of metacognitive ones. It is the first time in our discussion of LS use in connection with the acquisition of English so far, that the number of instances of



metacognitive LS is larger than the number of instances of cognitive LS use. The significance of this result will be discussed later.

The distribution of cognitive LS in the two eliciting instruments (see Table 5.48 above) shows that apart from 'Being Active' which occurred in both instruments, all the other strategies occurred in either one or the other only. Similarly, while only one metacognitive strategy was used in the Interview exclusively, (i.e. 'Planning'), and another exclusively in the Questionnaire only (i.e. 'Self-Monitoring'), all the other LS were used in both instruments.

As for the frequency of occurrence of these strategies (Table 5.48 above), we can see that among cognitive LS, the most frequently used strategy was 'Being Active' for which we recorded 178 instances of use (i.e. 42 per cent of all e LS use of this type). It was closely followed by 'Formal Practise' used in 99 instances (i.e. 23 per cent). The least used strategies were 'Repetition', for which we recorded only 37 instances of use (i.e. only 8 per cent), and 'Inferencing' which was used in 20 instances only (i.e. 5 per cent).

Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Being Active	178	42%
2)	Formal Practise	99	23%
3)	Resourcing	84	20%
4)	Repetition	37	8%
5)	Inferencing	20	5%
	(ii) Metacognitive LS:		
1)	External Monitoring	125	32%
2)	Monitoring Others	123	26%
3)	Self-Monitoring	122	26%
4)	Self-Evaluation	53	11%
5)	Planning	46	9%

Table 5.49 Frequency of LS use in connection with Students' 'Learning Styles' in the First Year

Metacognitive LS, as already pointed out, were extensively used, both in terms of the actual number of different strategies as well as the number of instances in which they were used. For instance, for the LS 'External Monitoring' which was the most extensively used strategy, we recorded 125 instances of use (i.e. 32 per cent of all metacognitive LS use); It closely followed by 'Monitoring Others', with 123 instances

of use (i.e. 26 per cent) and 'Self-Monitoring', with 122 instances of use. The least used strategy in this type was 'Planning' for which we recorded only 46 instances of use (i.e. 9 per cent).

When we look at the use of LS in GII, we can see (Table 5.48 above) that we recorded 687 instances of use which were subdivided into 325 cognitive LS (i.e. 47 per cent) and 362 (i.e. 53 per cent) metacognitive ones. The pattern followed in GII, both in terms of distribution of these LS in the two eliciting instruments and the frequency of occurrence of each LS in either type, is strikingly similar to the one followed by students in GI. Thus, similarly to GI, metacognitive LS turned out to be in relatively greater numbers than cognitive ones. In addition, these were illustrated by the same LS except for 'Resourcing' which was not used by GII students in the Interview.

The frequency of occurrence (Table 5.50) of these LS, apart from minor differences, is similar to the one described for GI. For instance, 'Being Active' also turned out to be the most extensively used LS in GII for which we recorded 111 instances of use (i.e. 34 per cent of all cognitive LS use). It was closely followed, like in GI, by 'Formal Practise' with 84 instances of use (i.e. 25 per cent). The least used strategies turned out to be the same as well: 'Resourcing' for which we recorded 49 instances of use and 'Inferencing' for which we recorded only 17 instances of use (5 per cent).

Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Being Active	111	34%
2)	Formal Practise	84	25%
3)	Repetition	64	19%
4)	Resourcing	49	15%
5)	Inferencing	17	5%
	(ii) Metacognitive LS:		
1)	External Monitoring	128	35%
2)	Self-Monitoring	98	27%
3)	Monitoring Others	77	21%
4)	Planning	32	9%
5)	Self-Evaluation	27	7%

Table 5.50 Frequency of LS use in connection with Students' 'Learning Styles' in the Fourth Year



The only difference between the two groups in terms of the frequency of occurrence of cognitive LS is that in GI 'Resourcing' was used more often than 'Repetition', while in GII it was the opposite.

There were also some minor differences between the two groups in terms of the occurrence of metacognitive LS. Thus, if both groups have made an extensive use of 'External Monitoring' (128 instances of use for GII), they nevertheless differed in their use of the other LS. For instance, in GII the second most important strategy used was 'Self-Monitoring', with 98 instances (i.e. 27 per cent of all metacognitive LS use) whereas in GI this strategy was the third most important one. Similarly the least used LS in GI was 'Planning' while in GII it was 'Self-Evaluation' which was used in only 27 instances (i.e. 7 per cent).

#### 5.2.2.1.1.3.2. Dealing with errors

The investigation of students' dealing with errors was mainly carried out in the Tasks section in which students were asked to say orally how they handled this aspect of their learning. All the LS we recorded are summed up in Table 5.51 below.

	TASKS	
	1	4
(i) Cognitive LS :		
- Being Active	20	21
- Formal Practise	31	28
- Resourcing	28	26
(ii) Metacognitive LS:		
- Monitoring Others	23	26
- Self-Management	27	30
- External Monitoring	18	28
- Monitoring Others	28	31
- Directed Attention	17	24
<b>TOTAL :</b>	<b>192</b>	<b>214</b>

Table 5.51 LS use in connection with learners' Dealing with Errors in the Tasks

For GI we recorded a total of 192 instances of LS use among which 79 (i.e. 41 per cent) were instances of cognitive strategies, illustrated by 3 different LS, and 113 (i.e. 59 per cent) were instances of metacognitive ones and were illustrated by 5 different LS. Similarly to 'Learning Styles' the number of instances of metacognitive LS turned out to be much larger than the use of cognitive LS.

The frequency of occurrence of the latter (Table 5.52) shows that these strategies have been used in relatively small numbers. Thus, 'Formal Practise' for instance, has only been used in 31 instances (i.e 39 per cent of all LS use of this type) while 'Resourcing' and 'Being Active' have been used even less. But when we look at metacognitive strategies, a completely different picture emerges.

Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Formal Practise	31	39%
2)	Resourcing	28	35%
3)	Being Active	20	25%
	(ii) Metacognitive LS:		
1)	Monitoring Others	28	25%
2)	Self-Management	27	24%
3)	Self-Monitoring	23	20%
4)	External Monitoring	18	16%
5)	Directed Attention	17	15%

Table 5.52 Frequency of LS use in connection with Students' 'Dealing with Errors' in the First Year

Although the number of instances of metacognitive LS use was larger than the use of cognitive ones, it nevertheless remains relatively low in terms of each the frequency with which each LS was used. For instance, 'Monitoring Others' which despite it being the most extensively used strategy in this category, was only used in 28 instances (i.e. 25 per cent of all metacognitive LS use), and 'Self-Management' which was the second most important strategy used but for which we recorded only 27 instances. The least used LS was 'Directed Attention' for which we recorded only 17 instances of use.

As for students in GII, we recorded a total of 214 instances of LS use, among which 75 (i.e. 35 per cent) were instances of cognitive LS and 139 (i.e. 65 per cent) were metacognitive ones. The same LS as the ones described for GI illustrated the two types.

If we looking at the frequency of occurrence of these LS (Table 5.53) we can see that it is similar to the one used by GI students, except for metacognitive strategies which were used in relatively higher proportion.



Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Formal Practise	28	37%
2)	Resourcing	26	34%
3)	Being Active	21	28%
	(ii) Metacognitive LS:		
1)	Monitoring Others	31	22%
2)	Self-Management	30	22%
3)	External-Monitoring	28	20%
4)	Self- Monitoring	26	19%
5)	Directed Attention	24	17%

Table 5.53 Frequency of LS use in connection with Students' 'Dealing with Errors' in the Fourth Year

Cognitive strategies showed the same trend in terms of the frequency of occurrence, as the one we described for GI. For instance, although 'Formal Practise' was the most extensively used LS, we only recorded 28 instances of use. It was closely followed by 'Resourcing' with 26 instances, and finally 'Being Active' with 21 instances of use. Metacognitive LS also showed the same pattern except for 'Self-Monitoring' which in GI was the third most important LS while in GII it turned out to be in the fourth most important one.

#### 5.2.2.1.1.3.3. Memorisation

Most of the questions which investigated students' strategies for memorisation were concentrated in the Tasks. Table 5.54 below gives a summary of the instances of LS use we recorded. Thus, for GI students we recorded a total of 89 instances of LS use, all of them cognitive which were illustrated by 5 different strategies.

	TASKS	
	1	4
(i) Cognitive LS :		
- Formal Practise	21	23
- Imagery	20	22
- Translating (in either language)	17	19
- Auditory representation	16	18
- Mnemonics (Association)	15	16
<b>TOTAL :</b>	<b>89</b>	<b>93</b>

Table 5.54 LS use in connection with learners' dealing with Memorisation' in the Tasks

As for the frequency of occurrence of these strategies (Table 5.55) we can see that even if 'Formal Practise' with 21 instances of use (i.e 23 instances of use ) turned out to be the most frequently used strategy, all the other LS were used in a more or less similar proportions.

Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Formal Practise	21	23%
2)	Imagery	20	22%
3)	Translating	17	19%
4)	Auditory Representation	16	18%
5)	Mnemonics (Association)	15	16%

Table 5.55 Frequency of LS use in connection with Students' dealing with Memorisation' in the First Year

For students in GII we recorded a total of 93 instances of LS use which were illustrated by the same 5 strategies used by students in GI (see Table 5.54 above). The frequency with which they were used differs slightly however, from the one we described in GI. (Table 5.56 below).

Rank	LS	Instances (N)	%
	(i) Cognitive LS :		
1)	Formal Practise	27	29%
2)	Translating	26	27%
3)	Imagery	15	16%
4)	Auditory Representation	14	15%
5)	Mnemonics (Association)	11	12%

Table 5.56 Frequency of LS use in connection with Students' dealing with Memorisation' in the Fourth Year

Thus, the first two most frequently occurring LS were identical in both groups, but whereas in GI 'Translating' was the third most important LS, in GII instead, it turned out to be 'Imagery' which occurred in this position, while 'Translating' was only the fourth most important strategy.



#### 5.2.2.1.1.3.4. Notes-Taking

The investigation of this point was also carried out mainly in the Tasks section. Unfortunately very few strategies were recorded. All the instances of LS use are summed up in Table 5.57. below.

	TASKS	
	1	4
(i) Cognitive LS :		
- Memorisation	26	11
(ii) Metacognitive		
- Selective Attention	21	23
<b>TOTAL :</b>	<b>47</b>	<b>34</b>

Table 5.57 LS use in connection with learners' Notes Taking' in the Tasks

For GI we recorded a total of 47 instances of LS use which were illustrated by only one cognitive strategy used in 26 instances and one metacognitive LS also illustrated by only LS which was used in 21 instances.

#### 5.2.2.2. Discussion of the Research Question

In the light of these results we shall now discuss our second research question. For practical purposes, we shall carry out our discussion according to each of the areas of language acquisition we covered above. Thus, we shall first look at the interaction of LS with language skills, then with the acquisition of various language items, and finally with the learning process in general.

##### 5.2.2.2.1. LS and Language Skills

Our analysis of students' use of LS in the acquisition of these areas of the FL has now convincingly shown that the occurrence of specific strategies with a particular skill is not random. Instead, there seems to be a close association between a given skill and some LS. The evidence in support of this claim is provided by the students' reported use of specific strategies with the acquisition of each skill. We must point out however, that to some extent our results may have been affected by the procedures employed to collect the data, in as much as some strategies have been illustrated by a relatively higher number of questions than we devoted to other strategies. Thus, it is possible that the high occurrence of some strategies may be an artefact of this procedure, and we

shall discuss later the implications of this. Despite this possibility however, we think that we have gathered enough data to allow ourselves a certain number of conclusions.

Thus, if we look at the cognitive LS used in connection with the acquisition of 'Speaking' for instance, we shall see that all the students, irrespective of the Year to which they belong, showed not only a similar propensity to use the same LS but also, and more interestingly, to use most of these strategies with nearly the same frequency of occurrence. For instance in both groups, 'Functional Practise' turned out to be the LS which was most often associated with the acquisition of this skill. This LS was closely followed, in terms of frequency of occurrence, by 'Question for Clarification' and 'Formal Practise' in both groups. When we consider the strategies which were least used by students in either group, we can see that here as well, the same pattern of LS use emerged, i.e. 'Translating', either from/into Arabic, or from/into another language were the least used strategies in both groups.

The conclusion which these findings seem to point at and which was supported by further evidence, is that, not only all the students, irrespective of their level of proficiency in the FL, have resort to various LS during the acquisition process, but more importantly, this use is in some way, determined by the nature of the skill to be acquired. Furthermore, they also suggest and this is a finding which we had not foreseen, that the LS students use may be seen as an indication of their learning patterns. For instance, the extensive and recurring use of the LS 'Functional Practise' with the acquisition of 'Speaking' shows that learners, in their majority, tend to focus primarily on communication in order to improve their acquisition of this skill. Similarly, the frequent occurrence of 'Question for Clarification' shows that learners feel the need to ask for help either their teacher(s) or another fellow student in order to better acquire this skill. If we look at the LS which were least used, we can see that in the acquisition of this skill learners have little resort to 'Translating', for instance.

Further evidence to support this claim can be found not only in the use students made use of in the acquisition of the other skills, but also and more convincingly, in the fact that the same pattern emerges among First as well as Fourth-Year students. Thus, if we look at the use of the LS 'Formal Practise' which students made of in 'Writing' for instance, we can see that it was most extensively used by students in both years. In addition, the other cognitive LS which were associated with this skill turned out to be the same in both years as well, although used with a different frequency of occurrence.

This difference can probably be explained in terms of the different learning patterns each group of students follows in order to acquire 'Writing'. The fact that 'Formal Practise' turned out to be the most frequently used LS in both groups can be



seen as an indication that students do try to practise the language code a lot, and that they see this practise as the key to mastering this skill. The relatively important use of the strategy of 'Translating from or into French' did not come as a surprise to us at this stage because, as already pointed out in our discussion of teachers' teaching practices (see 5.1.1.1.) and students' beliefs and their use of various strategies (see 5.1.2.2.1 and 5.1.2.3.), we knew that a great majority of students did have resort to French as an avoidance strategy when they found themselves in difficulty and more particularly in 'Writing'. However, this use can also be seen as a conscious transfer strategy used by the learners (see 2.2.3.3.1. above for a detailed discussion of this point). This is supported by the fact that the least used strategies in the acquisition of 'Writing' turned out to be 'Translating' from/into either Arabic or another language.

As for metacognitive LS, both groups have used the same two strategies with the same order of frequency, although one of these was used more extensively than all the others. Thus, both First and Fourth-Year students have made an extensive use of 'Self-Monitoring' and to a much smaller extent of 'Planning'. The use of the former shows that all the students were primarily concerned with monitoring their own production of the TL and checking for its correctness and appropriateness. The use of the latter, although used relatively less, shows nevertheless that all learners see 'Planning' as a crucial stage in the writing process.

In 'Listening', despite the fact that the most frequently used LS were similar in both groups, the order in which these occurred however, differed from one group to another. Thus, if we look at the use of cognitive LS, we shall see that students in GI had resort most extensively to 'Question for Clarification', while those in GII used 'Resourcing'. The latter was nevertheless, the second most important strategy used by students in GI. We think that here again, this difference can be explained in terms of the different approaches each group of students adopt for the acquisition of this skill. While First-Year students as 'Intermediate' learners, tend to ask questions from their interlocutor(s) or their teacher in order to help them to better understand what they have just been said, Fourth-Year students instead, tend to use all available materials and means to help them improve their acquisition of this skill. The latter however, still use 'Question for Clarification' to a rather large extent as well. This can be seen as an indication that they also believe that asking questions constitutes an important element in the acquisition process.

Similarly to 'Writing', the least used strategies turned out to be 'Translating' from/into either Arabic or another language, and 'Inferencing'. The relatively low use of the latter is probably due to the nature of the skill which does not allow enough time for the learners to predict outcomes. As for metacognitive strategies, the extensive use

made of 'Monitoring Others' by students in both groups shows that they are primarily concerned with monitoring the speech of others in order to learn from it.

Finally, in the acquisition of 'Reading', students have followed a pattern in LS use which was in all respects, similar to the one we already described for the acquisition of the other skills. Thus, the same strategies have been used by all the students, and their frequency of occurrence, albeit different from one group to another, shows that students in each year follow specific routes in the acquisition of this skill.

For instance, the fact that 'Resourcing' was the most extensively used strategy shows that students in both groups see the acquisition of 'Reading' as closely related to the use of reference materials, such grammar books dictionaries, and so on. The different uses of the LS 'Question for Clarification' and 'Being Active' which the two groups have made use of suggests that students do not hesitate in asking for help from either their teacher or a fellow student who they think could help them acquire this skill.

As for the least used LS, like 'Avoidance' for instance, it shows that students do not try to avoid the difficulties they meet. Instead, they try to do all they can to find answers to the problems and difficulties they meet: The evidence for such an attitude is to be found in their use of the strategy 'Being Active'.

#### **5.2.2.2.2. LS and Language Items**

The analysis of the LS used in connection with the acquisition of various language items brings further evidence to support our claim that specific strategies tend to be associated more often with the acquisition of a particular aspect of the TL than with another. It also shows that the type of LS used by a particular group of learners can give an indication of their learning styles.

Thus, in the acquisition of 'Grammar' for instance, we can see that in the First Year 'Memorising' was the most extensively used strategy while in the Fourth Year it was 'Formal Practise'. We think that this preference towards one strategy over another can be explained in terms of the different approaches learners adopt towards the acquisition of this particular area of the language. Thus, First-Year students still rely heavily on their memory in learning new grammar points, a strategy which, as our investigation of their background has shown, they used quite often in secondary school, whereas Fourth-Year students show that the way they learn Grammar is by expanding the rules they meet through the use of reference various materials. 'Memorising' among the latter, turned out to be the third most important strategy used.



The least used strategy 'Translating' (from/into French) shows that students in both Years do not rely on this language to learn Grammar, probably because of the many misleading similarities between the two languages. 'Contextualisation' was the most extensively used strategy in both groups for the acquisition of 'Vocabulary'. Thus, contrary to our expectation, because we thought that 'Memorising' would be the most frequently used strategy, students have shown that in their majority, they learn vocabulary items better when they replace them in a meaningful language context. However, 'Memorising' did play a relatively important role in both groups. This shows that after all, students did use rote-learning to learn and remember new vocabulary items.

Another strategy which both groups have also made extensive use of is 'Resourcing'. This shows that they try to enrich their vocabulary by using TL reference materials, mainly dictionaries to check the meaning of the newly acquired items. In addition, 'Translating from/into French' was also extensively used: This shows that another important way students use to remember new vocabulary items is to associate them with their French equivalent. In both groups, 'Imagery' and 'Repetition' were the least used strategies.

Finally, in the acquisition of the 'Sound System' (i.e. pronunciation) both groups have used 'Repetition' and 'Inferencing' most extensively. The former is a strategy that one would normally expect to occur with the acquisition of this area of language because a successful pronunciation is primarily based on numerous repetitions. The use of 'Inferencing' shows that students try to use all the available information, particularly the rules they learned in Phonetics classes, in order to provide a correct pronunciation for the item(s) they meet.

The least used strategy in both groups turned out to be 'Questions for Clarification'. Unlike the previous three skills, the acquisition of the 'Sound System' has resulted in the use of the same three metacognitive LS for both groups. Their frequency of occurrence however, was different between the two groups. Thus, if First-Year students used 'Self-Monitoring' most often in the Fourth Year it was 'Monitoring Others' instead.

#### 5.2.2.2.3. LS and the Learning Process

The investigation of learners' learning process in general has yielded more metacognitive LS than any other area of language acquisition we have so far investigated. Thus, in the analysis of the strategies used in the study of the students' 'Learning styles', both groups had resort most extensively to the same LS, i.e. 'External

Monitoring' and 'Monitoring Others', closely followed by 'Self-Monitoring'. The use of these three strategies, which were in fact used in relatively important numbers, help us establish the learning patterns of our students.

The use of 'External Monitoring' in both groups suggests that, as already pointed in our findings about the learners' background (see 5.1.2.1.1.), that most students, and particularly those in the First Year, rely heavily on an external source (i.e. their teachers) to monitor their progress in the acquisition process. Had this attitude been expressed by First-Year students only, it could have been quite understandable because, as 'Intermediate' students they are in need close supervision. But when the same learning procedure is also adopted by Fourth-Year students who are expected to graduate at the end of the current year, then one can only see this as a failure of the existing educational system to produce autonomous learners who, at this stage of the learning process, should have primarily relied on themselves to improve their acquisition of the FL.

Similarly, the difference in the use of the second most important strategy that each group as made of (i.e. 'Monitoring Others' in GI and 'Self-Monitoring' in GII) points at different approaches to learning. Thus, while students in GI assume they can learn better by monitoring other people's speech, (their teacher's or any other source for instance), in GII instead, because they probably assume they are well advanced in the learning process, students prefer to pay more attention to their own production of the TL to eliminate possible errors and make sure that what they say, or write, is accurate and appropriate.

The other two strategies, 'Self-Evaluation' and 'Planning' were used to a much smaller extent, and turned out to be the least used strategies in both groups. Among cognitive LS the two most frequently used ones were similar in the two groups. Thus, all the students had resort to 'Being-Active' and 'Formal Practise' most extensively. The use of the former suggests that students in both groups see themselves as active learners who are willing to practise the language code in order to master the FL, but as already pointed out, this is must be done under close supervision (i.e. the teacher). 'Inferencing' was the least used strategy in both groups.

When we look at the way students deal with their errors, we can see that here as well, metacognitive strategies have been used quite extensively and more often than cognitive ones. Thus, 'Monitoring Others' and 'Self-Management' were the most frequent strategies used in both groups. This suggests that students firmly believe that the best way to deal with errors is to monitor other people's speech in order to learn



from it (particularly their teachers'). They also believe that they can limit the number of errors they produce by managing their own production of the TL.

Two other metacognitive LS were also closely associated with errors: 'External Monitoring' and 'Self-Monitoring'. These suggest that students do expect their teachers to help them deal with their errors but that at the same time they also rely on their own knowledge of the FL to correct their own errors.

As for the cognitive LS which were used they were similar in both groups. Thus, the use of 'Formal Practise' for instance, suggests that students in both groups see the practise of the language code as an efficient way to reduce the possibility of making errors. The use of 'Resourcing' as a strategy which complements the previous one suggests that they use various TL reference materials to improve their acquisition of the FL.

Our investigation of 'Memorising' concentrated primarily on lexical items. The LS which were used are similar in both groups, but occurred in slightly different order of frequency. This points probably, at different memorisation patterns which each group uses. Thus, for First-Year students, memorisation seems to be best achieved through 'Formal Practise' and 'Imagery', while in the Fourth Year, it is achieved mainly through 'Formal Practise' and 'Translating'.

In conclusion, we can say that our findings have now provided us with enough evidence to say that the occurrence of LS is not random. Instead, some strategies tend to be more closely associated with the acquisition of a particular skill or language item rather than with another which itself, will tend to be more closely associated with other strategies. This does not imply however that the learning process should be seen as compartmentalised, i.e. that a given group of LS can only occur with a particular area of language acquisition, instead all the strategies we have discussed so far, may occur everywhere in the process of acquiring any of the areas of the foreign language. However, some of these will tend to occur more frequently than others in the acquisition of a particular area of the foreign language. That is to say that some LS, are more likely to occur with 'Speaking' for instance, than with 'Writing' which itself will have some LS more closely associated with it.

Similarly, the use of a particular LS must not be seen as mutually exclusive, i.e. that the use of a given strategy precludes the simultaneous use of another strategy. In fact most strategies occurred in combination. For instance, the use of 'Formal Practise' may well be made simultaneously with other LS, like 'Memorisation' and 'Resourcing': a student who is trying to answer an exercise in Grammar may well use the rules he

memorised as well as other reference materials. It is for practical and methodological reasons only that we looked at the various strategies in isolation.

Our most important finding however, is that the LS used in the process of acquiring a particular area of the FL can be seen as a reflection of the learning patterns the learners adopt for this particular point.

These findings however, need further corroborative evidence to allow more reliable conclusions, and in particular they would require greater care in establishing an equal proportion of the questions investigating the various strategies.

If such evidence was to come forward the pedagogical implications of these findings are tremendous and far-reaching, because if corroborated by evidence in further research, FL teachers will have at their disposal powerful teaching tools which if incorporated in future teaching materials design will greatly improve the efficiency of their teaching, and hence improve the learners' acquisition of the TL.

### 5.2.3. Third Research Question

Our third research question aims at looking at whether the productivity of LS may be affected by the learners' stage in acquisition of the FL (i.e. First or Fourth-Year) and/or their proficiency in the FL in any given stage (i.e. 'Good' or 'Less good' ones). Before discussing the question proper, we shall first explain the procedure we have followed to arrive at our results .

#### 5.2.3.1. Procedural points

In order to discuss this point we shall have to refer to some of the results we discussed earlier. They are principally, the mean ( $\bar{X}$ ) and standard deviation (SD) for First and Fourth-Year students which we mentioned in order to briefly describe the use of LS each group has made of either in the Questionnaire ( Table 5.6) or in the Interview (Table 5.14 for GIA and GIB, and Table 5.18 for GIIA and GIIB).

In addition to these results and for the purpose of our discussion, we established for each year the mean and standard deviation for all the students who answered the Interview in each Year. Thus, in the First Year for instance, we added all the scores we obtained for GIA and GIB and calculated their new mean ( $\bar{X}$ ) and standard deviation (SD). The same steps were followed for Fourth-Year students. The results are summed up in Table 5.58 below.



	Interview GI	Interview GII
$\bar{X}$	53.67	55.40
SD	4.82	3.89

Table 5.58 Mean and SD for First and Fourth Year students in the Interview

On the basis of these results we carried out a t-test to determine whether the observed differences in their means and standard deviations was statistically significant (i.e. that this difference is not the result of chance but due to the learners' acquisition stage and their proficiency in the TL), or not .

To test our question of whether the learners' stage in the acquisition process (i.e. 'Intermediate' or 'Advanced' learners, which we labelled GI and GII respectively) may have an effect on the use of LS we carried out a t-test which was aimed at evaluating the significance of the differences in the students' scores we recorded for the Questionnaire on the one hand, and the scores we recorded for the Interview for all First and Fourth-Year students on the other hand.

In order to test our question of whether the learners' proficiency in the FL in any particular stage (i.e. 'good' or 'less good' students, which we labelled A and B respectively ) may have an effect on the LS used, we carried out a t-test which was aimed at evaluating the significance of the differences between the two groups of students within a particular year. We shall discuss each of these points separately.

#### 5.2.3.2. LS Use and the Learners' stage in the acquisition of the TL

The results of the t-tests we carried out to evaluate the significance of the differences in the means ( $\bar{X}$ ) and standard deviations (SD) obtained for students in each Year in the Questionnaire on the one hand, and the Interview on the other hand, are summed up in Table 5.59 below.

The value we obtained for t in the Questionnaire between the First and Fourth Year is 0.4. The value of t required for the 5 per cent significance for 169 degrees of freedom is 1.974. We can therefore conclude that since the value we obtained for t is smaller than 1.974 there is no significant difference between the two groups of students in LS use because of their stage of acquisition in the TL.

t-test between	Value for <i>t</i>
Questionnaire GI and Questionnaire II	0.40  d.f. = 169
Interview GI and Interview GII	0.14  d.f. = 76

d.f. = degrees of freedom

Table 5.59 Value for *t* in the Questionnaire and Interview between the First and Fourth Year.

These findings are further reinforced by the results we obtained for the value of *t* in the Interview between First and Fourth-Year students. As the table above shows the value we obtained for *t* is 0.14. For 76 degrees of freedom the value of *t* required for the 5 per cent level of significance is 1.992. Since the observed value is smaller than 1.992 we can conclude that there is no significant difference between the two groups in terms of LS use.

#### 5.2.3.3. LS Use and the Learners' Level of Proficiency in the TL in any Particular Stage

The results of the t-tests we carried out between the groups within the First Year on the one hand, and the two groups in the Fourth on the other hand in order to evaluate the significance of the differences in their respective means and standard deviations are summed up in Table 5.60 below.

t-test between	Value for <i>t</i>
Interview GIA and Interview GIB	2.56  d.f. = 44
Interview GIIA and Interview GIIB	0.12  d.f. = 30

d.f. = degrees of freedom

Table 5.60 Value for *t* in the Interview between each group in the First and Fourth Year.



The value we obtained for  $t$  between GIA and GIB in the Interview is 2.56 , while in the Fourth Year the value for  $t$  between GIIA and GIIB is 0.12. For the First Year we can conclude that since the value of  $t$  required at the 5 per cent level significance for 44 degrees of freedom is 2.015 and that the observed value for  $t$  is greater than 2.015 there is therefore a significant difference between the effects of the level of proficiency in the TL between the group of 'good' learners and the group of 'less good' learners.

As for the Fourth Year, the value for  $t$  required at the 5 percent level significance for 30 degrees of freedom is 2.042 and since the observed value is smaller than 2.042 we can therefore conclude that there is no significant difference between the groups of 'good' students and 'less good' ones caused by their level of proficiency in the TL.

#### 5.2.3.4. Conclusions

As far as the learners' stage of acquisition in the FL is concerned, we can say that since the observed value for  $t$  was not significant at the five per cent level, the differences in LS use between students in the First and the Fourth Year can be considered as the result of chance, i.e. they are not the result of the learners being either 'Intermediate' or 'Advanced' students. This is confirmed by the results in both the Questionnaire and the Interview in which  $t$  was not significant. We can conclude therefore that learners irrespective of their stage in the acquisition of the FL will tend to use approximately the same number of LS

However, when we consider the learners' level of proficiency in the TL, we can see that if in the Fourth Year it had no effect on the overall use of LS among students, in the First Year instead, the level of proficiency of the learners seem to have had an effect on the LS used by students in either group since the value of  $t$  turned out to be significant at the five per cent level. Hence, on the basis of these results we can say that among First-Year university students, 'good' students will tend to use markedly more LS than 'less good' ones.

## CONCLUSION

We shall now turn to making our concluding remarks about our research. We shall mainly discuss our findings in terms of their relevance to learning strategies. Thus, we shall discuss how the teachers' and students' background as well as their beliefs can be related to strategy use, either in their teaching for the former or in their learning for the latter. We shall then conclude about our research questions. Finally, we shall try to point out the pedagogical implications which can be derived from this study as well as put forward some suggestions and recommendations for further research.

### 1. Conclusions about Teachers

Our findings show that the majority of teachers were very little aware of the importance of strategies in the learning process. This probably explains why they seldom teach them to their students except on very rare occasions. Most of the teachers could describe in detail their teaching practices, but in most cases they were uncertain about how their students dealt with the learning materials with which they were presented. Furthermore, most teachers knew very little about the kind of English acquisition experience their students had outside schools.

It is interesting to notice however, that once their attention was drawn to the fact that strategies could greatly enhance their learners' ability to acquire the foreign language, most of them accepted this suggestion. Our hope is that this attitude will, help the implementation of our recommendations for the incorporation of learning strategies in future teaching materials and practices which we shall make further below.

### 2. Conclusions about the Students' Background :

Our findings in the investigation of the students' background have shown that in their majority they had been mostly exposed to a 'teacher-oriented' foreign language class in which the teacher was the 'giver' of knowledge and the students the 'receivers'. The result being that most learners showed very little autonomy during the acquisition process which led them to rely nearly exclusively on their teachers to decide about what to learn and how to learn it. Except for rare cases, most students had seldom been taught the use of strategies, let alone shown the extent to which these could help them in improving their acquisition of the foreign language.



On the whole we can say that our findings in the investigation of the students' background and beliefs have allowed us to provide considerable documentation of what these students actually did and thought in the process of learning and using English.

### 3. Conclusions About Our Research Questions:

The first task we were faced with when we set out to investigate the strategies which learners at all levels were assumed to use during the acquisition process was to provide enough evidence to support the claim that these strategies did exist and were used by all learners irrespective of the learning stage in the foreign language or their proficiency in it. Our second task was to show that these strategies, once identified, were in most cases, similar to those already reported in other studies with different population types, and that they would fit in the existing classification framework suggested by cognitive psychologists (Brown and Palincsar, 1982) and educational researchers (O'Malley et al. 1985) which we adopted for our present research. Providing evidence for these two assumptions was the objective followed in our first research question.

Our first source of information (i.e. the Questionnaire and the Interview) had initially provided us with enough evidence in support of our claim that strategies did exist and that they were used by both intermediate and advanced students. However, relying exclusively on these findings to support our claim could have been criticised on the ground that the use students made of these strategies was merely the result of these being suggested to them by our eliciting instruments. In other words, it could have been argued that students used the strategies simply because they were there. What we needed therefore, was further corroborative evidence in support of these findings. Furthermore, if we wanted this evidence to be convincing the strategies which would have been reported should have been suggested by the students themselves and without any external intervention (i.e. from the researcher). It was thus, with this purpose in mind that the various open-ended questions and language learning activities were constructed, in the hope that in the process of solving these tasks students would be led to reporting the use of various learning strategies.

We think that our findings have shown that all the students, irrespective of the year or the group to which they belong, had all reported an extensive use of strategies, both cognitive and metacognitive, some of which have not been mentioned in our eliciting instruments and for which we had to provide our own labelling. Furthermore, students' answers have also shown that irrespective of their learning stage in the foreign language or their proficiency in it, they were all able to describe their use of a wide



range of learning strategies, which shows that, as we assumed, these strategies were open to learners' introspection / retrospection.

The likelihood that the use of these strategies was due to the type of instruction they received (i.e. that they were taught) seemed very small and had to be excluded since our investigation of their teachers' teaching practices had shown that they were generally unaware of potential applications of learning strategies in their classroom and that in addition, they had previously admitted that they did not teach these strategies to their students except on very rare occasions.

All the strategies we listed, both the ones included in the Questionnaire and the Interview, as well as the ones suggested by the students themselves, proved readily classifiable using the distinction between cognitive and metacognitive strategies. This framework can provide a workable classification basis for other researchers as well as for teachers who wish to integrate strategy instruction into their curriculum. This point will be discussed in more detail later.

The analysis of these strategies has shown that in both years, there were more cognitive strategies than metacognitive ones and that students in general reported using cognitive strategies far more regularly than metacognitive ones. There was however, a tendency among advanced students (Fourth Year) to use metacognitive strategies more often than intermediate ones (First Year). This can be explained by the fact that the former, who have already developed greater proficiency in the foreign language, were able to attend to other aspects of learning involving metacognitive control.

It must be reminded however, that our results could have been skewed by the procedure we have followed to tap these strategies, and we suggested that for future research greater control be put on the distribution of the questions in relation the strategies investigated, or to work out a ratio between the various questions and the corresponding number of LS they illustrate.

As for our second research question which looked at the interaction of LS with the acquisition of various areas of the TL, our findings have provided enough evidence to show that this occurrence was not random. Thus, as far as the acquisition of language skills was concerned for instance, both First and Fourth-Year students showed similar patterns in terms of the type of strategy used and the frequency of occurrence with which a particular strategy was used. Both groups have used cognitive strategies more extensively than metacognitive ones.

Similarly, both groups have used identical strategies with the acquisition of a particular skill. In the acquisition of 'Speaking' for instance, 'Functional Practise' and



'Question for Clarification' turned out to be the strategies which most often used in both groups. As for metacognitive strategies for instance, 'Self-Monitoring' and 'Monitoring Others' were the strategies most frequently used in association with the acquisition of 'Speaking' in both groups.

Further evidence in support of these findings was provided by the analysis of the strategies which were most extensively used in the acquisition of various language items (Grammar, Vocabulary and so on) in which students in both years have followed the same pattern: First, cognitive strategies were used more extensively than metacognitive ones and then, the strategies which occurred most frequently with the acquisition of a particular item in the First Year were also used by students in the Fourth Year.

However, unlike the acquisition of language skills and language items, the investigation of learners' learning processes has yielded more metacognitive strategies than cognitive ones. This shows that many learners in both years exhibited a great awareness of metacognitive control during the acquisition process, suggesting thus a high level of metalinguistic awareness, or as Gass (1983:277) put it "the ability to think and talk about the language."

These findings have led us to put forward a suggestion which we had not initially foreseen : The use of the particular strategies used in connection with the acquisition of a given area of the foreign language could be seen as an indication of the learning patterns these students followed for the acquisition of this particular area of the language. For instance, in the acquisition of 'Speaking' the frequent use of 'Functional Practise' could be seen as an indication of how students learned: They showed that they primarily focussed on communication in order to improve their acquisition of this skill, whereas in the acquisition of 'Writing' the use of 'Formal Practise' showed that they focussed primarily on the language code which they practised in order to improve their mastery of this skill.

For our third research question thus, our findings showed that learners from either the First or Fourth Year showed no significant difference in their use of strategies, although generally, the former had a tendency to use more strategies than the latter. This may be due to the fact that, as intermediate learners, First-Year students were still in the process of acquiring much of the foreign language which thus required them to manipulate the foreign language materials far more extensively than Fourth-Year students, hence their tendency to make a greater use of learning strategies.

As for the effect of learners' proficiency in the foreign language on the use of learning strategies our findings showed that, if for Fourth-Year students there was no



significant difference in the use of strategies between 'good' students and their 'less good' counterparts although the former showed a tendency to use relatively more strategies than the latter, in the First-Year instead, we found a significant difference in the use of learning strategies between the group of 'good' students and the group of 'less good' ones, i.e. that the former did regularly use more strategies than the latter. These results in fact, confirm earlier findings suggested by various studies (O'Malley 1985, Chamot 1987).

We can therefore conclude that our findings have provided us with enough evidence to support our claim that in the early stages of the acquisition process 'good' students will readily use significantly more learning strategies than their less able counterparts.

#### 4. Implications for Foreign Language Teaching

Despite our emphasis on the study of the learners' language learning processes, and more specifically on their learning strategies, our principal motivation in undertaking this research was to address the concerns of the classroom teacher because ultimately, our purpose in studying learner strategies was an applied one: We hoped to determine which strategies were used most effectively by students in acquiring various areas of the foreign language.

As our investigation of their background has shown, very few teachers have stopped to think and consider what might be going on in their students' minds as they were learning English. We are convinced that it would help them a lot for instance, to determine the relative importance of their students' beliefs about language learning and its effect on the use of strategies. This would involve them in discovering what strategies their students are already using. In doing so, we are sure, they will also discover whether poor learners can be trained to use strategies which will lead them to greater success.

Furthermore, if our findings about the interaction of some strategies with the acquisition of particular areas of the foreign language are corroborated by further evidence, teachers would have at their disposal powerful teaching tools which would help them to profitably direct their students to use efficiently the required strategies for the acquisition of a particular area of the foreign language. Intervention by the teachers in directing students' use of learning strategies can help less able students to profit from the strategies which help best their performance in that particular activity.

Another promising area is that teachers compare the strategies used for a given task by 'good' students in order to train poor learners in these strategies. Moreover,



there is no theoretical or empirical reason why the learning strategies which we and other researchers have identified be considered as a closed-list: Teachers can use this list as a basis for further improvement and enrichment.

Ultimately, our aim in this research was to provide teachers with some pedagogical tools which can contribute to promoting learners' autonomy and enhancing their learning. Teachers can no doubt find ways of incorporating into existing teaching materials, many learning strategies that have been suggested by our findings which they can teach with only modest extra effort. This will, we are convinced, improve greatly the overall classroom performance. This also means that teachers will no longer be mere 'givers' of knowledge but 'helpers' who will contribute significantly in improving their learners' overall autonomy and hence, their achievement in the TL.

### **7.5. Suggestions for Further Research**

Because of the limitations inherent to our research we feel that we cannot conclude without mentioning some of the areas in which further research might be done as a follow up of this study:

- 1) Replicate this study with other learners from different linguistic backgrounds.
- 2) Look into more details to the relation between the acquisition of various skills and the strategies used.
- 3) Examine the role of beliefs and other psychological and affective factors more closely to determine their effects on the use of learning strategies.
- 4) Examine in more details the learning strategies used at different levels of proficiency in the foreign language.
- 5) Examine the way strategies combine and see if specific patterns can be isolated, and
- 6) Examine the effects of learning strategies-training on students' use of strategies and whether it improves their acquisition of the foreign language.
- 7) Examine the ways in which various strategies combine and determine whether definable patterns can be identified .

In conclusion, what this research has perhaps shown most clearly is that foreign language learners are not 'Clean slates' on which teachers can write at will. Instead, they are reflective beings who consciously apply mental strategies to learning situations.

We are aware that this research has its limitations but our hope is that in addition to being a useful source of information for foreign language teachers, it will also serve as a basis for further study in learner strategies for different language-learning tasks at different levels stages of learning under different language-learning conditions and for different languages.



- ABRAHAM, R.G. and VANN, R.J. (1987)  
 "Strategies of two language learners: Insights and prescriptions ", in  
 WENDEN and RUBIN (eds) 1987 : 85-102.
- ADAMS, M. (1978),  
 "Methodology for examining second language acquisition", in,  
 HATCH (ed) 1978 : 277 - 296.
- ADJEMIAN, C. (1976)  
 "On the nature of interlanguage systems", Language Learning, 26 :  
 297-320
- ALATIS, J.E. (ed) (1968)  
Report of the Nineteenth Annual Round Table : Contrastive  
 Analysis and Its Pedagogical Implications, Georgetown University  
 Press.
- ALLWRIGHT, R. (ed) (1975)  
Working Papers : Language Teaching Classroom Research,  
 University of Essex, Department of Language and Linguistics
- ALLWRIGHT, R. (1980),  
 "Turns, topics and tasks: Patterns of participation in language learning  
 and Teaching", in LARSEN-FREEMAN (ed) 1978 : 165-167.
- ALLWRIGHT, R. (1988)  
Observation in The Language Classroom, London: Longman.
- ANDERSEN, R. (1980)  
 "The role of creolisation in Schumann's Pidginization Hypothesis for  
 second language acquisition", in SCARCELLA and KRASHEN (eds)  
 1980 : 66-73
- ANDERSEN, R. (ed) (1981)  
New Dimensions in Second language Acquisition Research Rowley,  
 Mass.:Newbury House
- ANDERSEN, R. (ed) (1983a)  
Pidginization and Creolization as Language Acquisition,  
 Rowley, Mass.:Newbury House
- ANDERSEN, R. (1983b)  
 "Introduction: A language acquisition interpretation of pidginization  
 and creolization", in ANDERSEN (ed) (1983).

- ANDERSON, T.H. (1979)**  
 "Study skills and learning strategies" , in O'NEIL, H.F. (ed) 1979: 77-96.
- ARY, D., JACOBS , L.C. and RAZAVIEH, A. (1985)**  
Introduction to Research in Education, Holt,Rinehart and Winston
- AUSUBEL, D. (1963)**  
 "Cognitive structure and the facilitation of meaningful verbal learning",  
Journal of Teacher Education, 14:217-221 .
- AUSUBEL, D.(1964)**  
 "Adults Vs children in second language learning: Psychological considerations", Modern Language Journal, 48:420-424 .
- AUSUBEL, D. ( 1968 )**  
 Educational Psychology: A Cognitive View, New York:Holt,Rinehart and Winston
- BACHS, E. and HARMS, R. ( 1968)**  
Universals in Linguistic Theory, New York, Holt, Rinehart and Winston
- BAILEY, K.M. (1980)**  
 "An introspective analysis of an individual's language learning experience", in SCARCELLA, R. and KRASHEN, S.( eds), 1980 : 58-65
- BAILEY, M., MADDEN,C. and KRASHEN, S.D. (1974)**  
 "Is there a 'natural sequence' in adult second language learning ?"  
Language Learning, 24/2 : 235-243 .
- BAILEY, K.M., LONG M.H., and PECK, S. (eds) (1983)**  
Second Language Studies, Newbury House,Rowley, Mass.
- BAILEY, K.M. and OCHSNER, R. (1983)**  
 " A methodological review of the diary studies: Windmill tilting or social science ? ", in BAILEY, K.M. et al. (eds) 1983: 188-198 .
- BELLUGI, U. and BROWN, R.(eds) (1964)**  
The Acquisition of Language, Monograph of the Society for Research in Child Development, No 29 .
- BERKO, J. and BROWN, R.(1960)**  
 "Psycholinguistic research methods" , in MUSSEN (ed) Handbook of Research Methods in Child Development (1960): 517-557



- BIALYSTOK, E. (1968)**  
 "Some factors in strategies", in FAERCH and KASPER (eds) 1983 :  
 100-118
- BIALYSTOK, E. (1978)**  
 "A theoretical model of second language learning", Language Learning, 28/1 : 69-83
- BIALYSTOK, E. (1979)**  
 "The role of conscious strategies in second language proficiency",  
Canadian Modern Language Review, 35:372-394 , reprinted in The Modern Language Journal, 65: 24-85 (1981)
- BIALYSTOK, E. (1983)**  
 "Some factors in the selection and implementation of communication strategies", in FAERCH and KASPER (eds) 1983 :100-118 .
- BIALYSTOK, E. (1984)**  
 "Strategies in interlanguage learning and performance", in DAVIES et al. (eds) 1984 : 37 - 48 .
- BIALYSTOK, E. (1985)**  
 "The compatibility of teaching and learning strategies", Applied Linguistics ,6 : 225-262
- BIALYSTOK, E. and SHARWOOD-SMITH, M. (1985)**  
 "Interlanguage is not a state of mind : An evaluation of the construct for second language acquisition ", Applied Linguistics, 6 : 101-117
- BIALYSTOK, E. and FROHLICH , M. ( 1977)**  
 "Aspects of second language learning in classroom settings ", Working Papers on Bilingualism, 13 : 1-26 .
- BLOCH, O. (1921)**  
 "Premiers stades du langage chez l'enfant" , Journal de Psychologie , 18 : 693-712
- BLOCH, O. (1924)**  
 "La phrase dans le langage de l'enfant", Journal de Psychologie, 21 : 18-44
- BLOOM, L. (1970)**  
Language Development : Forms and Functions in Emerging Grammars, Cambridge, Mass., MIT Press
- BLOOM, L. (1971)**  
 "Why not pivot-grammar ? ", Journal of Speech and Hearing Disorders, 36 : 40-50

- BLOOM, L. (1976)**  
 "Language development", in WARDAUGH, R. and BROWN, H.D. (eds), 1976: 8-43
- BORG, R.W. (1987)**  
Applying Educational Research : A Practical Guide for Teachers, Longman.
- BORG, R.W. and GALL, M.D. ( 1983)**  
Educational Reserch : An Introduction, Longman .
- BOWERMAN, M. (1973)**  
Learning to Talk: A Cross-Linguistic Study of Early Syntactic Development, with Special Reference to Finnish, CUP.
- BRAINE, M. ( 1963)**  
 "The ontogeny of English phrase structure :The first phase ",  
Language, 39 : 1-13
- BROWN, A.L. and PALINCSAR, A.S. (1982)**  
 "Inducing strategic learning from texts by means of informed, self-control training", Topics in Learning and Learning Disabilities, 2/1 : 1-17
- BROWN , H.D. (1973)**  
 "Affective variables in second language acquisition", Language Learning, 23 : 231-254
- BROWN, H.D. (1977)**  
 "Cognitive and affective characteristics of good language learners" in HENNING, C. (ed) Proceedings of the Los Angeles Second Language Research Forum, Los Angeles, UCLA, Feb. 1977 : 349-354
- BROWN, H. D. (1980)**  
Principles of Language Learning and Teaching , Englewood Cliffs, New Jersey, Prentice Hall.
- BROWN, H.D. ,CRYMES, R.H. and YORIO, C.A. (eds) (1977)**  
Selected Papers from the 1977 TESOL Convention , Washington, D.C.: TESOL, Georgetown University .
- BROWN, R. (1973)**  
A First Language, Cambridge, Mass.: Harvard University Press.



- BROWN, R. and FRASER, C. (1963)**  
 "The acquisition of syntax ",in C.COOPER and MUSGRAVE, B.(eds)  
Verbal Behaviour and Learning: Problems and Processes , New  
 York : Mc Graw Hill, 1963 : 158 - 197 .
- BROWN, R., CAZDEN,C. and BELLUGI, U. (1969)**  
 "The child's grammar from 1 to 3" , Vol.2 of J.P. HILL (ed), Minnesota  
 Symposium on Child Psychology, University of Minnesota  
 Minneapolis, Minnesota .
- BROWN, R. and HANLON, C. ( 1970)**  
 "Derivational complexity and order of acquisition in child's speech " in  
 J.HAYES (ed) Cognition and the Development of Language, New  
 York : John Wiley and Sons, 1970: 11 -54
- BRUNER, J. (1975)**  
 "The ontogenesis of speech acts", in Journal of Child Language,  
 Vol.2: 1-9 .
- BURSTALL, C.,JAMIESON, M.,COHEN, M.,COHEN,S. and HARGRAVES, M.  
 (1974)**  
Primary French in the Balance, Slough:NFER
- BURT, M. , DULAY, H. and FINNOCHIARO, M. (eds) (1977)**  
Viewpoints on English as a Second Language, New York
- CANCINO, H. ,ROSANSKY, E. and SCHUMANN, J.H. (1978)**  
 "The acquisition of English negatives and interrogatives by native  
 Spanish speakers", in HATCH (ed) 1978 : 207-230 .
- CARROLL, J. (1958)**  
 "A factor analysis of two foreign language aptitude batteries", Journal  
 of General Psychology, 59 : 3-19 .
- CARROLL, J. (1973)**  
 "Implications of aptitude test research and psycholinguistic theory for  
 foreign language teaching", International Journal of  
 Psycholinguistics, 2: 5-13
- CARROLL, J. (1981)**  
 "Twenty five years of research on foreign language aptitude",in  
 DILLER (ed) 1981 : 83 - 118
- CARROLL, J. and SAPON, S.(1959)**  
Modern Language Aptitude Test ,New York.

- CARTON, A. (1966)  
The Method of Inferencing in Foreign Language Study, The Research Foundation of the City of New York .
- CARTON, A. (1971)  
 "Inferencing : A process in using and learning language",in PIMSLEUR,P. and QUINN,T.(eds), The Psychology of Second Language Learning, C U P 1971 : 45 - 58 .
- CAZDEN, C., CANCINO, H., ROSANSKY,E. and SCHUMANN, J. (1975)  
Second Language Sequences in Children,Adolescents and Adults, Final Report,US Department of Health, Education and Welfare, reported in ELLIS(1986)
- CHAFE, W. (1971)  
Meaning and the structure of Language, Chicago, Ill.:University of Chicago Press
- CHAMOT, U. (1987)  
 "The learning strategy of ESL students ",in WENDEN and RUBIN(eds): 1987: .71-83.
- CHAUDRON, C. (1983)  
 "Foreigner talk in the classroom-an aid to learning ", in SELIGER and LONG (eds) 1983 :127 - 145
- CHERCHALLI, S. 91988)  
Learners' Reactions to their Textbooks (with special reference to the relation between differential achievement) : A Case Study of Algerian Secondary School Learners , Doctoral thesis, University of Lancaster .
- CHOMSKY, N. ( 1959)  
 "A review of B.F. Skinner's Verbal Behaviour ", Language ,35 :26-58
- CHOMSKY, N. (1965)  
Aspects of the Theory of Syntax, Cambridge,Mass.: MIT Press.
- CHOMSKY, N. (1975)  
Reflections on Language, New York,Pantheon Books
- CHOMSKY, N. (1980)  
Rules and Representations ,Oxford:Basil Blackwell
- CLARK, E. (1971)  
 "On the acquisition of the meaning of 'before' and 'after' ", Journal of Verbal Learning and Verbal Behaviour ,10: 266-275 .



- CLEMENT , R., MAJOR, L., GARDNER, R. and SMYTHE, P. (1977)  
 "Attitudes and motivation in second language acquisition : An investigation of Ontario francophones", Working Papers on Bilingualism ,12: 1-20.
- COHEN , A. (1981)  
 "Introspection about second language learning", Paper presented at the AILA Congress, Lund, Sweden, also in Studia Anglica Posnaniensa , 15:149-156 (1983).
- COHEN ,A. (1984)  
 "Studying second language learning strategies: How do we get the information ? ", Applied Linguistics, 5 : 101-112.
- COHEN, A. (1987)  
 "Students processing of feedback on their composition", in WENDEN and RUBIN (eds) 1987 : 57-69.
- COHEN, A. and ROBBINS, M. (1976)  
 "Towards assessing interlanguage performance: The relationship between selected errors, learners' characteristics and learners' explanation ", Language Learning , 26 : 45-66 .
- COHEN, A. and APHEK, A. (1980)  
 "Retention of second language vocabulary over time: Investigating the role of mnemonic association ", System , 8 : 221-231 .
- COHEN, A. and APHEK, A. (1981)  
 "Easifying second language learning", Studies in Second Language Acquisition , 3 : 221-236
- COHEN, A. and HOSENFELD, C . (1981)  
 "Some uses of mentalistic data in second language research ", in Language Learning , 31 : 285-313.
- COMRIE, B. (1984)  
 "Why linguists need language acquirers ?", in RUTHERFORD ,W. (ed) Language Universals and Second language Acquisition, Amsterdam : John Benjamins ,( 1984).
- COOK, V. J. (1973)  
 "The comparison of language development in native children and foreign adults", IRAL , Vol 11 : 13- 29 .
- COOK, V. J. (1975)  
 "Strategies in the comprehension of relative clauses, in Language and Speech, 18:204-212

- COOK, V. J. (1977)  
"Cognitive processes in second language learning", IRAL, 15 : 1 - 20
- COOK, V. J. (1985)  
"Universal Grammar and second language learning", Applied Linguistics, 6/1 : 2-18
- COOPER, R. and FISHMAN, J. (1977)  
"A study of language attitude" , in FISHMAN, J. COOPER, R. and CONRAD, A.(eds), The Spread of English : The Sociology of English As An Additional Language, Rowley ,Mass. 1977: 239-276
- CORDER, S.P. (1967)  
"The significance of learners' errors" , IRAL, 4/4 : 161-169
- CORDER, S.P. (1971a)  
"Describing the language learner's language", CILT Reports and Papers, No 6:57-64
- CORDER, S.P. (1971b)  
"Idiosyncratic dialects and error analysis", IRAL ,9/2:158-171.
- CORDER, S.P. (1978)  
"Language-learner language " , in RICHARDS, J.C. (ed) Understanding Second and Foreign language Learning, Rowley Mass.:Newbury House, 1978 : 71-93 .
- CORDER, S.P. and ROULET, E. (ed) (1977)  
The Notions of Simplification. Interlanguage. Pidgins and their Relation to Second Language Pedagogy, (=Actes du 5eme Colloque de Linguistique Applique de Neuchatel, 20-22 Mai 1976, Geneve .
- COULTHARD, M. and MONTGOMERY, (1981)  
Studies in Discourse Analysis ,London Routledge and Kegan Paul.
- CURTISS, S. (1977)  
Genie: A Psycholinguistic Study of a modern day 'wild child', New York, Academic Press Inc.
- DANSEREAU , D. (1978)  
"The development of a language strategies curriculum " , in O' NEIL , H. F. (ed) 1978:3-44
- DAVIES, A., CRIPER, C., and HOWATT, A.P.R.(eds) (1984)  
Interlanguage ,Edinburgh University Press.



**DECAMP, D. (1971)**

"Implicational scales and sociolinguistic linearity", Linguistics , 13 : 30-43

**DILLER , K.C. (ed) (1981)**

Individual Differences and Universals in Language Learning Aptitude, Newbury , Rowley, Mass.

**DI PIETRO, R.J. (1968)**

"Contrastive analysis and the notion of deep and surface structures", in ALATIS (ed) 1968 :39-64

**DORON, S. (1973)**

"Reflectivity-impulsivity and their influence on reading for inference for adult students of ESL", unpublished manuscript, University of Michigan.

**DRACH, K. (1969)**

"The language of the parent: A pilot study in the structure of linguistic input to children" , in Working Paper No 14, Language Behaviour Research Laboratory, University of California, Berkeley.

**DULAY, H.C. and BURT, M.K. (1972)**

"Goofing: An indication of children's second language learning strategies", Language Learning, 22:235-252.

**DULAY, H.C. and BURT, M.K. (1973)**

"Should we teach children syntax ? ", Language Learning, 23: 245-258.

**DULAY, H.C. and BURT, M.K. (1974a)**

"A new perspective on the creative construction process in child language acquisition", Language Learning , 24/2: 253 - 278.

**DULAY, H.C. and BURT, M.K. (1974b)**

"Errors and strategies in child second language acquisition", TESOL Quarterly ,8:129-138.

**DULAY, H.C. and BURT, M.K. (1974c)**

"Natural sequence in child second language acquisition", Language Learning , 24:37-53.

**DULAY, H.C. and BURT , M.K. (1974d)**

"You can't learn without goofing: An anlysis of children's second language errors " , in RICHARDS, J.C. (ed) 1974: 95-123.

- ECKMAN, F. (1977)  
 "Markedness and the contrastive analysis hypothesis", Language Learning , 27: 315 - 330.
- ELLIS, R. (1980)  
 "Classroom interaction and its relation to second language learning", RELC Journal , 11/2 : 29-48.
- ELLIS, R. (1984)  
Classroom Second Language Development , Oxford, Pergamon.
- ELLIS, R. (1985)  
Understanding Second Language Acquisition , OUP.
- VAN ELS, T., BONGAERTS, T., EXTRA, G., VAN OS, C. and VAN DIETAN, A.M.J. (1984)  
Applied Linguistics and the Learning and Teaching of Foreign Languages , Edward Arnold.
- ERICSSON, K.A. and SIMON, H. (1980)  
 "Verbal Report as data ", Psychological Review , 87: 215-251.
- ERVIN-TRIPP, S. (1966)  
 "Language development" ,in HOFFMAN, L. and HOFFMAN, M (eds). Review of Child Development Research , New York , Russel Sage Foundation , Vol. 2 , 1966 : 55-106
- ERVIN-TRIPP , S. (1974)  
 "Is second language learning like the first ?" , TESOL Quarterly , 8/2: 111-127.
- FAERCH, C. (1979)  
 "Describing interlanguage through interaction: Problems of systemacity and permeability" , Working Papers on Bilingualism , 19 : 59-78.
- FAERCH, C. and KASPER, C. (1980),  
 "Processes and strategies in foreign language learning communication" , Interlanguage Studies Bulletin , Utrecht, 5 : 47-118.
- FAERCH, C. and KASPER, C. (1981),  
 "Plans and strategies in foreign language communication" ,in FAERCH and KASPER (eds), 1983 : 20 -60
- FAERCH, C. and KASPER, C. (eds), (1983)  
Strategies in Interlanguage Communication , London, Longman.



- FAERCH, C. and KASPER, C. (eds) ,(1987)  
Introspection in Second Language Research , Multilingual Matters  
 Ltd , Clevedon , Philadelphia.
- FANSELOW, J.F. (1977)  
 "Beyond Rashomon - conceptualizing and describing the teaching act",  
TESOL Quarterly , 11: 17-39.
- FATHMAN, A. (1975)  
 "The relationship between age and second language productive ability"  
 , Language Learning 25:245-253 .
- FERGUSON, C. (1971)  
 "Absence of copula and the notion of simplicity", in HYMES, D. (ed)  
Pidginization and Creolization of Language, Cambridge, Cambridge,  
 Mass., 1971 : :.141-150.
- FERGUSON, C. and DEBOSE, C. (1977)  
 "Simplified registers, broken language and pidginization", in  
 VALDMAN, A. (ed), Pidgin and Creole Linguistics Bloomington:  
 London ,1977 : 99-125.
- FERGUSON, C.A. and SLOBIN, D.I. (eds) (1973)  
Studies of Child Language Development, New York, Rinehart  
 Rinehart and Winston.
- FILLMORE, C. (1968)  
 "The case for case ", in BACH and HARMS (eds), 1968 : 1-90
- FILLMORE, L. W. (1976)  
The Second Time Around :Cognitive and Social Strategies in  
 Second Language Acquisition , Ph.D. Thesis,Stanford University.
- FILLMORE, L. W. (1979)  
 "Individual differences in second language acquisition", in FILLMORE  
 , C.S., KEMPLER, D. and WANG , W.S.Y. (eds) Individual  
 Differences in Language Ability and Language New York :  
 Academic Press, 1979 : 203-228.
- FLAVELL, J.H. (1979)  
 "Metacognition and cognitive monitoring : a new area of cognitive of  
 cognitive developmental area", American Psychologist, 34 : 906-911 .
- FROHLICH, M. and PARIBAKHT, T. (1984)  
 "Can we teach our students how to learn ? ",in ALLEN, P. and SWAIN,  
 M. (eds) Language Issues in Educational Policies , ELT  
 Documents119, Pergamon, B/C , 1984 : 65-81 .

- GAGNE, M. (1965)**  
The Conditions of Learning, New York, Holt, Rinehart and Winston.
- GARDNER, R. (1979)**  
 "Social psychological aspects of second language acquisition", in  
 GILES, H. and St CLAIR, R. (eds) (1979), Language and Social  
 Psychology, O U P 1979 : 193 -220 .
- GARDNER, R. (1980)**  
 "On the validity of affective variables in second language  
 acquisition:conceptual,textual and statistical considerations",  
Language Learning, 30 : 225-270.
- GARDNER, R. and LAMBERT, W. (1959)**  
 "Motivational variables in second language acquisition", Canadian  
 Journal of Psychology, 13: 266-272 .
- GARDNER, R. and LAMBERT, W. (1972)**  
Attitudes and Motivation in Second Language Learning,  
 Rowley,Mass.
- GARDNER, R. and SMYTHE, P. (1975)**  
 "Motivation and second language acquisition", The Canadian Modern  
 Language Review, 31 :218-230.
- GARDNER, R., SMYTHE, P. , CLEMENT, R. and GLIKSMAN, L. (1976)**  
 "Second language learning : a social psychological perspective", The  
 Canadian Modern Language Review ,32:198-213.
- GASS, S. (1979)**  
 "Language transfer and universal grammatical relations", Language  
 Learning, 29/2 : 327-344.
- GASS, S. (1980)**  
 "An investigation of syntactic transfer in adult second language  
 learners", in SCARCELLA and KRASHEN (eds), 1980 : 132-141
- GASS, S. and ARD, J. (1980)**  
 "Second language data:the relevance for language universals", TESOL  
 Quarterly, 14/3 : 443-452.
- GENESEE, F. (1976)**  
 "The role of intelligence in second language learning", Language  
 Learning, 26 : 267-280.
- GENESEE, F. and HAMAYAN, E. (1980)**  
 "Individual differences in second language learning, Applied  
 Linguistics, 1 : 95-110.



- GESCHWIND, N. (1970)**  
 "The organisation of language and the brain", Science, 170:940-944.
- GIBSON, R. 1975)**  
 "The strip-story: A catalyst for communication", TESOL Quarterly, 9/2 : 149-154 .
- GIBSON, R. and BYRNE, J. (1982)**  
 "An intergroup approach to second language acquisition", Journal of Multilingual and Multicultural Development, 3:17-40.
- GILES, H. (ed) (1977)**  
Language Ethnicity and Intergroup Relations, New York : Academic Press.
- GILES, H. and BYRNE, J. (1982)**  
 " An intergroup approach to second language acquisition ", Journal of Multilingual and Multicultural Development, 3 : 17 - 40 .
- GREENBERG, J.H. (1966)**  
Universals of Language, (2nd edition), Cambridge Mass.:MIT Press.
- GREGG, K.R. (1984)**  
 "Krashen's Monitor Theory and Occam's razor", Applied Linguistics, 5: 79-100.
- GREGOIRE, A. (1933)**  
 "L'Apprentissage de la parole pendant les deux premièVres annQes de l'enfance ", Journal de Psychologie Normale et Pathologique, 30: 375-389
- HAASTRUP, K. and PHILLIPSON, R. (1983)**  
 "Achievement strategy in learner/native speaker interaction ", in FAERCH AND KASPER (eds), 1983: 140-158.
- HAKUTA, K. (1976)**  
 "A case study of a Japanese child learning English as a second language ", Language Learning, 26/2 : 321- 352 .
- HALLIDAY, M.A.K. (1975)**  
Learning How to Mean : Explanations in the Development of Language, London:Edward Arnold.
- HATCH, E.M. (1978a)**  
Second Language Acquisition : A Book of Readings Newbury House, Rowley ,Mass.:

- HATCH, E.M. (1978b)  
 "Discourse analysis, speech acts and second language acquisition", in  
 HATCH, (ed), 1978 :401-474 .
- HATCH, E.M. and LONG, M. (1980)  
 "Discourse analysis, what's that ? ", in LARSEN-FREEMAN (ed) 1980 :  
 1 - 40 .
- HATCH, E.M. (1983)  
 "Simplified input and second language acquisition", in ANDERSEN  
 (ed) ,(1983).
- HATCH, E.M. (1983)  
Psycholinguistics: A Second Language Perspective, Newbury House,  
 Rowley, Mass.:
- HATCH, E.M., SHAPIRA, R. and GOUGH, J. (1978)  
 "'Foreigner-talk' discourse ", ITL: Review of Applied Linguistics, 39-  
 40 :39-59
- HILL, J. (1972)  
The Educational Sciences , Detroit, Oakland Community Centre.
- HORWITZ, E.K. (1985),  
 "Using students' beliefs about language learning and teaching in foreign  
 language methods course", Foreign Language Annals, 18/4 : 333 -  
 340 .
- HORWITZ, .E.K. (1987)  
 "Surveying students beliefs about language learning" ,in WENDEN  
 and RUBIN (eds) 1987 :119-129 .
- HOSENFELD, C. (1976)  
 "Learning about learning :Discovering our students' strategies" ,  
Foreign Language Annals, 9/2 : 117-129 .
- HOSENFELD, C. (1977)  
 "A preliminary investigation of the reading strategies of successful and  
 non successful language learners ", System , 5 :110-123 .
- HOSENFELD, C. (1978)  
 "Students' 'mini theories' of second language learning ", Association  
 Bulletin , 29:2
- HUANG, X.H. and VAN NAERSSSEN, M. (1987)  
 "Learning strategies for oral communication", Applied Linguistics ,  
 8/3 : 287-307 .



- JAIN, M.P. (1974)**  
 "Error analysis : source, cause and significance" in RICHARDS, J.C. (ed), 1974 : 189-215 .
- JENKINS, J. and PALERMO, D. (1974)**  
 "Mediation process and the acquisition of linguistic structure", in BELLUGI and BROWN (eds), 1974 : 141-168
- JOHNSON-LAIRD, P. N. and WASON, P.C. (eds) (1977)**  
Thinking : Readings in Cognitive Science , New York, CUP .
- JOHNSTONE, J.W. and RIVERA, R. (1965)**  
Volunteers for learning: A study of the Educational Pursuits of American Adults, Chicago, Aldine Publishing Co.
- JORDENS, P. (1977)**  
 "Rules, grammatical intuitions and strategies in foreign language learning", Interlanguage Studies Bulletin, 2: 5-76.
- KARMILOFF-SMITH, A. (1979)**  
A Functional Approach to Child Language, CUP.
- KEENAN, E. and COMRIE, B. (1977)**  
 "Noun phrase accessibility and Universal Grammar", Linguistic Enquiry, 8:63-99.
- KELLERMAN, E. (1977)**  
 "Towards a characterization of the strategy of transfer in second language learning", Interlanguage Studies Bulletin , 2/1 :
- KELLERMAN, E.(1979)**  
 "Transfer and non-transfer: Where are we now ?" Studies in Second Language Acquisition ,2: 37-57.
- KELLERMAN, E.(1984)**  
 "The empirical evidence for the evidence of the L1 in interlanguage", in DAVIES and CRIPER (eds) 1984 : 98-122 .
- KLAUS, G. and BUHR, M. (eds) (1976)**  
Philosophisches Worterbuch , Leipzig : VEB Bibliographisches Institut.
- KRASHEN, S.D. (1973)**  
 "Lateralisation, language learning and the critical period: Some new evidence", Language Learning, 23 :63-74.

**KRASHEN, S.D. (1977a)**

"The Monitor Model for second language performance", in BURT, M. DULAY, H. and FINNOCHIARO, C. (eds), 1977 : 152 - 161 .

**KRASHEN, S.D. (1977b)**

"Some issues related to the Monitor Model", in BROWN, H.D., YORIO, C. and CRYMES, R. (eds), On TESOL '77 : Teaching and Learning English as a Second Language : Trends in Research and Practice , Washington, TESOL. 1977 : 144 - 158 .

**KRASHEN, S.D. (1978a)**

"Adult second language acquisition and learning: A review of the theory and practice", in GINGRAS, R. (ed), Second Language Acquisition and Foreign language Teaching , Washington: Center for Applied Linguistics, 1978 : 1 - 26 .

**KRASHEN, S.D. (1978b)**

"Individual variation in the use of the Monitor", in RITCHIE (ed) 1978 : 175 - 182 .

**KRASHEN, S.D. (1981)**

Second Language Acquisition and Second Language Learning, Oxford, Pergamon Press.

**KRASHEN, S.D. (1982)**

Principles and Practice in Second Language Acquisition, Pergamon Press

**KRASHEN, S.D., BUTLER, J., BIRNBAUM and ROBERTSON, J. (1978)**

"Two studies in language acquisition and language learning", ITL: Review of Applied Linguistics , 39-40 : 73-92 .

**LADO, R. (1957)**

Linguistics Across Cultures, Ann Arbor: University of Michigan Press.

**LANDES, J. (1975)**

"Speech addressed to children : Issues and characteristics of parental input ", Language Learning, 25: 355-379 .

**LARSEN-FREEMAN, D. (1976)**

"An explanation for the morpheme acquisition order of second learners", Language Learning, 26: 125-134 .

**LARSEN-FREEMAN, D. (ed) (1980)**

Discourse Analysis in Second Language Research , Rowley, Mass.:



- LARSON, C. (1981)**  
 "A study of students' test-taking strategies and difficulties", Course Paper, ESL Section, Department of English, University of California, L.A.
- LASHLEY, K.S. (1951)**  
 "The problem of serial order in behaviour", in JEFFRESS, L.A. (ed), Cerebral Mechanisms in Behaviour, New York: Wiley, (1951).
- LENNEBERG, E.H. (1967)**  
The Biological Foundations of Language, New York,:John Wiley and Sons.
- LEOPOLD, W. (1939-1949 )**  
Speech Development of a Bilingual Child , Evanston,Illinois:North Western University Press, 1939 - 1949 ,4 Volumes .
- LEVENSTON, E.A. and BLUM, S. (1977)**  
 "Aspects of lexical simplification in the speech and writing of advanced adult learners" , in CORDER and ROULET (eds) 1977 : 57 -71 .
- LITTLEWOOD, W. (1984)**  
Foreign Language and Second Language Learning , CUP .
- LONG, M.H. (1981)**  
 "Questions in foreigner-talk discourse" , Language Learning ,31 : 135-157 .
- LONG, M.H. (1983)**  
 "Native speaker/non native speaker conversation and the negotiation of comprehensible input " , Applied Linguistics, 4/2:126-141.
- LONG, M.H. . and SATO, C. (1983)**  
 "Classroom foreigner-talk discourse:forms and functions of teachers' questions " , in SELIGER and LONG (eds) , 1983 : 268 - 286 .
- LOWE, T. (1987)**  
 "An experiment in role reversal : teachers as language learners", English Language Teaching Journal, 41/2 : 89-96 .
- LUKANI, Y. (1972)**  
 "Motivation to learn and language proficiency " , Language Learning , 22 : 261-274 .
- LUNZER, E. and DOLAN, T. (1979)**  
 "Reading for learning in the secondary school", in ASHER, C. (ed) Language, Reading and Learning, Oxford, Basil Blackwell.

- LYONS, J. (1970)**  
 "Semantics", in LYONS, J. (ed) New Horizons in Linguistics,  
 London : Penguin . : 152-178 .
- MAYER, R.E. (1987)**  
Educational Psychology : A Cognitive Approach , Little, Brown and  
 Company : Boston .
- MEISEL, J. (1980)**  
 "Linguistic simplification ", in FELIX, S. (ed) Second Language  
 Development, Tübingen : Gunter Narr ,1980 : 13 - 40 .
- MILLER, S. (1984)**  
Experimental Design and Statistics, (2nd edition) London : Methuen  
 .
- MILLER, W. and ERVIN, S. (1964)**  
 "The development of grammar in child language", in BELLUGI and  
 BROWN , 1964 : 9 - 34 .
- MILON, J. ( 1974)**  
 "The development of negation in English by a second language  
 learner", TESOL Quarterly , 8 : 137-143 .
- MORRISON, D. M. and LOW, G. (1983)**  
 "Monitoring and the second language learner" ,in RICHARDS, J.C.and  
 SCHMIDT, R.W. (eds) Language and Communication, London:  
 Longman. 1983 : 228 - 250 .
- MOSKOVITZ, B.A. (1978)**  
 "The acquisition of language ", Scientific American, Nov.1978:92-  
 108.
- MOULTON, W.G. (1968)**  
 "The use of models in contrastive analysis", in ALATIS (ed), 1968 :27-  
 38.
- MACDONOUGH, S. (1986)**  
Psychology in Foreign Language Teaching, London: Allen and  
 Unwin .
- MACLAUGHLIN, B. (1978)**  
 "The Monitor Model: Some methodological considerations ",  
Language Learning ,28:309-332.
- MACLAUGHLIN, B. (1984)**  
Second Language Acquisition in Childhood, Vol. I: Preschool  
 Children, Hillsdale, New Jersey: Lawrence Erlbaum.



- MACLAUGHLIN, B. (1987)  
Theories of Second Language Learning , London:Edward Arnold.
- McNEIL, D. (1966)  
 "Developmental psycholinguistics", in SMITH, F.S. and MILLER, G. (eds) The Genesis of Language, Cambridge, Mass.: MIT Press, 1966 : 15-84
- McNEIL, D. (1968)  
 "On theories of language acquisition ",in DIXON, T.R. and HORTON, D.L., (eds), Verbal Behaviour and General Behaviour Theory, Englewood Cliffs, New Jersey : Prentice Hall (1968) .
- McNEIL, D. (1970)  
The Acquisition of Language: The Study of Developmental Psycholinguistics, New York: Harper and Row .
- McTEAR, M. (1975)  
 "Structures and categories of foreign language teaching sequences", in ALLWRIGHT (ed) (1975)
- NAIMAN, N., FROHLICH, M., STERN, H.H., and TODESCO, A. (1978)  
The Good Language Learner , Toronto, Ontario:Ontario Institute for Studies in Education .
- NEMSER, W. (1971)  
 "Approximative systems of foreign language learners ", IRAL ,9/2: 115-123 .
- NEUFELD, G. (1978)  
 "A theoretical perspective on the nature of linguistic aptitude", IRAL, 16:15-25 .
- NEWMARK, L. (1970)  
 "How not to interfere with language learner" ,in LESTER, M. (ed) Readings in Applied Transformational Grammar, Holt, Rinehart and Winston, 1970 : 203 - 210
- NEWPORT, E.L. (1975)  
 "Motherese: The speech of mothers to young children" , Technical Report N0 52, Center for Human Information Processing, University of California, San diego.
- NISBET, J. and BELLOWS, N. (1977)  
 "Verbal report about causal influences on social judgements :private access versus public theories", Journal of Personality and Social Psychology, 35 : 613-624 .

- NISBET, R.E. and WILSON, T.D. (1977)**  
 "Telling more than we can know: Verbal report on mental processes",  
Psychological Review , 84 :231 -259 .
- NISBET, R.E. (1983)**  
 "Learning training for L2 learners : A selected review of content and method" ,Paper presented at the Annual TESOL Convention, March, 15-20, Toronto .
- OLLER, J. (1977)**  
 "Attitude variables in second language learning", in BURT et al.(eds), 1977: 172- 184.
- OLLER, J., BACA, L. and VIGILE, F. (1977a)**  
 "Attitudes and attained proficiency in ESL : A sociolinguistic study of Mexican Americans in the Southwest", TESOL Quarterly,11: 173-183.
- OLLER, J., HUDSON, A. and LIU, P. (1977b)**  
 "Attitudes and attained proficiency in ESL : A sociolinguistic of native speakers of Chinese in the US ", TESOL Quarterly, 27 : 1- 27.
- O'MALLEY, J.M., RUSSO, R.P. and CHAMOT , A.U. (1983)**  
Review of the Literature on Learning Strategies in the acquisition English as a Second Language: The Potential for Research Applications Rosslyn, Va:InterAmerica Research Association
- O'MALLEY, J.M. (1985)**  
 "Learning strategies used by beginning and intermediate ESL students ", Language Learning, 35/1: 21-46 .
- O'MALLEY, J.M., CHAMOT, A.H., MANZANARES, G.S., RUSSO, R.P. and KUPPER, L. (1985)**  
 "Learning strategy applications with students of English as a second language" TESOL Quarterly, 19/3:557-584 .
- O'MALLEY, J.M., CHAMOT, U .and KUPER, L. (1989)**  
 "Listening comprehension strategies in second language acquisition ", Applied Linguistics, Vol. 10/4 : 418 - 437 .
- O'NEIL, H.F. (ed) (1978)**  
Learning Strategies, The Educational Technology Series, New York: Academic Press .
- O' NEIL, H.F. and SPIELBERGER, C.D. (eds) (1979)**  
Cognitive and Affective Learning Strategies , The Educational Technology Series , New York : Academic Press. OSGOOD, C. (1953) Method, Theory and Experimental Psychology, New York ,OUP .



- OSGOOD, C. (1957)**  
 "A behaviouristic analysis of perception and language as cognitive phenomena", in Contemporary Approaches to Cognition, Cambridge, Mass.:Harvard University Press (1957).
- OXFORD, R. (1990)**  
Language Learning Strategies : What Every Teacher Should Know, Newbury House Publishers, New York .
- PECK , S. (1978)**  
 "Child-child discourse in second language acquisition", in HATCH (ed),1978 : 154 - 164.
- PECK, S. (1980)**  
 "Language play in child second language acquisition ", in LARSEN-FREEMAN, (ed) (1980) .
- PIAGET, J. (1960)**  
The Psychology of Intelligence, New Jersey: Littlefield, Adams.
- PIAGET, J. (1952)**  
The Origins of Intelligence in Children, Trans. M. Cook, New York : International University Press.
- PIAGET, J. and INHELDER, B. (1969)**  
The Psychology of the Child ,New York:Basic Books
- PIAGET, J. (1971)**  
Biology and Knowledge , Chicago:University of Chicago Press.
- PIMSLEUR, P. (1964)**  
Language Aptitude Battery , New York .
- PIMSLEUR, P. (1966)**  
Pimsleur Language Aptitude Battery (PLAB), New York: Harcourt Brace Jovanovich .
- PIMSLEUR ,P.,STOCKWELL,R. and COMREY ,A. (1962)**  
 "Foreign language learning ability " , Journal of Educational Psychology, 53 : 15-26 .
- POLITZER, R.L. (1983)**  
 "An exploratory study of self-reported language learning behaviours", Studies in Second Language Acquisition, 6 : 54-68 .
- RADFORD, J. (1974)**  
 "Reflections on introspection " , American Psychologist, 29:245-250 .

- RAMIREZ, A. and POLITZER, R. (1978)**  
 "Comprehension and production in English as a second language by elementary school children and adolescents ", in HATCH (ed) 1978: 313-332 .
- RAVEM, R. (1968)**  
 "Language acquisition in a second language environment", IRAL, 6/2:75-85.
- RAVEM, R. (1969)**  
 "First and second language acquisition", Paper given to the BAAL Seminar on Error Analysis, Edinburgh 26-27 April .
- RAVEM, R. (1973)**  
 "The development of WH- questions in first and second language learners", in OLLER, J.W. and RICHARDS, J.C. (ed), Focus on the Learner, Rowley, Mass.: Newbury House ,1973 : 136 - 144 .
- RICHARDS, J.C. (1971)**  
 "A non-contrastive approach to error analysis ", English Language Teaching Journal, 25/3 : 172-188 .
- RICHARDS, J.C. (ed) (1974)**  
Error Analysis, London:Longman .
- RICHARDS, J.C. (1975)**  
 "Simplification: A strategy in the adult acquisition of a foreign language:an example from Indonesian-Malay ", Language Learning 26 : 115-126.
- RIGNEY, J.W. (1978)**  
 "Learning strategies: A theoretical framework", in O'NEIL ,H.F. (ed) 1978: 165-202.
- RINGBOM, H. (1976)**  
 "The role of the mother tongue in foreign language learning in the light of different errors made by Finns and Swedish-speaking Finns learning English ", Proceedings of the 4th ICAL, Stuttgart .
- RINGBOM, H. and PALMBERG (eds) ((1976)**  
Errors Made by Finns and Swedish-Speaking Finns In The Learning of English, AFTIL ,Vol.5 , ABO .
- RITCHIE, W.C. (1968)**  
 "On the explanation of phonic interference", Language Learning, 18/3 & 4 : 183-197 .



- RITCHIE, W.C. (ed) (1978)**  
Second Language Acquisition : Issues and Implications, New York:  
 Academic Press.
- RIVERS, W. (1980)**  
 "Foreign language acquisition : Where the real problems lie ?",  
Applied Linguistics, 1/1 :48-59 .
- ROSANSKY, E.J. (1976)**  
 "Methods and morphemes in second language acquisition research ",  
Language Learning ,26/2 : 409-425 .
- RUBIN , J. (1975)**  
 "What the good language learner can teach us ?", TESOL Quarterly ,  
 9 : 41-51 .
- RUBIN, J. (1981)**  
 "The study of cognitive processes in second language learning",  
Applied Linguistics, 2 : 117-131 .
- RUBIN, J. (1987)**  
 "Learner strategy: Theoretical assumptions, research history and  
 typology", in WENDEN and RUBIN (eds), 1987 : 15-30 .
- RUTHERFORD, W. ( 1982)**  
 "Markedness in second language acquisition", Language, 32: 85-102 .
- SCARCELLA, R. and HIGA, C. ( 1981)**  
 "Input,negotiation and age differences in second language acquisition",  
Language Learning, 31 : 409-437 .
- SCARCELLA, R. and KRASHEN, S.D. (eds) (1980)**  
Research in Second Language Acquisition ,Rowley, Mass.:  
 Newbury House .
- SCHACHTER, J. (1974)**  
 "An error in Error Analysis", Language Learning, 24:205-214 .
- SCHACHTER, J., TYSON, F. and DIFFLEY, F. ( 1976)**  
 "Learner intuitions of grammaticality ", Language Learning, 25 : 67-  
 76 .
- SCHMIDT , M. (1980)**  
 "Coordinate structures and language universals in interlanguage",  
Language Learning, 30: 397-416 .

- SCHUMANN, J.H. (1976)**  
 "Social distance as a factor in second language acquisition", Language Learning, 25 : 135-143 .
- SCHUMANN, J.H. and SCHUMANN, F.M. (1977)**  
 "Diary of a language learner: An introspective study of second language learning ", in BROWN H.D. et al. (eds) (1977) .
- SCHUMANN, J.H. (1978a)**  
The Pidginization Process : A Model for Second Language Acquisition, Rowley, Mass.: Newbury House.
- SCHUMANN, J.H. (1978b)**  
 "Second language acquisition : The pidginization hypothesis", in HATCH (ed) 1978 : 256-271 .
- SCHUMANN, J.H. (1978c)**  
 "The acculturation model for second language acquisition ", in GINGRAS, R.C. (ed), 1978 : 27 - 50 .
- SCHUMANN, J.H. (1978d )**  
 "Social and psychological factors in second language acquisition", in RICHARDS (ed) ,1978 : 163-178 .
- SCHUMANN, J.H. (1980)**  
 "The acquisition of English relative clauses by second language learners", in SCARCELLA and KRASHEN (eds), 1980 : 51 - 57 .
- SCHLESSINGER, I.M. (1971)**  
 "Production of utterances and language acquisition", in SLOBIN,D.(ed) 1971 : 63 - 102 .
- SCHWARTZ, J. (1980)**  
 "The negotiation for meaning:Repairs in conversations between second language learners of English", in LARSEN-FREEMAN (ed) 1980 :138-153.
- SCOLLON ,R. (1976)**  
On child's language from one to two: The origins of construction, unpublished Ph.D. dissertation,University of Hawai ,reported in MACDONOUGH (1986)
- SCOVEL, T. (1969)**  
 "Foreign accents,language acquisition and cerebral dominance", Language Learning, 19:245-254 .



- SCRIBNER, S. (1977)**  
 "Modes of thinking and ways of speaking ", in JOHNSON-LAIRD and WASON (eds), 1977 : 438-500.
- SELIGER, H. (1978)**  
 "Implications of a multiple critical periods hypothesis for second language learning", in RITCHIE (ed) 1978 :11-19 .
- SELIGER, H. and LONG, M.H. (eds) (1983)**  
Classroom Oriented Research in Second language Acquisition, Newbury House, Rowley, Mass.
- SELINKER, L. (1972)**  
 "Interlanguage ", IRAL ,10/3 : 201-231 .
- SELINKER, L., SWAIN, M. and DUMAS, G. (1975)**  
 "The interlanguage hypothesis extended to children ", Language Learning, 25 : 139-152 .
- SHANNON, C.E. (1948)**  
 "A mathematical theory of communication, Bell System Technical Journal, 27 : 379-423 .
- SHANNON, C.E. and WEAVER, W. (1949)**  
The Mathematical Theory of Communication ,Urbana University of Illinois Press.
- SHIRLEY, M.M. (1933)**  
 "The first two years:A study of 25 babies", Vol.II, Intellectual Development ,Minneapolis: University of Minesota Press
- SINCLAIR-DE-ZWART, H. (1969)**  
 " Developmental psycholinguistics ", in ELKIND and FLAVELL (eds) Studies in Cognitive Development, 1969 : 315-336.
- SINCLAIR-DE-ZWART, H. (1971)**  
 "Sensorimotor action patterns as a condition for the acquisition of syntax", in HUXLEY and INGRAM (eds) Language Acquisition : Models and Methods, New York, Academic Press, 1971: 121-129.
- SINCLAIR, J. and BRAZIL, D. (1982)**  
Teacher Talk, Oxford: OUP .
- SINCLAIR, J. and COULTHARD, M. (1975)**  
Towards an Analysis of Discourse, Oxford:OUP .

- SJOHOL, K. (1976)**  
 "A comparison of the test results of vocabulary between Finnish and Swedish-speaking applicants for English ", in RINGBORN and PALMBERG (eds) , 1976 : 1- 13 .
- SKINNER, B.F. (1953)**  
Science and the Human Behaviour, New York: The Free Press.
- SKINNER, B.F. (1957)**  
Verbal Behaviour , New York :Appleon-Century Crofts.
- SLIMANI, A. (1987)**  
The Teaching/Learning Relationship: Learning Opportunities and Learning Outcomes. An Algerian Case Study, Doctoral thesis, University of Lancaster.
- SLOBIN, D.I. (ed) (1971)**  
The Ontogenesis of Grammar ,New York:Academic Press .
- STERN, H.H. (1975)**  
 "What can we learn from the good language learner", Canadian Modern Language Review,31 : 304-318 .
- STAATS, A. (1971)**  
 " A linguistic mentalistic theory versus an explanatory stimulus-response learning theory of language development " , in SLOBIN (ed),1971 : 103 - 152 .
- STEVICK, E. (1980)**  
Teaching Languages : A way and Ways, Rowley,Mass.:Newbury House .
- SWAIN, M. (1983)**  
 "Understanding input through output", Paper Presented at The University of Michigan Conference on Applied Linguistics .
- TARONE, E. (1974)**  
 "A discussion of the Dulay and Burt studies " , Working Papers in Bilingualism , 4 : 57-70 .
- TARONE, E. (1980)**  
 "Communication strategies,foreigner talk and repair in interlanguage", Language Learning ,30: 417-431 .
- TARONE, E. (1981)**  
 "Some thoughts on the notion of communication strategy", TESOL Quarterly 15/3 : 285-295 .



- TARONE, E., COHEN, A. and DUMAS, G. (1976)**  
 "A closer look at some interlanguage terminology: A framework for communication strategies", Working Papers on Bilingualism , 9: 76-90 .
- TAYLOR, B.P. (1975)**  
 "The use of overgeneralisation and transfer learning strategies by elementary and intermediate students of ESL ", Language Learning, 25/1 : 73-108 .
- TAYLOR, G. (1984)**  
 "Empirical or intuitive ?. A review of the natural approach: language acquisition in the classroom" , by KRASHEN and TERRELL, in Language Learning 34: 97-105 .
- TUCKER, G., HAMAYAN, E. and GENESEE, F. (1976)**  
 "Affective, cognitive and social factors in second language acquisition", The Canadian Modern Language Review, 32 : 214-226 .
- VARADI, T. (1973)**  
 "Strategy of learner target language communication: Message adjustment", Paper presented at The 6th Conference of the Romanian-English Contrastive Project, May 1973. (Reprinted in IRAL, 1980, 18:59-61.
- WARDAUGH, R. (1970)**  
 "The contrastive analysis hypothesis ", TESOL Quarterly ,4/2:123-130.
- WARDAUGH, R. and BROWN, H.D. (eds) (1976)**  
A Survey of Applied Linguistics, Ann Arbor, University of Michigan Press
- WATSON, J.B. (1924)**  
Behaviorism, Norton: New York (1970).
- WENDEN, A. (1982)**  
The Process of Self-Directed Learning: A study of Adult Language Learner Learners , unpublished doctoral dissertation, Teachers College, Columbia University.
- WENDEN, A. (1983a)**  
 "Literature review: The process of intervention", Language Learning, 33: 103- 121
- WENDEN, A. (1983b)**  
 "Learning training for second language learners: A selected review of content and method", Paper presented at the Annual TESOL Convention March 15-20, Toronto .

- WENDEN, A. (1986a)  
 "What do second language learners know about their language learning?", Applied Linguistics, 7: 186-201.
- WENDEN, A. (1986b)  
 "Helping second language learners think about learning", ELT Journal, 40 : 3-12 .
- WENDEN, A. (1987)  
 "How to be a successful language learner ", in WENDEN and RUBIN (ed), 1987 : 103-118 .
- WENDEN, A. and RUBIN, J. (eds) (1987)  
Learner Strategies in Language Learning , Prentice Hall International.
- WESCHE, M.B. (1979)  
 "Learning behaviours of successful adult students on intensive language training", Canadian Modern Language Journal ,35:415-427 .
- WESSELS, M.G. ( 1982)  
Cognitive Psychology , Harper and Row , Cambridge .
- WHITE, P. (1980)  
 "Limitations on verbal report of internal events", Psychological Review, 87: 105-112 .
- WIERSMA, W. ( 1986)  
Research Methods in Education : An Introduction, Allyn and Bacon Inc.
- WINITZ, H. (ed) (1981)  
Native Language and Foreign Language Acquisition,  
 New York :Academy of Sciences .
- WODE, H. (1980)  
Learning a Second Language : An Integrated View of Language Acquisition, Tübingen : Gunter Narr .
- WUNDT, W. (1904)  
Principles of Physiological Psychology, 5th edition translated by E.B. TITCHNER, New York, MacMillan.( Originally published as Grundzuge der Physiologischen Psychologie,Leipzig : Engelmann )
- YOSHIDA, M. (1975)  
 "The acquisition of English vocabulary by a Japanese-speaking child", in HATCH (ed) 1978 : 91-100.



**ZAMEL, V. (1983)**

"The composing processes of advanced ESL students: Six case studies",  
TESOL Quarterly 17/2 : 165-187

**ZOBL, H. (1983)**

"Markedness and the projection problem", Language Learning  
33:293-313.

**ZOBL, H. (1984)**

"Cross-language generalisations and the contrastive dimension of the  
interlanguage hypothesis ", in DAVIES and CRIPER (ed). 1984 : 78-97

# APPENDICES



- APPENDIX 1 -

Stern's list of Strategies ( 1975 )

1. Planning Strategy: i.e. a personal learning style, or positive learning strategy.
2. Active Strategy: i.e. an active approach to the learning task.
3. Emphatic Strategy: i.e. a tolerant and outgoing approach to the TL and empathy with its speakers.
4. Formal Strategy: i.e. technical know-how of how to tackle language.
5. Experimental Strategy: i.e. a methodological but flexible approach, developing the new language into an ordered system and constantly revising it.
6. Semantic Strategy: i.e. constant searching for meaning.
7. Practice Strategy: i.e. willingness to practice.
8. Communication Strategy: i.e. willingness to use the language in real communication.
9. Monitoring Strategy: i.e. self-monitoring and critical sensitivity to language use.
10. Internalisation Strategy: i.e. developing L2 more and more as a separate reference system and learning to think in it.

- APPENDIX 2 -

Naiman et al.'s list of Strategies ( 1978 )

1. Learners actively involve themselves in the language learning process by identifying and seeking preferred language environments and exploring them .
2. They develop an awareness of language as a system .
3. They develop an awareness of language as a means of communication and interaction .
4. They accept and cope with the affective demands of L2 .
5. They extend and revise the L2 system by inferencing and monitoring .



- APPENDIX 3 -

Rubin classification of Learning Strategies ( 1981 )

(a) Strategies which contribute DIRECTLY to learning :

1. Clarification / Verification
2. Monitoring
3. Memorization
4. Guessing / Inductive Inferencing
5. Deductive reasoning
6. Practice

(b) Strategies which contribute INDIRECTLY to learning :

1. Creating opportunities for practice
2. Production tricks

- APPENDIX 4 -

O' Malley et al. categories ( 1985 )

**(1) Metacognitive Strategies :**

**(a) Planning for learning, which is realised by the following LS:**

- (i) Self-management**
- (ii) Advance preparation**
- (iii) Directed attention**
- (iv) Selective attention**
- (v) Delayed production**
- (vi) Advance organisers**

**(b) Monitoring strategies of comprehension or production while it is taking place**

**(c) Evaluation strategies ( of self and others )**

**(2) Cognitive Strategies :**

- (i) Repetition**
- (ii) Resourcing**
- (iii) Translation**
- (iv) Grouping**
- (v) Note-taking**
- (vi) Deduction**

**(3) Socio-Affective Strategies (such as for instance, cooperation)**



- APPENDIX 5 -

**BALLI's five main areas of investigation**

1. FL aptitude
2. The Difficulty of Language Learning
3. The Nature of Language Learning
4. Learning and Communication Strategies
5. Motivation .

APPENDIX 6

UNIVERSITY OF LEEDS  
DEPARTMENT OF LINGUISTICS  
AND PHONETICS

January, 1989

TEACHERS' QUESTIONNAIRE-



University of Leeds  
Department of Linguistics  
And Phonetics

January, 1989

Dear Colleague,

This Questionnaire is part of a doctoral research project presently being carried out at the University of Leeds, under the supervision of Dr. P. LEACH, and sponsored by the Ministry of Higher Education.

The aim of this research is to investigate the learning strategies which students use when learning English. Although this research is primarily geared towards students, your answers will nevertheless provide us with invaluable information about some of the factors which come into play in the use of these strategies.

Thus, your response to this Questionnaire is critical. The more responses we receive, the better our understanding of the problem will be.

To help you answer frankly and honestly, your name will NOT appear in the Questionnaire. Furthermore, your answers will be held in strictest confidence and will be used for academic purposes exclusively.

If you are interested in, or have any question about this research, I will be very happy to discuss it with you.

Thank you for your co-operation.

Sincerely,

K. KHALDI.

UNIVERSITY OF LEEDS

DEPARTMENT OF LINGUISTICS AND

PHONETICS

1988-1989

-QUESTIONNAIRE-

- 1) Age Group: 20-30..... 30-40.....  
40-50..... 50+.....

- 2) Sex: M F

- 3) Have you taught in a Secondary School?

Yes..... No.....

- 4) If so, for how long? .....

- 5) Were you a student at E.N.S.?

Yes..... No.....

- 6) Degree(s) held and where they were obtained, please?

	Degree(s)	Obtained in
(i)	.....	.....
(ii)	.....	.....
(iii)	.....	.....

- 7) Have you studied abroad for a postgraduate degree?

Yes..... No.....



8) If so, can you say where and for how long?

(i)	.....	for	....Years
(ii)	.....	for	....Years
(iii)	.....	for	....Years

9) Have you attended any short course abroad?

Yes..... No.....

10) If so, please fill the table below:

	Country	Subject	Length of Course
i)	.....	.....	.....
ii)	.....	.....	.....
iii)	.....	.....	.....

11) Have you had any training in educational psychology and pedagogy?

Yes..... No.....

12) What is your main field of study?

.....

13) Are you presently involved in a research project?

Yes..... No.....

14) If so, which one, please?

.....

15) Are you presently registered for a postgraduate degree?

Yes..... No.....

16) If so, say where and in what subject.

(Place)..... (Subject .....

.....

17) Which Year(s) are you presently teaching?

1st.... 2nd.... 3rd.... 4th.... Magister....

18) Have you, in the past, taught the same Year(s)?

Yes.....

No.....

19) If Not, which one(s) did you teach?

1st.... 2nd.... 3rd.... 4th.... Magister....

20) How long have you been teaching at the University?

.....

21) What subject(s) are you presently teaching and in which Year?

Subject(s)	1st	2nd	3rd	4th	Magister
(i).....					
(ii).....					
(iii).....					

22) For how long have you been teaching this/these subject(s)

(i) for ..... years (ii) for .... Years (iii).... years

23) Have you, in the past, taught (anan) subject(s) that the one(s) you have mentioned above?

Yes.....

No.....

24) If so, in which Year (or Where) and for how long? (You may include subjects which you may have taught elsewhere than the English Department. eg. 'Seconde Langue'.)



Subject(s)	1st Yr	2nd	3rd	4th	Elsewhere	For
i)						..... Years
ii)						..... Years
iii)					.	..... Years

25) Do you use either Arabic or French in class?

Often..... Occasionally..... Never.....

26) If so, on what occasion(s) (very briefly)?

.....  
 .....

27) Do (did) you obtain any feedback about your teaching? (either through a questionnaire or a discussion with your students.)

Yes..... No.....

28) If Yes, did it help you make some 'adjustments' to your teaching which you couldn't otherwise have done?

Yes..... No.....

29) If not, do you think that such an enquiry might help in your teaching?

Yes..... No.....

30) Do you give special 'tricks' to your students for remembering the meaning of some difficult words or the way an unusual word should be pronounced?

Often..... Sometimes..... Never.....

31) Do you think that the use of some 'tricks' (eg. mnemonics) either to learn or to remember some items may contribute to learning?

Yes..... No..... Sometimes.....

32) Do you train your students to memorise any (or many) of these items?

(Please circle your answer(s).)

a) words lists

b) irregular verbs

c) pattern sentences

d) part (or whole) of a dialogue

e) any other item not mentioned (please specify).....

.....

f) Not Applicable

33) Do you draw diagrams or use any other technique to show your students how best to remember a plot or characters from a novel or play?

Often..... Sometimes..... Never..... Not applicable.....

34) Do you train your students to make themselves understood when they have difficulty in doing so, by using various devices, such as paraphrase, circumlocution etc.?

Often..... Sometimes..... Never..... Not Applicable.....

35) Do you draw your students' attention on the importance of gestures in a conversation, and how these differ from one country to another?

Often..... Sometimes..... Never..... Not Applicable.....

36) Do you train your students to use dictionaries, a reference grammar, textbooks, etc., when they have to write an essay?

Often..... Sometimes..... Never..... Not Applicable.....

37) Do you train your students to write in different styles? (eg. formal/informal letters, business letters, narrative, descriptive, etc.,)

Yes..... No..... Not Applicable.....



38) Do you give your students hints on developing various reading techniques? (eg. scanning, skimming, intensive reading, etc.)

Yes..... No..... Not Applicable.....

39) Do you train your students to ask for clarification from their interlocutor when they don't understand what he/she says? (eg. ask the speaker to repeat either part of the whole of the utterance they have not understood.)

Yes..... No..... Not Applicable.....

40) When your students are speaking in English, and make mistakes, do you usually? (Please circle your answer.)

a) Correct them immediately.

b) Let them finish and then correct them.

c) It depends (Please say on what.):.....

41) Do you think that allowing students to make mistakes while speaking English helps them to become more fluent?

Yes.....

No.....

42) Do you take the view that it's better for your students not to say/write anything rather than produce erroneous English?

Yes.....

No.....

43) What do you consider to be more important? (Please circle)

a) That your students speak/write very little but in correct English, or

b) Speak/write with mistakes as long as they get their message across.

44) Would you agree with the statement that some students are better at learning English than others?

Yes.....

No.....

45) Why, according to you, is this so? It is because: (You may circle more than one answer.)

a) better students are more motivated than others.

b) better students' attitude for learning English is greater than the others'.

c) better students are more intelligent.

d) better students are more daring.

e) any other reason(s) you would like to suggest?.....

.....

46) How would you categorise better students' attitude in you class?

They are:

Quieter..... More Talkative.....

More enterprising..... Other Suggestion(s).....

.....

47) Are your students interested in? (please circle)

a) having penfriends in Britain.

b) watching TV programmes about the British people and their way of life.

c) Watching films in English.

d) Don't know.

48) Are your students interested in the Art and Literature of Anglo-Saxon countries?

A Lot..... Little..... Very Little..... Don't Know.....

49) Are your students interested in the Art and Literature of English-Speaking Third World countries? (eg. India, West Africa, West Indies, etc.)

A Lot..... Little..... Very Little..... Don't Know.....



50) Do you think that your students worry about finding a job after they have graduated?

Yes..... No..... Don't Know.....

51) Do you think that your students are convinced that with their 'Licence d'Anglais' they will have greater job opportunities than other students from the Arts and Social Sciences?

Yes..... No..... Don't Know.....

52) Do you think that there is a close relationship between speaking English fluently and writing it easily?

Yes..... No.....

53) Do you think that compared to other foreign languages available in the Institute, English is an easy language for your students?

Yes..... No.....

54) What do you think is easier for your students? (Please rank your answers on a 1-4 scale, 1 being easiest, and 4 the most difficult).

a) To read .....

b) To speak .....

c) To understand .....

d) To write .....

55) What do you think is most difficult for your students? (Please circle.)

a) Understanding spoken English.

b) Understanding written English.

56) What do you think is most difficult for your students?

a) Producing written English.

b) Understanding written English.

57) Do you think that 4 years are enough to train adequately a teacher-to-be?

Enough..... Too Long..... Too short.....

58) Do you think that students with a bilingual background (i.e. Arabic and French) are better at learning English than monolingual ones (i.e. Arabic)?

Always..... Occasionally..... There is no difference.....

59) Do you think that your students' native language (i.e. Arabic) interferes with the acquisition of English?

Yes..... No.....

60) Do you think that your students' second language (i.e. French) interferes with the acquisition of English?

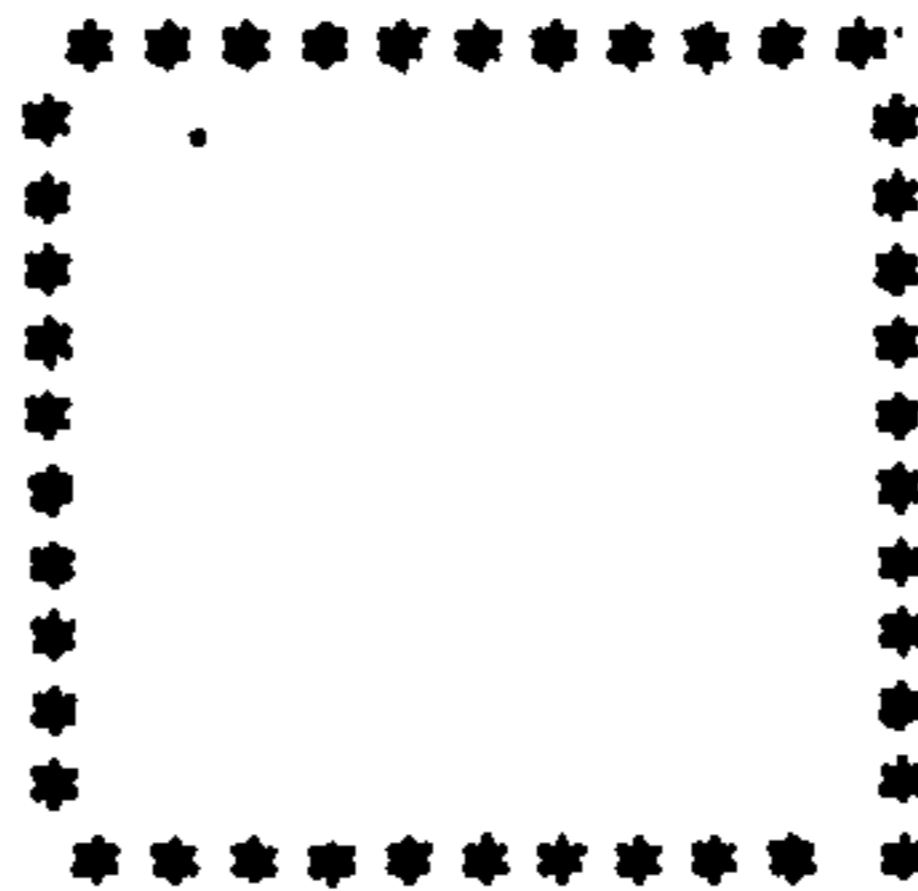
Yes..... No.....



## APPENDIX 7

=====+  
+ / / NIVERSITY OF / / EEDS +  
+ + + + +  
+ / / EPARTMENT OF / / INGUISTICS +  
+ + + + +  
+ / / ND PHONETICS +  
+ + + + +  
=====+

1988 - 1989



PLEASE WRITE YOUR / / NUMBER HERE  
-----

=====+  
+ / / U E S T I O N A I R E +  
+ + + + +  
=====+

( PART I )



- Q U E S T I O N N A I R E -

( PART A )

PLEASE ANSWER THE FOLLOWING QUESTIONS

1) Age : .....

2) Sex : M  F

3) Place (s) of Secondary Education : There is no need to give the name of the school (s) , just mention the name of the town (s) .

(i) .....

(ii) .....

(iii) .....

4) Look at the following table and say which language (s) you read or write very fluently, fairly well, or with difficulty . Put in the appropriate box the language (s) which you think correspond (s) best to your belief .

	READ	WRITE
Very Fluently		
Fairly Well		
With Difficulty		

5) Did you have any choice in Secondary School between English and another foreign language ?

YES  NO

6) Was any of your English teachers a native speaker ?

YES  NO

7) If not, did your teacher speak English in class ?  
(Please tick where appropriate)

All the time  Most of the time  Occasionally

8) Did he/she have resort to translation (either into Arabic or French) ?

Very Often  Occasionally  Never

9) If he/she did, in which activity he/she mostly used it ? (If more than one answer, please rank them on a 1 to 4 scale, 1 being the activity in which translation was most frequently used, and 4 the activity in which it was least used )

READING ( ) LISTENING ( )  
WRITING ( ) SPEAKING ( )

10) Were there any materials in English in your immediate environment ?  
(school library, local bookshop, British Council etc. )

YES  NO

11) If Yes, did you make use of these materials ?

Often  Sometimes  Never

12) Were you encouraged to read outside the classroom ?

Often  Sometimes  Never

13) Did you have the chance ? (in Secondary School) ?

(a) To listen to radio broadcasts in English ?

Often  Sometimes  Never

(b) To watch English films and programmes ?

Often  Sometimes  Never

14) What was the activity your teacher mostly concentrated on in class ?  
(Please rank these activities on a 1-7 scale, 1 being the activity most commonly used, and 7 the least used )



Reading
Writing
Listening
Speaking (oral English)
Vocabulary
Grammar
Pronunciation
Other(s) (Please specify)
.....
.....

15) Did your teacher use the textbook exclusively or did he/she use other additional materials ?

Textbook only

Textbook and Additional materials

16) Were you asked to learn things 'by heart' ?

Very Often

Sometimes

Rarely

Never

17) If Yes, did your teacher give you any of these items to learn by heart?

a) lists of words

b) Parts of (or whole) a dialogue

c) Sentence patterns

d) Irregular verbs

e) Other(s) (Please specify) .....

..... ..1.....

18) Were you encouraged to speak in class ?

Often

Sometimes

Never

19) Did your teacher use any of these exercises and to what extent ?

(Please tick where appropriate )

	* A Lot	* Some	* Little	* Never
* Use of dictionaries (i.e. show you how best to make use of dictionaries )	*	*	*	*
* Use of idioms and idiomatic expressions	*	*	*	*
* Translation exercises (into Arabic or French)	*	*	*	*
* Listening to authentic English on tapes	*	*	*	*
* How to make exposés, activity report, etc.	*	*	*	*

20) Was there in your school or in its immediate environment an 'English Club' or any other gathering place where you could meet and speak English, or read magazines, newspapers etc ?

YES

NO

21) Did your teacher give you any hints (i.e. techniques) on how to read a text quickly to get its general meaning ?

Often

Sometimes

Never



22) Did your teacher give you any special hints on reading and understanding technical instructions (eg how to operate a washing machine, tape recorder etc .) ?

Often  Sometimes  Never

23) Did your teacher give you any hints on how best to take notes during a lecture ?

Often  Sometimes  Never

24) Did your teacher show you how to write different types of letters ? (informal, business etc.)

.YES  NO

25) Did your teacher show you how to write different types of styles ? (narrative, descriptive, technical etc.)

YES  NO

26) Did your teacher show you what to do in case you were involved in a conversation and found yourself unable to understand the speaker ?

YES  NO

27) Did your teacher show you what to do when you couldn't find a word or expression you wanted to use in a conversation ?

YES  NO

28) Did your teacher show you special tricks (techniques) to remember any of the items below ? If 'Yes' ,say which one(s) ,if not , just tick 'No' .

(You may tick more than one answer)

YES  NO

- a) Lists of words ( )
- b) Lists of irregular verbs ( )
- c) Lists of sentence patterns ( )
- d) Parts of (or whole) a dialogue ( )
- e) Other (Please specify ) .....

29) Did your teacher show you what kind of information to concentrate on when you were listening to a (taped) conversation (e.g. stress, intonation, pauses etc . ) ?

YES  NO

30) Did your teacher draw your attention to the importance of gestures in communication ?

YES  NO

31) Did you choose to study English at the University because ?

a) You liked it  or,

b) You had no other alternative

32) What do you intend to do after you have graduated ?

.....

33) How would you presently rate yourself as a learner in relation to other students in your group ?

Excellent  Good  Fair  Poor

34) How would you rate yourself in the different skills ? (Please tick where appropriate )

	Excellent	Good	Fair	Poor
Writing	*	*	*	*
Reading	*	*	*	*
Listening	*	*	*	*
Speaking	*	*	*	*



35 ) What subjects do you like best ? (Please rank them on a 1 - 5 scale ,  
1 being the subject you like best and 5 the subject you like least )

M.B. If a particular subject is not taught in your class, just write  
'Not Applicable' (or NA for short) in the corresponding box .

* Speaking ( Oral English)	*	*
* Writing ( Written English)	*	*
* Scientific study of language ( i.e. Linguistics, Phonetics and Grammar )	*	*
* Literature	*	*
* Civilisation	*	*

36) What aspects of English are most difficult for you ? (Please rank  
on a 1-4 scale, 1 being the most difficult )

* Writing	*	*
* Reading	*	*
* Listening	*	*
* Speaking	*	*

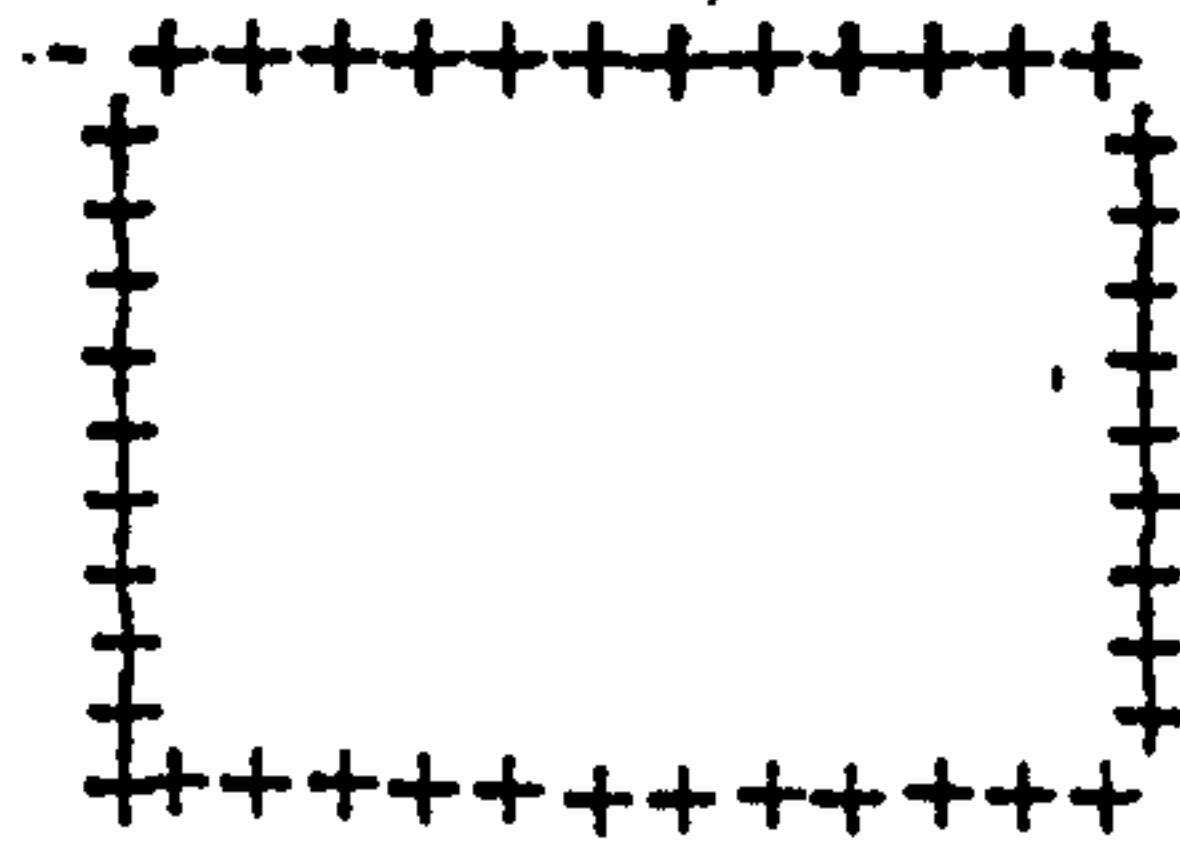
END OF PART I

UNIVERSITY OF LEEDS

DEPARTMENT OF LINGUISTICS

AND PHONETICS

1988-1989



PLEASE WRITE YOUR NUMBER HERE

- QUESTIONNAIRE -

PART II









50) Classify the following languages according to their importance in the everyday life of the 'average' Algerian .(Rank them from 1 to 5 ) (1= the most important)

* Dialectal Arabic	*	*
* Classical Arabic	*	*
* English	*	*
* French	*	*
* Different varieties of Berber	*	*

51) In the acquisition of English what linguistic levels, do you think, are most important to acquire ? (Rank them from 1 to 6 ) (1=the most important)

* Pronunciation of sounds	*	*
* Intonation	*	*
* Syntax	*	*
* Morphology (i.e. the level of words)	*	*
* Discourse (i.e. the level of the whole 'text', be it spoken or written)	*	*

52) In the acquisition of English what, do <sup>you</sup> think are the most important skills to learn ? (Rank them from 1 to 4 ) (1=the most important)

* Reading	*	*
* Writing	*	*
* Listening	*	*
* Speaking	*	*

53) In Reading, what ability do you think, should be most developed ?  
 (Rank them from 1 to 4) ( 1=the most important ability)

* Ability to read general English	*	*
* Ability to read technical English (i.e. English for Science and Technology, or technical instructions in notices )	*	*
* Ability to understand the general meaning of a text	*	*
* Ability to understand every word in a text	*	*

54) In Writing, what ability do you think, should be most developed ?  
 (Rank them from 1 to 5) ( 1 = the most important ability )

* Ability to write general English	*	*
* Ability to write technical English	*	*
* Ability to write business letters	*	*
* Ability to answer tests	*	*
* How to take notes in a lecture	*	*



55) In Listening what ability do you think should be most emphasised ?  
 ( Rank them on a 1 to 4 scale ) ( 1= the most important )

Understanding lectures	*	*
Understanding conversations in noisy conditions	*	*
Understanding films and TV programmes	*	*
Understanding all varieties of English	*	*

56) In Speaking what ability do you think should be most emphasised ?  
 (Rank them on a 1 to 4 scale ) ( 1= the most important )

Speak about a formal topic	*	*
Speak informally (conversation with friends)	*	*
Speak about a technical subject (eg how to operate a tape recorder, or a washing machine )	*	*
Be able to translate	*	*

The next set of questions requires a simple 'Yes' or 'No' answer.

Please tick the appropriate box .

If you have no opinion, please tick the 'Don't know' column .

	YES	NO	DON'T KNOW
57) Do you think YOU have a special ability for learning English	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
58) Knowing English allows me to travel abroad without worrying too much about the language of the country I'm visiting because I know there will always be someone who speaks English	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
59) Knowing English allows me to have penfriends (people you correspond with) anywhere in the world	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
60) With my 'Licence d'Anglais' I'm more likely to find a job than with any other Licence in the Arts and Social Sciences	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
61) Studying English will enable me to better understand and appreciate English-speaking Third World countries Art and Literature	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
62) Studying English will enable me to better understand and appreciate British and American Art and Literature	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
63) Do you find yourself correcting other students' speech mentally to yourself (i.e. in your mind) when they make an error ?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
64) It's alright to guess if you don't know the meaning of a word	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

In the next set of questions you have choice between various alternative answers. Circle the one which you think corresponds best to YOUR opinion .

REMEMBER : There are no right or wrong answers .



- 65) If someone spent one hour a day learning a language, how long would it take them to speak the language very well ?
- a) less than a year
  - b) 1 to 2 years
  - c) 3 to 5 years
  - d) 5 to 10 years
  - e) You can't learn a language in one hour a day
- 66) English is
- a) a difficult language to learn
  - b) a very difficult language
  - c) a language of medium difficulty
  - d) an easy language
  - e) a very easy language
- 67) When you are taught new grammar points would you like to be given the rules
- a) in English
  - b) in Arabic
  - c) in French
  - d) No rule at all, just examples
- 68) When learning new grammar structures (e.g. tenses, voice etc.) which of the following techniques do you use ? (You may choose more than one answer)
- a) repeat them orally to help memorise them
  - b) write them down to help memorise them
  - c) make sentences using them
  - d) study grammar books for more practice
  - e) look them up in the dictionary for further examples
  - f) use them in speech and writing as much as possible
  - g) use another technique ( Please specify) .....
- .....

69) When your teacher introduces (a) new word(s), how do you learn it (them) best ? ( You may choose more than one answer )

- a) make up vocabulary list with explanations in English
- b) " " " " " " " " in Arabic
- c) " " " " " " " " in French
- d) write the words down many times to help memorise them
- e) use the words to make sentences
- f) do substitution drills
- g) repeat the words orally to help memorise them
- h) look them up in the dictionary to check their uses
- i) use them as much as possible in speech and writing
- j) other (Please specify) .....
- .....

70) When the teacher introduces a new word , would you prefer ?

- a) a translation of the word into Arabic (or French)
- b) an explanation of its meaning in English
- c) to discover the meaning by yourself

71) When you make a mistake while speaking do you prefer ?

- a) to be interrupted by the teacher and corrected
- b) you rather finish your answer and then be corrected
- c) just have the mistake pointed out and try to correct it yourself

72) What do you consider to be more important ?

- a) making one's self understood despite the mistakes one may be making , or
- b) limit what you say to what you can actually express in correct English



- 73) When Speaking or Writing in English , do you ?
- a) mentally translate from Arabic into English
  - b) or from French into English
  - c) or from another language(say which .....)  
into English
  - d) Think in English exclusively and then speak(or write)
- 74) When Speaking or Writing , do you ?
- a) Speak (or Write) without worrying too much about mistakes
  - b) Think carefully about what you are going to say(or write)
- 75) When Speaking or Writing do you ?
- a) Try to remember and use some models of English  
you have previously studied
  - b) Speak (or Write) normally,without trying to  
remember particular patterns to use
- 76) When Speaking or Writing ,you suddenly realise that you don't know a  
particular word or expression which would express your idea , do you ?
- a) try to find other words in English which  
express the same idea
  - b) Fill in the blank by using a French word hoping that  
it will have the same meaning
  - c) Carry on speaking (or writing) hoping that the  
listener (or reader) will provide the missing word(s)
  - e) Forget about trying to express this particular idea  
and change to another topic

- 77) When you are Listening or Reading do you ?
- a) automatically translate into Arabic
  - b) " " " " " into French
  - c) " " " " " into another language(.....)
  - d) Think and understand directly in English
  - e) Use both methods
- 78) When Listening or Reading in class you meet a word or expression you do not understand , do you ?
- a) Ask the teacher for help or clarification
  - b) Ask another student for help
  - c) Try to find help from a textbook or dictionary
  - d) Not worry about the problem at all
- 79) When you are involved in a conversation and you don't understand something , do you ? (You may choose more than one answer)
- a) Ask the speaker to repeat what he/she said
  - b) Ask questions about the word(s) or expression(s) you didn't understand
  - c) Ask the speaker to repeat just the word(s) or expression(s) you didn't understand
- 80) When you are participating in pair-work or small group oral activities as compared with the rest of the class, how active are you ?
- a) Very Active
  - b) Active
  - c) Moderately active
  - d) Not very active
  - e) Not at all active

Thank You for Your Cooperation

K. KEALDI



APPENDIX 8

UNIVERSITY OF LEEDS  
DEPARTMENT OF LINGUISTICS  
AND PHONETICS  
1988-1989

STUDENTS  
INTERVIEW

1) Which city do you come from?.....

2) Did you go to the same school during Secondary Education or did you have to change ?

Same            Had to change

3) Are you registered with the E N S ?

Yes            No

4) Do you know any other foreign language ?

Yes (which one ? ..... )            No

5) If No,would you like to learn one ? Which one ?

6) Do you find yourself repeating words and phrases after your teacher ?

1.Often            2.Sometimes    3.Rarely            4.Never

7) When your teacher asks questions in class do you try to answer them mentally to yourself ?

1.Often            2.Sometimes    3.Rarely            4.Never

8) Do you usually volunteer to answer ?

1.Often            2.Sometimes    3.Rarely            4.Never

9) Do you find yourself correcting other students' speech mentally to yourself when they make an error ?

- 1.Often      2.Sometimes   3.Rarely      4.Never

10) How often do you speak to yourself in English either silently or aloud ?

- 1.Often      2.Sometimes   3.Rarely      4.Never

11) How often do you think in English while studying ?

- 1.Often      2.Sometimes   3.Rarely      4.Never

12) How often do you look for chances to watch films or other TV programs in English ?

- 1.Often      2.Sometimes   3.Rarely      4.Never

13) How do you view your participation in pair-work and group Oral activities as compared with the rest of the class ?

- 1.Very Active      2.Active      3.Moderately      4.Not at all

- Active                  Active                  Active

14) Do you have a good memory ?

1. Yes      2. No

15) How often do you memorise dialogues, stories or other reading materials from your readings ?

- 1.Often      2.Sometimes   3.Rarely      4.Never

16) Have you developed some specific techniques to help with memorisation in your learning of English ?

1. Yes      .....(If Yes)

What are they ?



2. No

---

---

---

17) Do you feel embarrassed when the teacher asks you a question in class?

1.Often      2.Sometimes    3.Rarely      4.Never

18) Do you usually ask questions in class ?

1.Often      2.Sometimes    3.Rarely      4.Never

19) Do you answer questions that are asked of the entire class if you think you know the answer ?

1.Often      2.Sometimes    3.Rarely      4.Never

20) Do you like to figure out the language on your own, or would you rather have the teacher tell you the rules ?

1. On your own      2. The teacher

21) At the EARLY stage of your English learning in Secondary School did you prefer to be : ?

a) Always firmly guided by the teacher

b) Mainly guided by the teacher

c) Partly guided by the teacher and partly left to your own devices

d) Mainly left to your own devices

22) What about the other stages ?

---

iv

a

b

c

d

---

1. Intermediate

---

2. Advanced

---

23) Do you practice pronouncing words and sounds that you know you have trouble with ?

1. Yes ..... (If Yes)

---

2. No

---

Where ?

---

How often?

---

With whom ?

---



24) When you meet a difficult word which you do not know how to pronounce, what do you usually do ?

- a) Try to guess
- b) Try to remember and apply pronunciation rules you have learned during Phonetics classes
- c) Ask another fellow student
- d) Look it up in the dictionary
- e) Do something else ? What ? .....

25) Can you say that you have developed any language study habits (or techniques) in learning the 'sound system' of English ? (eg reading aloud to yourself in front of a mirror, repeating words silently to yourself, etc. )

1. Yes ..... (If Yes)

---

2.

What are they ?

---

---

---

26) (a) (for First-Year Students )

Do you know the meaning of 'staggered' as it appears in the following sentence ?

'The boxer staggered' and almost fell when his opponent hit him'

**(b) (for Fourth-Year Students)**

Do you the meaning of 'setbacks' as it appears in the sentence

**' At first everything went well with the project but recently  
wed have had a number of 'setbacks' with the machines '**

Tell me the steps you go through in guessing its meaning :

---

---

**27) When your teacher introduces a new word how do you learn it best ?**

- a) By associating it with its Arabic equivalent**
- b) " " " " " " French equivalent**
- c) By writing the word many times to help memorising it**
- d) By using the word in various sentences**
- e) You do something else ?**

---



**28) Can you say that you have developed any language study habits (ie techniques) in learning the meaning of new words ? (eg by constant repetition,by translating them into Arabic or French,by fixing a certain number of words to learn each day, etc )**

**1. Yes..... (If Yes)**

**2. No**

**What are they?**

---

---

---

---

---

---

---

**29) When your teacher introduces (a) new grammatical structure(s) (eg tenses,voice,sentence patterns etc.),how best do you learn them?**

- a) Do you learn them as grammatical formulas ( eg N V N ADV)**
- b) Do you learn them as verbal rules (eg 'Put the adverb after the object')**
- c) or,as examples (eg 'I like jazz very much')**
- d) Do you study them further in grammar books**
- e) Do somethimhg else (specify) :**

---

30) Can you say that you have developed any language study habits (ie techniques)in learning Grammar ? (eg memorising rules through rhymes,formimg guesses about regularities and rules and applying them etc.)

1.Yes ..... (If Yes)

---

2.No

What are they?

---

Do you for example:- repeat the rules orally to memorise them

- write them many times in order to

memorise them

- make many sentences using them

---

---

31) How often do you speak English with your teacher after class ?

1.Often      2.Sometimes   3.Rarely      4.Never

32) In a conversation if a person falters,can you fill in the needed words ?

1.Often      2.Sometimes   3.Rarely      4.Never

33) Do you try to mimic unfamiliar sounds that you hear ?

1.Often      2.Sometimes   3.Rarely      4.Never

34) Do you often use gestures and mimes to get your message across ?

1.Often      2.Sometimes   3.Rarely      4.Never



**35) In a conversation can you guess what the person will say next ?**

- 1.Often      2.Sometimes   3.Rarely      4.Never**

**36) Which is more important to you**

**a) To communicate your ideas even though you know you may be making grammar mistakes in the process ,or**

**b) To speak the language without making mistakes even if this means you can't say exactly what you want to**

**37) If you are talking to someone and you don't remember the exact word you need,what do you do ?**

**a) Use a French word and pronounce it in an English way**

**b) Try to describe it**

**c) Try to paraphrase**

**d) Try to use gestures**

**e) Try to elicit it from your interlocutor**

**f) Do something else**

---

**38) If you are in a conversation in English, do you ?**

**a) Mostly listen**

**b) Talk about as much as the others**

**c) Talk more than anyone else**

---

39) Imagine you have to give an oral presentation (exposQ) in class (eg a book report, or about a particular topic) and afterwards the class asks questions. Do you ?

- a) Write it out and then read it to the class ?
- b) Write out notes and invent the exposQ from the notes?
- c) Come with ideas in your mind and elaborate from there ?
- d) Any other suggestion ? .....

40) Can you say that you have developed any language study habits (techniques) in learning to talk ? (eg through contact with other students, by imagining dialogues in your mind, by talking to yourself, listening to authentic tapes, radio plays, etc.)

1. Yes..... (If Yes)

---

2. No

---

What are they ?

---

41) How often do you listen to radio or tape recordings primarily to improve your pronunciation and intonation ?

- 1.Often      2.Sometimes    3.Rarely      4.Never

42) How often do you repeat a tape recording while listening to it ?

- 1.Often      2.Sometimes    3.Rarely      4.Never



43) How often do you listen to English radio programs or tape recordings in order to improve your listening comprehension ability ?

- 1.Often      2.Sometimes   3.Rarely      4.Never

44) When listening to your teachers,do you pay attention to the ways they express themselves (eg use of idiomatic or colloquial expressions, stress, intonation, etc. ) and try to use them in your own practice ?

- 1.Often      2.Sometimes   3.Rarely      4.Never

45) When someone is talking to you, what do you pay attention to that helps you to understand what that person is saying ?

- a) Stress
- b) Intonation
- c) Gestures
- d) Face
- e) Other ? .....

46) When someone is talking very rapidly to you, what do you do to try to understand what that person is saying ?

- a) Look at his/her gestures
- b) Look at his/her face
- c) Pay attention to the stress
- d) Pay attention to the intonation
- e) Concentrate on principal nouns and verbs and guess the rest
- f) Other : ? .....

47) Imagine that you are at a party. You are talking to some friends and one of them tells a joke. You don't understand the joke. What would you do to understand this joke ?

- a) Ask the speaker to repeat it
- b) Ask for its meaning
- c) Think about the way it was told
- d) Ask someone else to explain it to you
- e) Ignore it
- f) Do something else : .....

48) Your teacher talks for about 15 to 20 minutes about the early history of England. You are expected to understand, gain the main ideas, then answer questions :

a) What do you do that helps you understand the teacher ?

---

b) What do you do to remember the main ideas and details ?

---

c) What do you do that helps you answer questions

---

49) A Professor is giving a lecture on a topic you are familiar with. However, he keeps contrasting two words you don't know. You can tell that they are important in his lecture because you hear them so often. What would you do to find out the meaning of these two terms?

- a) Ask a fellow student to explain them to you
- b) Remember the words and try to look them up later in dictionary



- c) Pay attention to the context in which they are used
  - d) You just give up paying attention to the lecture
  - e) Do something else :
- 

50) Can you say that you have developed any language study habits for developing listening comprehension ? (eg listening to records, to the radio, using the pause button in a tape recorder etc.)

1. Yes.....(If Yes)

---

2. No

---

What are they ?

---

51) How often do you practice reading aloud to improve your pronunciation and intonation ?

- 1.Often      2.Sometimes    3.Rarely      4.Never

52) How often do you read newspapers, magazines, books etc. primarily in order to learn new words and structures ?

- 1.Often      2.Sometimes    3.Rarely      4.Never

53) How often do you read newspapers, magazines, books etc. primarily to improve your reading comprehension ?

- 1.Often      2.Sometimes    3.Rarely      4.Never

54) How often do you read magazines or books on your own (without having been asked by your teacher) ?

- 1.Often
- 2.Sometimes
- 3.Rarely
- 4.Never

55) When you are reading a text and you come across a word you don't understand what do you usually do ?

- a) Try and guess its meaning from clues in the sentence
- b) Try and find its equivalent in Arabic
- c) " " " " " " " " French
- d) Ignore it
- e) Do something else : ..... ..

56)

(see Text I for Fourth-Year students) ,

(See text II for First-Year students)

57) Can you say that you have developed any language study habits (i.e. techniques) in learning to read ? (eg by reading newspapers, or books on your own etc.)

1. Yes..... (If Yes)

---

2. No

What are they?

---

---



**-Do You keep a notebook for \*Vocabulary ? How ?**

**\*Idioms? How ?**

**-Do you underline all the words in a text that you don't understand and then look them up in a dictionary**

**-Guess the meaning and then come back to it if it doesn't make sense in the context**

**Any other suggestion ? .....**

**58) Do you have penfriends with whom you can correspond so that you practice your written English ?**

- 1. Yes
- 2.No

**59) Do you keep track of the errors you make ?**

- 1. Yes..... (If Yes)

---

2. No

What are they?

---

How ?

---

**60) When you are writing an essay,what do you pay attention most ?**

**( Please rank)**

- a) Grammar

- b) Vocabulary**
  - c) Organisation**
  - d) Content**
  - e) Other ?**
- 

**61) When you are writing an essay, you suddenly realise you can't find the word which expresses your idea. What do you do ?**

- a) Leave it blank and come back to it later**
  - b) Rewrite the sentence so that you avoid the use of this particular word**
  - c) Write its French equivalent hoping that it'll be correct**
  - d) Do something else :**
- 

**62) If your teacher points out to you that you have been making the same mistakes in composition many times, what would you do about your teacher's remarks ?**

- a) Make an effort not to repeat this mistake. (How ? .....**
- 

- b) Pay particular attention to that particular point**
- c) Avoid this particular point in the future**
- d) Revise each sentence you have written to make sure this particular point has been checked**
- e) Write a whole paragraph first, and then come back to revise it**



**f) Write the whole essay, and only then revise it for that particular point**

**g) Do you revise what you have written at all ?**

**63) How do you feel about making mistakes in English when writing a composition? (frustrated, embarrassed angry etc.)**

---

64) When your essay has been marked and returned to you, what do you do with it?

- a) Read it for the comments
- b) Rewrite it for yourself
- c) Rewrite it to submit it to your teacher
- d) Put it aside
- e) Do something else : .....

65) Can you say that you have developed any language study habits (i.e. techniques) to express yourself in written form ?

1. Yes..... (If Yes)

---

2. No

What are they?

---

Do you use: -Reference books (Grammar, model letter etc)

-A dictionary (for pronunciation grammatical indications etc.)

-A Grammar (for morphology, eg ending, for syntax, eg word order)

Any other suggestion ? .....

\* THANK YOU FOR YOUR COOPERATION \*



TEXT I (For Fourth-Year Students)<sup>1</sup>

CHOOSE THE CORRECT ANSWER - ONLY ONE ANSWER IS CORRECT

**Asking a Next-Door Neighbour for Help**

Excuse Mrs Jones, would you mind.....(1) me a favour ? I ..... (2) shopping . But as soon as I shut my front door I realised I had left my key in the house . So when I ..... (3) back I .....(4) get in. It was very silly of me . I .....(5) at all the groceries ..... (6) I only wanted some mustard. ....(7) come in and climb over the fence into my back garden ? That's very kind of you, I wish I ..... (8) give you so much trouble .

(1) a) making b) doing c) to make d) to do

(2) a) have just been b) have just gone c) would just go  
d) was just going

(3) a) get b) am getting c) shall get d) will get

(4) a) can't b) will no be able to c) have no been able to d) couldn't

(5) a) needn't have come out b) didn't need to come out  
c) mustn't have come out d) hadn't to come out

(6) a) have already been delivered b) already have been delivered  
c) are delivered already being d) already are being delivered

(7) a) Shall I b) Will I c) May I d) Do you want me

(8) a) don't have to b) haven't to c) hadn't to d) didn't have to

---

<sup>1</sup> Text I and II from FOWLER, W.S. and COE, N.  
English Language Tests, Book 3 Advanced, London: Nelson  
(1981)

TEXT TWO (First- Year Students)

CHOOSE THE CORRECT ANSWER . ONLY ONE ANSER IS CORRECT

1) He ..... out of the window for a moment and then went on working.

- (a) glanced (b) viewed (c) glimpsed (d) regarded

2) It's the ..... in this country to go out and pick flowers on the first day of spring .

- (a) use (b) custom (c) habit (d) normal

3) He made a swift ..... from his illness

- (a) repair (b) survival (c) relief (d) recovery

4) Our main concern is to raise the voters' ..... of living

- (a) standard (b) capacity (c) degree (d) conditions

5) New problems are always ..... in the factory

- (a) raising (b) going up (c) waking up (d) coming up



## APPENDIX 9

Example of the summary sheet used for reporting the Teachers' answers

		Teacher Number					
Question Number		1	2	3	4	5	6.....39
1	20-30						
	30-40						
	40-50						
	50 +						
2.	M						
	F						
3.	Yes						
	No						
4.							
5.	Yes						
	No						
	Degrees (i)						
	(ii)						
6.	Obtained in (i)						
	(ii)						
	(iii)						
7.	Yes						
	No						
8.	Country (i)						
	(ii)						
	(iii)						

## APPENDIX 10

Example of the summary sheet used for reporting the Students' answers

		Student Number					
Question Number		1	2	3	4	5	6.....
1.							
2.	M F						
3.	(i) (ii) (iii)						
4.	READ Very F. Fairly W. With Dif. WRITE Very F. Fairly W. With Dif.						
5.	Yes No						
6.	Yes No						
7.	A.T. M.T. Occ. Very O.						
8.	Occ. Never.						



APPENDIX 11

INTERVIEW GUIDE

Date:.....

Student Number:.....

---

L1 (6)	1	2	3	4
-----------	---	---	---	---

---

L2 (7)	1	2	3	4
-----------	---	---	---	---

---

L3 (8)	1	2	3	4
-----------	---	---	---	---

---

L4 (9)	1	2	3	4
-----------	---	---	---	---

---

L5 (10)	1	2	3	4
------------	---	---	---	---

---

L6 (11)	1	2	3	4
------------	---	---	---	---

---

L7 (12)	1	2	3	4
------------	---	---	---	---

---

L8 (13)	1	2	3	4
------------	---	---	---	---

---

L9 (14)	1	2		
------------	---	---	--	--

---

---

L10	1	2	3	4
(15)				

---

L11	1	2
(16)		

---

L12	1	2	3	4
(17)				

---

L13	1	2	3	4
(18)				

---

L14	1	2	3	4
(19)				

---

L15	1	2
(20)		

---

L16	a	b	c	d
(21)				

---

L17	1. a	b	c	d
(22)	2. a	b	c	d

---

L18	1	2
(23)		

---

L19	a	b	c	d	e	f
(24)						

---



---

L20	1	2
-----	---	---

(25)

---

L21
-----

(26)

---

L22	a	b	c	d	e
-----	---	---	---	---	---

(27)

---

L23	1	2a	b	c	d	e
-----	---	----	---	---	---	---

(28)

---

L24	a	b	c	e
-----	---	---	---	---

(29)

---

L25	1	2a	b	c	d	e
-----	---	----	---	---	---	---

(30)

---

S1	1	2	3	4
----	---	---	---	---

(31)

---

S2	1	2	3	4
----	---	---	---	---

(32)

---

S3	1	2	3	4
----	---	---	---	---

(33)

---

S4	1	2	3	4
----	---	---	---	---

(34)

---

---

S5	1	2	.	3	4
----	---	---	---	---	---

(35)

---

S6	a	b
----	---	---

(36)

---

S7	a	b	c	d	e	f
----	---	---	---	---	---	---

(37)

---

S8	a	b	c
----	---	---	---

(38)

---

S9	a	b	c	d
----	---	---	---	---

(39)

---

S10	1	2
-----	---	---

(40)

---

LC1	1	2	3	4
-----	---	---	---	---

(41)

---

LC2	1	2	3	4
-----	---	---	---	---

(42)

---

LC3	1	2	3	4
-----	---	---	---	---

(43)

---

LC4	1	2	3	4
-----	---	---	---	---

(44)

---



---

LC5	a	b	c	d	e
(45)					

---

LC6	a	b	c	d	e	f
(46)						

---

LC7	a	b	c	d	e	f
(47)						

---

LC8	a					
(48)	b					
	c					

---

LC9	a	b	c	e		
(49)						

---

LC10	1		2			
(50)						

---

R1	1		2		3		4
(51)							

---

R2	1		2		3		4
(52)							

---

R3	1		2		3		4
(53)							

---

R4	1		2		3		4
(54)							

---

R5	a	b	c	d	e	f
(55)						

---

---

R6

(56)

---

R8

1

(57)

2

a

b

c

d

e

---

W1

1

2

(58)

---

W2

1

1

2

(59)

---

W3

a

b

c

d

e

(60)

---

W4

a

b

c

d

(61)

---

W5

a

b

c

d

e

f

g

(62)

---

W6

(63)

---

W7

a

b

c

d

e

(64)

---

W8

1

(65)

2

a

b

c

d

e

---



APPENDIX 12

Percentage Table for Teachers

Number of Teachers	%	Number of Teachers	%
1	2%	21	53%
2	5%	22	56%
3	8%	23	58%
4	10%	24	61%
5	12%	25	64%
6	15%	26	66%
7	17%	27	69%
8	20%	28	71%
9	23%	29	74%
10	25%	30	76%
11	28%	31	79%
12	30%	32	82%
13	33%	33	84%
14	35%	34	87%
15	38%	35	89%
16	41%	36	92%
17	43%	37	94%
18	46%	38	97%
19	48%	39	100%
20	51%		

APPENDIX 13

Question 1

Age	N
20 - 30	4
30 - 40	20
40 - 50	10
50 <sup>+</sup>	5

Table 1

Question2

M	F
14	25

Table 2

Question 3

Yes	No
6	33

Table 3



APPENDIX 14

Question 4

X = 5 years
-------------

Table 4

Question 5

Yes	No
10	29

Table 5

Question 6a

B.A.	MAGISTER	Ph.d
8	25	6

Table 6

Question 6b


PLACE		
ALGIERS	GB (24)	GB (5)
	FRANCE (1)	US (1)

Table 7

APPENDIX 15

Question 7

Yes	No
31	8

Table 8

Question 8

(i)	GB (29)
(ii)	US (1)
(iii)	FRANCE (1)

Table 9

Question 9

Yes	No
37	2

Table 10

Question 10

(i)	GB (35)
(ii)	US (2)

Table 11



APPENDIX 16

Question 11

Yes	No
8	31

Table 12

Questions 12 and 21

SUBJECT	N	Distrubution in each year			
		1st	2nd	3rd	4th
Writing	7	8	4	3	
Oral/Listening	8	2	2		
Linguistics	9	1	1	2	3
Phonetics	4	1			
English Literature	3		1	2	1
American Literature	2			1	1
African Literature	2		1	1	
British Civilisation	2		1	1	1
American Civilisation	2			1	

Table 13

APPENDIX 17

Question 13

Yes	No
15	24

Table 14

Question 14

Magister Students	6
Applied Linguistics	2
Literature	5
Writing a Book	2

Table 15

Question 15

Yes	No
4	35

Table 16



APPENDIX 18

Question 16

Place	Degree	N
France	Doctorate	4

Table 17

Question 17

Year	N
1st	12
2nd	10
3rd	11
4th	6

Table 18

Question 18

Yes	No
31	8

Table 19

APPENDIX 19

Question 19

Year	N	Originally In
1st	3	2nd
2nd	4	1st
3rd	1	2nd
4th	-	-

Table 20

Question 20 & 22

N. Years of Exp.	Number of Teachers
0 - 5	5
5 - 10	19
10 - 20	10
20 <sup>+</sup>	5

Table 21

Questions 23 & 24

Yes	No
4	35
(ESP)	

Table 22



APPENDIX 20

Question 25

Often	Occasionally	Never
0	27	12

Table 23

Question 26

Lexical Items	20
Reading	2
Technical Terms	5

Table 24

Question 27

Yes	No
2	37

Table 25

Question 28

Yes	No
2	-

Table 26

APPENDIX 21

Question 29

Yes	No	Don't Know
-	5	32

Table 27

Question 30

Often	Sometimes	Never
0	10	29

Table 28

Question 31

Yes	No	Sometimes	Don't Know
15	-	10	14

Table 29

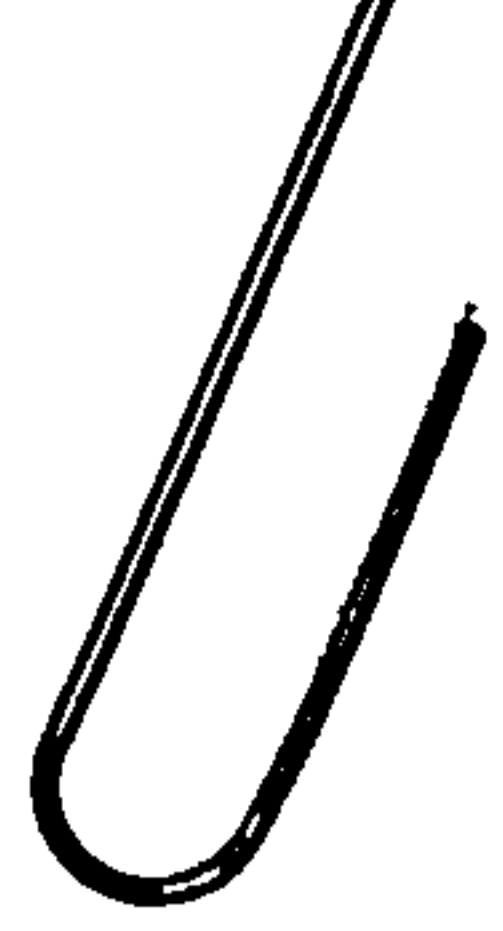
Question 32

Word Lists	Irregular Verbs	Pattern Sentences	Part (whole) of a dialogue
2	6	2	2

Table 30



APPENDIX 22



Question 33

Often	Sometimes	Never	N/A
0	5	2	32

Table 31

Question 34

Often	Sometimes	Never	N/A
6	8	7	18

Table 32

Question 35

Often	Sometimes	Never	N/A
0	5	12	22

Table 33

Question 36

Often	Sometimes	Never	N/A
0	9	6	24

Table 34

APPENDIX 23

Question 37

Yes	No	N/A
12	6	21

Table 35

Question 38

Yes	No	N/A
11	2	26

Table 36

Question 39

Yes	No	N/A
10	5	24

Table 37

Question 40

Correct them	Let them finish
16	23

Table 38



APPENDIX 24

Question 41

Yes	No
9	30

Table 39

Question 42

Yes	No
36	3

Table 40

Question 43

a	b
34	5

Table 41

APPENDIX 25

Question 44

Yes	No
39	-

Table 42

Question 45

a	28
b	6
c	2
d	-
e	-

Table 43

Question 46

Quieter	More Enterprising	More Talkative
-	6	24

Table 44



APPENDIX 26

Question 47

a	32
b	38
c	38
d	-

Table 45

Question 48

A Lot	Little	Very Little	Don't know
32	7	--	-

Table 46

Question 49

A Lot	Little	Very Little	Don't know
-	20	14	5

Table 47

Question 50

Yes	No	Don't Know
3	3	28

Table 48

APPENDIX 27

Question 51

Yes	No	Don't Know
25	2	12

Table 49

Question 52

Yes	No
8	31

Table 50

Question 53

Yes	No
24	15

Table 51

Question 54

Skill	Order of Difficulty	N
Read	3	35
Speak	2	36
Understand	1	36
Write	4	34

Table 52



APPENDIX 28

Question 55

a	5
b	34

Table 53

Question 56

a	35
b	4

Table 54

Question 57

Enough	Too Long	Too Short
31	6	2

Table 55

Question 58

Always	Occasionally	No difference
2	28	9

Table 56

APPENDIX 29

Question 59

Often	Sometimes	Never
8	31	-

Table 57

Question 60

Often	Sometimes	Never
12	27	-

Table 58



APPENDIX 30

Percentage Table for Fourth-Year Students			
Number of Students	%	Number of Students	%
1	1%	41	57%
2	3%	42	58%
3	4%	43	60%
4	5%	44	61%
5	7%	45	62%
6	8%	46	64%
7	10%	47	65%
8	11%	48	66%
9	12%	49	68%
10	14%	50	69%
11	15%	51	71%
12	16%	52	72%
13	18%	53	73%
14	19%	54	75%
15	21%	55	76%
16	22%	56	78%
17	23%	57	79%
18	25%	58	80%
19	27%	59	82%
20	28%	60	83%
21	29%	61	85%
22	30%	62	86%
23	32%	63	87%
24	33%	64	89%
25	35%	65	90%
26	36%	66	91%
27	37%	67	93%
28	39%	68	94%
29	40%	69	96%
30	42%	70	97%
31	43%	71	99%
32	44%	72	100%
33	46%		
34	47%		
35	48%		
36	50%		
37	51%		
38	53%		
39	54%		
40	55%		

APPENDIX 31

Question 1

Average	1st Year	21
Age	4th Year	24

Table 1

Question 2

	M	F
1st Year	29	66
4th Year	17	55

Table 2

Question 3

	Same Place
1st Year	96
4th Year	70

Table 3



APPENDIX 32

Question 4

		Read			Write		
		French	Arabic	English	French	Arabic	English
Very Fluently	1st yr	65	47	-	60	47	-
	4th yr	46	32	-	46	30	-
Fairly Well	1st yr	-	-	-	-	-	-
	4th yr	-	-	-	-	-	-
With Difficulty	1st yr	4	23	-	4	22	-
	4th	1	16	-	7	23	-

Table 4

Question 5

	Yes	No
	1st Year	21
4th Year	14	81

Table 5

Question 6

	Yes	No
	1st Year	17
4th Year	14	58

Table 6

APPENDIX 33

Question 7

	All the time	Most of the time	Occasionally
1st Year	15	80	1
4th Year	16	51	5

Table 7

Question 8

	Very Often	Occasionally	Never
1st Year	22	63	4
4th Year	15	49	8

Table 8

Question 9

	Reading	Speaking	Writing
1st Year	25	59	-
4th Year	12	44	-

Table 9

APPENDIX 34

Question 10

	Yes	No
1st Year	41	56
4th Year	34	38

Table 10

Question 11

	Often	Sometimes	Never
1st Year	15	25	59
4th Year	10	24	38

Table 11

Question 12

	Often	Sometimes	Never
1st Year	38	44	15
4th Year	25	32	12

Table 12



APPENDIX 35

Question 13

		Often	Sometimes	Never
1st Year	a	9	44	46
	b	3	32	63
4th Year	a	4	32	36
	b	1	21	51

Table 13

Question 14

	1st Year	4th Year
Reading	3	3
Writing	4	4
Listening	2	2
Speaking	1	1
Vocabulary	6	6
Grammar	5	5
Pronunciation	7	7

Table 14

Question 15

	Text book only	Text book & other materials
1st Year	55	44
4th Year	39	22

Table 15

APPENDIX 36

Question 16

	Very Often	Sometimes	Occasionally	Never
1st Year	16	44	31	7
4th Year	14	37	14	7

Table 16

Question 17

	a	b	c	d	e
1st Year	41	22	30	90	10
4th Year	25	32	4	65	12

Table 17

Question 18

	Often	Sometimes	Never
1st Year	54	34	9
4th Year	36	30	3

Table 18

APPENDIX 37

Question 19

		A Lot	Some	Little	Never
(a)	1st Year	-	1	11	79
	4th Year	-	-	7	48
(b)	1st Year	14	35	10	-
	4th Year	10	29	8	-
(c)	1st Year	-	-	-	-
	4th Year	-	-	-	-
(d)	1st Year	-	14	10	54
	4th Year	-	6	14	36
(e)	1st Year	-	-	-	-
	4th Year	-	-	-	-

Table 19

Question 20

	Yes	No
1st Year	9	90
4th Year	7	65

Table 20



APPENDIX 38

Question 21

	Often	Sometimes	Never
1st Year	17	40	41
4th Year	5	32	34

Table 5.21

Question 22

	Often	Sometimes	Never
1st Year	3	30	69
4th Year	5	18	49

Table 5.22

Question 23

	Often	Sometimes	Never
1st Year	6	43	50
4th Year	5	26	40

Table 5.23

APPENDIX 39

Question 24

	Yes	No
1st Year	56	43
4th Year	36	35

Table 5.24

Question 25

	Yes	No
1st Year	44	55
4th Year	33	39

Table 5.25

Question 26

	Yes	No
1st Year	24	74
4th Year	15	57

Table 5.26

Question 27

	Yes	No
1st Year	34	64
4th Year	26	46

Table 5.27

APPENDIX 40

Question 28

	Yes	No
1st Year	33	66
4th Year	32	45

Table 28

Question 29

	Yes	No
1st Year	32	67
4th Year	14	57

Table 29

Question 30

	Yes	No
1st Year	46	53
4th Year	29	44

Table 30



APPENDIX 41

Question 31

	Liked it	No choice
1st Year	82	17
4th Year	55	13

Table 31

Question 32

	Teaching	Post graduate	Others	Don't know
1st year	60	20	4	15
4th year	46	15	5	8

Table 32

Question 33

	Excellent	Good	Fair	Poor
1st Year	1	19	65	13
4th Year	1	17	52	-

Table 33

APPENDIX 42

Question 34

	Excellent	Good	Fair	Poor
Writing	1	21	63	14
1st YEAR Reading	4	49	40	4
Listening	8	29	42	20
Speaking	4	19	56	19

Table 34

		Excellent	Good	Fair	Poor
	Writing	2	23	43	7
4th YEAR	Reading	6	46	19	-
	Listening	5	27	37	2
	Speaking	2	17	39	13

Table 35

APPENDIX 43

Question 35

		1	2	3
1st Year	Oral	51	28	18
	Writing	26	50	22
	Ling./Gramm	21	18	57

Table 36

		1	2	3	4	5
	Oral	27	14	11	7	7
	Writing	4	13	25	22	14
4th Year	Ling./Gramm	9	9	7	16	27
	Literature	16	7	20	9	5
	Civilisation	12	24	13	14	4

Table 37



APPENDIX 44

Question 36

1st Year		1	2	3	4
	Writing	42	13	17	27
	Reading	6	17	35	41
	Listening	20	39	27	13
	Speaking	31	29	20	18

Table 38

4th Year		1	2	3	4
	Writing	30	11	14	11
	Reading	1	9	18	39
	Listening	15	32	13	6
	Speaking	21	15	21	11

Table 39

APPENDIX 45

Question 37

	1	2	3	4	5
1st Year	18	64	6	7	3
4th Year	22	35	5	2	3

Table 40

Question 38

	1	2	3	4	5
1st Year	18	32	28	10	11
4th Year	14	20	25	14	8

Table 41

Question 39

	1	2	3	4	5
1st Year	24	38	20	10	7
4th Year	23	32	10	3	4

Table 42

APPENDIX 46

Question 40

	1	2	3	4	5
1st Year	30	51	8	6	4
4th Year	18	39	10	3	2

Table 43

Question 41

	1	2	3	4	5
1st Year	20	28	25	21	6
4th Year	12	28	6	15	2

Table 44

Question 57

	Yes	No	Don't Know
1st Year	37	17	34
4th Year	24	14	18

Table 45



APPENDIX 47

Question 58

	Yes	No	Don't Know
1st Year	86	9	3
4th Year	55	5	3

Table 46

Question 59

	Yes	No	Don't Know
1st Year	81	11	6
4th Year	52	6	7

Table 47

Question 60

	Yes	No	Don't Know
1st Year	48	25	25
4th Year	27	26	13

Table 48

Question 61

	Yes	No	Don't Know
1st Year	53	21	23
4th Year	38	9	17

Table 49

APPENDIX 48

Question 62

	Yes	No	Don't know
1st Year	87	3	8
4th Year	47	11	6

Table 50

Question 45

	1	2	3	4	5
1st Year	4	27	22	38	8
4th Year	2	13	8	33	10

Table 51

Question 65

	a	b	c	d	e
1st Year	-	18	36	21	24
4th Year	-	10	24	8	22

Table 52

Question 66

	a	b	c	d	e
1st Year	20	4	65	10	-
4th Year	16	7	35	14	-

Table 53

APPENDIX 49

Question 42

	1	2	3	4	5
1st Year	60	33	2	-	3
4th Year	48	17	-	-	1

Table 54

Question 43

	1	2	3	4	5
1st Year	28	52	10	4	4
4th Year	21	29	8	6	2

Table 55

Question 44

	1	2	3	4	5
1st Year	29	30	14	16	-
4th Year	25	13	11	10	3

Table 56



APPENDIX 50

Question 46

	1	2	3	4	5
1st Year	65	31	1	-	-
4th Year	29	33	2	-	-

Table 57

		1	2	3	4	5
Dialect Arabic	1st Yr	66	24	2	3	5
	4th Yr	56	3	2	2	2
Classical Arabic	1st Yr	11	18	18	39	9
	4th Yr	3	12	8	34	6
English	1st Yr	1	4	9	27	49
	4th Yr	1	1	3	14	41
French	1st Yr	10	33	39	10	3
	4th Yr	3	24	29	7	1
Berber	1st Yr	10	17	27	12	30
	4th Yr	3	9	10	3	18

Table 58

APPENDIX 51

Question 51

		1	2	3	4	5
Pronunciation/ Sounds	1st	30	25	16	19	2
	4th	-	-	-	-	-
Intonation	1st	5	12	8	18	19
	4th	-	-	-	-	-
Syntax	1st	17	16	16	13	2
	4th	-	-	-	-	-
Morphology	1st	6	9	12	13	22
	4th	-	-	-	-	-
Discourse	1st	14	10	12	11	18
	4th	14	10	-	-	-

Table 59

APPENDIX 52

Question 52

		1	2	3	4
Reading	1st	22	14	32	30
	4th	8	16	24	19
Writing	1st	16	27	25	30
	4th	10	20	25	17
Listening	1st	21	24	24	27
	4th	20	10	30	12
Speaking	1st	36	34	19	9
	4th	25	25	10	5

Table 60

Question 53

		1	2	3	4
General English	1st	29	36	28	5
	4th	22	12	30	6
Technical English	1st	1	4	30	62
	4th	27	7	20	11
General Meaning	1st	55	30	9	3
	4th	24	26	10	12
Every Word	1st	13	26	30	29
	4th	2	32	2	28

Table 61



APPENDIX 53

Question 54

		1	2	3	4	5
General English	1st	56	20	16	3	4
	4th	44	10	7	3	-
Technical English	1st	2	5	24	40	28
	4th	-	4	8	34	29
Business Letters	1st	-	-	16	44	35
	4th	-	-	9	18	39
Answering Tests	1st	20	32	21	9	7
	4th	4	19	28	9	3
Take Notes	1st	21	27	31	11	8
	4th	17	28	13	2	5

Table 62

Question 55

		1	2	3	4
Understand Lectures	1st	37	19	22	20
	4th	21	20	13	10
Conversation in noisy conditions	1st	13	26	27	31
	4th	14	22	11	19
Understand Films & T.V.	1st	18	37	29	14
	4th	1	17	27	18
Understand All Varieties	1st	31	16	29	32
	4th	27	5	15	18

Table 63

APPENDIX 54

		1	2	3	4
Speak About formal topics	1st	34	31	22	11
	4th	30	26	5	4
Speak informally	1st	39	29	18	12
	4th	25	20	12	6
Speak about a technical subject	1st	-	17	34	48
	4th	-	8	23	33
Translate	1st	24	23	24	27
	4th	8	11	22	24

Table 64

APPENDIX 55

	a	b	c
1st Year	24	45	34
4th Year	13	24	30

Table 65



## APPENDIX 56

List of the Individual Scores obtained for the Questionnaire in the First-Year

Student Number	Score	Student Number	Score
1	24	26	22
2	23	27	25
3	19	28	19
4	20	29	22
5	20	30	22
6	22	31	25
7	20	32	21
8	21	33	20
9	21	34	21
10	22	35	21
11	24	36	24
12	25	37	22
13	22	38	27
14	23	39	25
15	24	40	30
16	20	41	18
17	22	42	28
18	20	43	21
19	26	44	19
20	20	45	22
21	24	46	25
22	29	47	25
23	22	48	28
24	19	49	24
25	28	50	24

APPENDIX 56 (ctd)

51	28	76	23
52	25	77	26
53	19	78	29
54	24	79	22
55	23	80	26
56	25	81	25
57	25	82	27
58	26	83	25
59	23	84	26
60	21	85	22
61	26	86	24
62	23	87	21
63	21	88	19
64	23	89	22
65	20	90	24
66	33	91	28
67	24	92	27
68	24	93	27
69	32	94	24
70	21	95	25
71	26	96	27
72	22	97	28
73	24	98	25
74	24	99	29
75	25		

## APPENDIX 57

List of the individual scores obtained for the Questionnaire in the Fourth Year

Student Number	Score	Student Number	Score
1	25	19	26
2	24	20	25
3	19	21	24
4	17	22	21
5	22	23	20
6	24	24	29
7	26	25	28
8	22	26	27
9	19	27	19
10	18	28	23
11	26	29	26
12	20	30	22
13	21	31	20
14	17	32	24
15	19	33	23
16	22	34	21
17	19	35	23
18	18	36	25



APPENDIX 57 (ctd)

37	24	55	21
38	24	56	26
39	19	57	24
40	20	58	21
41	21	59	27
42	25	60	25
43	26	61	30
44	23	62	21
45	23	63	23
46	21	64	29
47	22	65	21
48	22	66	20
49	20	67	22
50	20	68	19
51	21	69	17
52	31	70	21
53	18	71	20
54	33	72	18

## APPENDIX 58 .

## STATISTICAL FORMULAE USED

MEAN:  $(\bar{X})$ 

$$\bar{X} = \frac{\sum X}{N}$$

Standard Deviation:

$$SD = \sqrt{\frac{\sum (X - \bar{X})^2}{N - 1}}$$

t - test:

$$t = \frac{\bar{X}_A - \bar{X}_B}{\sqrt{\frac{\left[ \sum X_A^2 - (\sum X_A)^2 / N_A \right] + \left[ \sum X_B^2 - (\sum X_B)^2 / N_B \right]}{(N_A - 1) + (N_B - 1)} \left( \frac{1}{N_A} + \frac{1}{N_B} \right)}}$$

Pearson (r):

$$r = \frac{N \sum XY - \sum X \sum Y}{\sqrt{[N \sum X^2 - (\sum X)^2]} \sqrt{[N \sum Y^2 - (\sum Y)^2]}}$$

## APPENDIX 59

List of the individual scores obtained in the Interview for the First Year

GROUP A		GROUP B	
Student Number	Score	Student Number	Score
6	62	3	60
11	50	4	50
19	54	7	56
22	60	8	52
23	53	9	51
25	55	10	48
27	50	12	62
30	60	13	46
31	54	14	54
36	55	15	40
40	48	16	53
42	54	17	50
43	53	18	51
45	57	20	48
52	54	21	58
68	54	24	60
69	54	28	54
84	63	29	50
86	63	32	51
96	61	33	50
98	58	34	48
99	55	35	55
		41	47



## APPENDIX 60

List of the individual scores obtained in the Interview for the Fourth Year

GROUP A		GROUP B	
Student Number	Score	Student Number	Score
1	60	10	52
6	59	12	53
7	65	13	51
11	54	14	48
19	51	15	63
22	56	16	49
23	61	17	58
25	56	18	57
27	52	20	49
30	59	21	48
32	60	24	53
36	62	26	50
42	59	28	50
61	62	29	53
64	62	34	53
		35	53
		40	55

APPENDIX 61

Transcription of the students' answers to the open-ended questions and language-learning activities in the Interview

'Speaking'

Student's statement	LS	Type
'When I'm not sure about something I don't speak'	Self-Monitoring	Metacognitive
'I usually memorise some phrases for opening and ending conversations'	Functional Practice	Cognitive
'I learn how to use "erm" in conversations'	Functional Practise	Cognitive
'I learn how to ask for help from the speaker'	Functional Practise	Cognitive
'I make lists of synonyms and memorise them'	Forma Practise	Cognitive
'I avoid to use the structures or words I'm not sure of'	Avoidance	Cognitive
'In a formal conversation, I use gestures a lot to get my message across'	Being Active	Cognitive
'I try to paraphrase the words or structures I don't know'	Forma Practise	Cognitive
'I don't hesitate to ask for help from the speaker'	Questions for Clarification	Cognitive
'I pay attention to the speech of someone who speaks English very well so that I learn new words, pronunciation ,etc'	Monitoring Others	Metacognitive
'I rehearse very often silently to myself'	Formal Practise	Cognitive

APPENDIX 61 (ctd)

'Writing'

Student's statement	LS	Type
<p>'I try to write short paragraphs to myself'</p> <p>'When I can't express an idea</p>	<p>Formal Practise</p>	<p>Cognitive</p>
<p>I just give up'</p> <p>'Before I write I like to establish a detailed plan'</p>	<p>Avoidance</p> <p>Planning</p>	<p>Cognitive</p> <p>Metacognitive</p>
<p>'When I can't find a word, I try either to paraphrase or I just put a French word'</p>	<p>Being Active/ Translation</p>	<p>Cognitive</p>
<p>'I have a special note-book where I write my errors and revise quite often'</p>	<p>Revising</p>	<p>Cognitive</p>
<p>'I learn synonyms so that I don't repeat the same word in my writing'</p>	<p>Formal Practise</p>	<p>Cognitive</p>
<p>'I always re-read what I wrote to check for errors'</p>	<p>Self-Monitoring</p>	<p>Metacognitive</p>
<p>'When I can't find a word I change the sentence'</p>	<p>Avoidance</p>	<p>Cognitive</p>



APPENDIX 61 (ctd)

'Reading'

Student's statement	LS	Type
'I use the dictionary a lot'	Resourcing	Cognitive
'I read newspapers and magazines whenever possible to learn new words, expressions, etc '	Resourcing	Cognitive
'I like to pay attention to the various types of writing so that I can use them later on '	Selective Attention	Metacognitive
'I try to remember the passage while I'm reading '	Memorising	Cognitive

APPENDIX 61 (ctd)

'Listening'

Student's statement	LS	Type
'(Before I answer)...If I don't understand immediately,I ask the speaker to repeat so that I can think more about what he's just said'	Delaying	Metacognitive
'I try to pay particular attention to the most important parts of what being said to me '	Selective Attention	Metacognitive
'If I don't understand a word I try to replace it in its context to guess the meaning'	Guessing/ Contextualisation	Cognitive
'When I hear a new sound I repeat it a lot until I get it right'	Repetition	Cognitive
'Sometimes when a word looks like a French word I try to use its French meaning '	Translation	Cognitive
'I try to listen to the BBC to improve my pronunciation'	Resourcing	Cognitive
'Each time there is a video session in the Dept. I go'	Resourcing	Cognitive

APPENDIX 61 (ctd)

'Vocabulary'

Student's statement	LS	Type
'I make lists of English words with their French equivalent and learn them as such'	Translation	Cognitive
'I try to look at the context in which the word(s) occurs'	Contextualisation	Cognitive
'When I'm alone I repeat the words many times until I remember them well'	Repetition	Cognitive
'When I'm speaking/writing I try to think how I can use these words'	Planning	Metacognitive
'When it is possible, I try to associate these words with a visual image'	Imagery	Cognitive

'Grammar'

Student's statement	LS	Type
'When we study a grammar point I practise it a lot in a Grammar book'	Resourcing	Cognitive
'I like to compare the points of English grammar with French (or Arabic) to see the similarities and differences'	Self-Management	Metacognitive
'I write the rule and make many sentences to remember it'	Formal Practise	Cognitive
'I learn the rules by heart'		



APPENDIX 61 (ctd)

' the Sound System '

Student's statement	LS	Type
<p>'Each time the teacher pronounces a word I don know I repeat it immediately to myself'</p>	<p>Monitoring Others/ Repetition</p>	<p>Metacognitive Cognitive</p>
<p>'When I'm at home I try to practise the new sound aloud'</p>	<p>Repetition/ Formal Practise/</p>	<p>Cognitive</p>
<p>I sometime ask a friend to check my pronunciation and I check his</p>	<p>Formal Practise</p>	<p>Cognitive</p>
<p>'I make a list of the words I have difficulties with and practise them a lot'</p>	<p>Formal Practise</p>	<p>Cognitive</p>
<p>'When I'm in the language lab. Selective Metacognitive new words'</p>	<p>Attention</p>	
<p>'When I'm going to pronounce a word I know I have difficulty with I try to think carefully before using it'</p>	<p>Self-Monitoring</p>	<p>Metacognitive</p>

APPENDIX 61 (ctd)

'(Keeping Track of) Errors'

Student 's statement	LS	Type
'I don't worry too much about errors particularly when I'm speaking'	Being Active	Cognitive
'When I make an error I try to understand why I made it'	Self-Monitoring	Metacognitive
'When another student makes an error I try to correct it my mind'	Monitoring Others	Metacognitive
'I don't like to be interrupted when I make an error. I prefer to do it myself and see why I did it'	External/ Monitoring Self- Management	Metacognitive  Metacognitive
'When the teacher corrects my or another student's error,I pay careful attention'	Directed Attention	Metacognitive
'I try to practise the errors I made by writing sentences or short paragraphs '	Formal Practise	Cognitive
'I check in the dictionary or grammar book why I made this error '	Resourcing	Cognitive

APPENDIX 61 (ctd)

' Memorisation '

Student's statement	LS	Type
' I use mnemonics '	Auditor Representation	Cognitive
' I try to associate a visual image with the word '	Imagery	Cognitive
' I try to associate the new word with its opposite and then remember the pair '	Formal Practise	Cognitive
' I try to use translation '	Translating	

' Taking-Notes '

Student's statement	LS	Type
' I listen to the whole sentence and select the most important words '	Selective Attention	Metacognitive
' I try to memorise while I'm writing '	Memorisation	Cognitive



APPENDIX 62<sup>1</sup>

List of the new scores obtained by First-Year students for the use of the Learning Strategies contained in the Questionnaire and the Interview

Student Number	Score	Student Number	Score
3	79	19	80
4	70	20	68
6	84	21	82
7	76	22	89
8	73	23	75
9	72	24	79
10	70	25	83
11	75	27	75
12	87	28	73
13	88	29	72
14	77	30	82
15	64	31	79
16	73	32	72
17	72	33	70
18	71	34	69

APPENDIX 62 (ctd)

35	76	52	79
36	79	68	78
40	78	69	86
41	65	84	89
42	82	86	87
43	74	96	88
44	67	98	83
45	79	99	84

<sup>1</sup> App 62 to 65 initially included but subsequently not used because the Hypothesis proved unsustainable.

## APPENDIX 63

List of the new scores obtained by Fourth-Year students for the use of the Learning Strategies contained in the Questionnaire and the Interview

Student Number	Score	Student Number	Score
1	85	23	81
6	83	24	82
7	90	25	84
10	70	26	77
11	80	27	71
12	73	28	73
13	72	29	79
14	73	30	81
15	82	32	84
16	71	34	74
17	73	35	76
18	75	36	87
19	77	40	75
20	74	42	84
21	72	61	92
22	77	64	91

APPENDIX 64

List of the scores obtained for the Students' Beliefs in the First Year

Student Number	Score	Student Number	Score
3	35	19	44
4	40	20	39
6	43	21	37
7	38	22	40
8	39	23	39
9	41	24	35
10	36	25	41
11	36	27	35
12	38	28	34
13	34	29	37
14	36	30	37
15	37	31	41
16	40	32	39
17	38	33	41
18	41	34	38

APPENDIX 64 (ctd)

35	42	52	37
36	43	68	42
40	44	69	38
41	39	84	44
42	38	86	40
43	41	96	41
44	37	98	39
45	39	99	42



## APPENDIX 65

List of the scores obtained for the Students' Beliefs in the Fourth Year

Student Number	Score	Student Number	Score
1	46	23	39
6	42	24	36
7	44	25	38
10	40	26	40
11	39	27	46
12	41	28	41
13	45	29	38
14	40	30	39
15	39	32	45
16	42	34	36
17	38	35	40
18	37	36	43
19	40	40	39
20	39	42	40
21	36	61	44

APPENDIX 66

Question Number	GI		GII	
	N	%	N	%
71a	24	24%	13	18%
71b	45	45%	24	33%

Table 1 Use of the LS 'External-Monitoring' in the Questionnaire

Question Number	GI		GII	
	N	%	N	%
63	87	87%	48	67%

Table 2 Use of the LS 'Monitoring Others' in the Questionnaire.

Question Number	GI		GII	
	N	%	N	%
72b	53	53%	27	37%

Table 3 Use of the LS 'Self-Evaluation' in the Questionnaire.

APPENDIX 67

Question Number	GI		GII	
	N	%	N	%
67c	63	63%	47	65%
69c	38	38%	12	17%
70a	22	22%	5	7%
73b	29	29%	26	36%
76b	30	30%	20	27%
77b	30	30%	11	15%

Table 4 Use of the LS `Translating from/into French in the Questionnair

Question Number	GI		GII	
	N	%	N	%
67b	6	6%	2	3%
69b	8	8%	2	3%
70a	22	22%	5	7%
73a	13	13%	6	8%
77a	13	13%	7	10%

Table 5 Use of the LS `Translating from/into Arabic in the Questionnaire



APPENDIX 68

Question Number	GI		GII	
	N	%	N	%
73c	4	4%	2	3%
77c	4	4%	5	7%

Table 6 Use of the LS 'Translating from/into another language' in the Questionnaire

Question Number	GI		GII	
	N	%	N	%
72a	43	43%	37	51%
73d	13	13%	6	8%
74a	12	12%	10	13%
75b	28	28%	26	36%
76c	2	2%	6	6%
77d	39	39%	32	44%
77e	34	34%	23	32%

Table 7 Use of the LS 'Being Active' in the Questionnaire

APPENDIX 69

Question Number	GI		GII	
	N	%	N	%
78a	41	41%	25	35%
78b	42	42%	20	27%
79a	62	62%	35	49%
79b	32	32%	20	28%
79c	45	45%	25	35%

Table 8 Use of the LS 'Questions for' Clarification' in the Questionnaire

Question Number	GI		GII	
	N	%	N	%
64	62	62%	49	68%
69a	57	57%	25	35%
69h	58	58%	34	47%
76a	53	53%	33	45%
78c	93	93%	59	82%

Table 9 Use of the LS 'Resourcing' in the Questionnaire

APPENDIX 70

Question Number	GI		GII	
	N	%	N	%
67a	63	63%	47	65%
68c	61	61%	41	56%
69e	49	49%	25	35%
70b	69	69%	52	72%

Table 10 Use of the LS 'Contextualisation' in the Questionnaire

Question Number	GI		GII	
	N	%	N	%
(1)	14	14%	39	54%
(2)	23	23%	25	35%
47(3)	2	2%	2	3%
(4)				
(5)				
68a	23	23%	14	19%
69g	15	14%	8	11%

Table 11 Use of the LS 'Repetition' in the Questionnaire



APPENDIX 71

Question Number	GI		GII	
	N	%	N	%
68b	54	54%	27	38%
69d	48	48%	24	23%

Table 12 Use of the LS 'Memorising' in the Questionnaire

Question Number	GI		GII	
	N	%	N	%
67d	25	25%	16	22%
70c	25	25%	23	32%

Table 13 Use of the LS 'Deduction' in the Questionnaire

Question Number	GI		GII	
	N	%	N	%
76d	7	7%	6	8%
78d	3	3%	6	8%

Table 14 Use of the LS 'Avoidance' in the Questionnaire

APPENDIX 72

Question Number	GI		GII	
	N	%	N	%
(a)	16	16%	7	10%
(b)	38	38%	21	29%
80(c)	34	34%	25	35%
(d)	11	11%	11	15%
(e)	1	1%	2	3%

Table 15 Use of the LS 'Participating' in the Questionnaire

Question Number	GIA		GIB	
	N	%	N	%
21c	-	-	-	-
21d	-	-	-	-
36b	13	59%	14	58%
(a)	15	68%	17	70%
(b)	15	68%	12	50%
60(c)	10	45%	6	25%
(d)	10	45%	3	12%
61a	11	50%	13	54%
62b	13	59%	12	50%
62d	-	-	-	-
62e	3	13%	1	4%
62f	13	59%	15	62%

Table 16 Use of the LS 'Self-Monitoring' in the Interview in the First Year

APPENDIX 73

Question Number	GIA		GIB	
	N	%	N	%
(1)	12	54%	23	95%
(2)	10	45%	1	4%
9 (3)	-	-	-	-
(4)	-	-	-	-
(1)	21	95%	23	95%
(2)	1	4%	1	5%
44(3)	-	-	-	-
(4)	-	-	-	-
45a	22	100%	24	100%
45b	10	45%	12	50%
45c	13	59%	16	66%
45d	9	40%	12	50%
46a	7	31%	7	29%
46b	5	22%	11	45%
46c	12	54%	17	70%
46d	12	54%	12	50%
46e	6	27%	8	33%

Table 17 Use of the LS 'Monitoring Others' in the Interview in the First Year



APPENDIX 74

Question Number	GIA		GIB	
	N	%	N	%
21a	20	90%	23	95%
21b	3	13%	10	41%
22a (Int.)	17	77%	23	95%
(Adv)	10	45%	21	87%
22b (Int.)	11	50%	15	62%
(Adv)	9	40%	13	54%

Table 18 Use of the LS 'External-Monitoring' in the Interview in the First Year

Question Number	GIA		GIB	
	N	%	N	%
(1)	12	54%	12	50%
11(2)	10	45%	12	50%
(3)	-	-	-	-
(4)	-	-	-	-

Table 19 Use of the LS 'Planning' in the Interview in the First Year

APPENDIX 75

Question Number	GIA		GIB	
	N	%	N	%
(1)	18	81%	4	16%
6 (2)	4	18%	14	58%
(3)	-	-	6	25%
(1)	11	50%	6	25%
(2)	8	36%	5	20%
7 (3)	-	-	10	41%
(4)	-	-	3	12%
(1)	20	90%	9	37%
10(2)	2	10%	13	54%
(3)	-	-	2	9%
39a	18	81%	19	79%
39b	4	18%	4	16%
39c	-	-	-	-
(1)	9	40%	3	12%
51(2)	10	45%	16	72%
(3)	3	13%	5	20%
64a	22	100%	24	100%
64b	9	40%	5	20%
64c	-	-	-	-
64d	11	50%	17	70%

Table 20 Use of the LS'Formal Practising' in the Interview in the First Year

APPENDIX 76

Question Number	GIA		GIB	
	N	%	N	%
(1)	3	13%	3	12%
(2)	9	40%	2	8%
31(3)	9	40%	13	59%
(4)	1	4%	6	25%
37a	10	45%	12	50%
37b	4	18%	7	29%
37d	16	72%	12	50%
37e	2	9%	2	8%
38a	6	27%	13	54%
38b	11	50%	11	45%
38c	5	22%	2	8%
(1)	7	31%	6	25%
4 (2)	13	59%	12	50%
(3)	2	9%	6	25%
58(1)	11	50%	4	16%
(2)	11	50%	19	79%

Table 21 Use of the LS 'Functional Practising' in the Interview in the First Year



APPENDIX 77

Question Number	GLA		GIB	
	N	%	N	%
(1)	4	18%	1	4%
(2)	8	36%	6	25%
8 (3)	8	36%	12	50%
(4)	2	9%	5	20%
(1)	5	22%	4	16%
(2)	10	45%	8	33%
13(3)	4	18%	9	38%
(4)	3	13%	3	12%
(1)	5	23%	13	54%
(2)	12	55%	6	25%
17(3)	4	18%	4	16%
(4)	1	4%	1	4%
(1)	3	14%	1	4%
(2)	12	55%	11	46%
18(3)	4	18%	8	33%
(4)	3	13%	4	16%
(1)	2	9%	1	4%
(2)	7	32%	9	37%
19(3)	10	45%	7	29%
(4)	3	13%	7	29%
36a	9	40%	10	41%

Table 22 Use of the LS 'Being Active' in the Interview in the First Year

APPENDIX 78

Question Number	GIA		GIB	
	N	%	N	%
(1)	-	-	-	-
(2)	13	59%	9	38%
12(3)	8	36%	14	58%
(4)	-	-	-	-
24d	8	36%	13	54%
29d	9	40%	3	12%
(1)	5	22%	1	4%
(2)	13	59%	6	25%
41(3)	4	18%	14	58%
(4)	-	-	3	12%
(1)	4	18%	1	4%
(2)	10	45%	6	25%
43(3)	8	36%	13	54%
(4)	-	-	4	16%
49b	13	59%	11	45%
(1)	2	9%	3	12%
(2)	15	68%	7	29%
52(3)	5	22%	16	72%
(4)	-	-	-	-
(1)	3	13%	-	-
(2)	14	63%	9	37%
53(3)	5	22%	14	58%
(4)	-	-	-	-
(1)	2	9%	2	8%
(2)	12	54%	12	50%
54(3)	8	36%	5	20%
(4)	-	-	1	4%

Table 23 Use of the LS'Resourcing' in the Interview in the First Year

APPENDIX 79

Question Number	GIA		GIB	
	N	%	N	%
(1)	16	72%	2	8%
(2)	6	23%	15	62%
15(3)	-	-	7	7%
(4)	-	-	-	-
27c	10	45%	19	79%
29a	7	3%	4	16%
29b	9	40%	18	75%
29c	12	54%	16	72%

Table 24 Use of the LS 'Memorising' in the Interview in the First Year



APPENDIX 80

Question Number	GIA		GIB	
	N	%	N	%
20a	13	59%	7	29%
24a	13	59%	14	58%
24b	9	40%	11	45%
(1)	-	-	-	-
(2)	17	77%	13	54%
32(3)	5	22%	11	45%
(4)	-	-	-	-
(1)	-	-	-	-
(2)	20	90%	19	79%
35(3)	2	9%	5	20%
(4)	-	-	-	-
47c	9	40%	7	29%
55a	19	86%	20	83%

Table 25 Use of the LS 'Inferencing' in the Interview in the First Year

Question Number	GIA		GIB	
	N	%	N	%
24c	2	9%	7	29%
47a	4	18%	6	25%
47b	-	-	-	-
47d	13	59%	7	29%
49a	6	27%	9	37%

Table 26 Use of the LS 'Question for' Clarification in the Interview in the First Year

APPENDIX 81

Question Number	GIA		GIB	
	N	%	N	%
27a	6	27%	9	37%
55b	6	27%	6	25%

Table 27 Use of the LS 'Translating from into Arabic' in the Interview in the First Year

Question Number	GIA		GIB	
	N	%	N	%
27b	9	40%	12	50%
55c	9	40%	19	79%
61c	2	9%	7	29%

Table 28 Use of the LS 'Translating from' or into French in the Interview in the First Year

Question Number	GIA		GIB	
	N	%	N	%
27d	20	90%	6	25%
49c	17	77%	12	50%

Table 29 Use of the LS 'Contextualisation' in the Interview in the First Year

APPENDIX 82

Question Number	GIA		GIB	
	N	%	N	%
47e	4	18%	11	45%
49d	2	9%	11	45%
55d	1	4%	17	70%
61b	12	54%	8	33%
62a	-	-	3	12%
62c	4	18%	11	45%

Table 30 Use of the LS 'Avoidance' in the Interview in the First Year

Question Number	GIA		GIB	
	N	%	N	%
1	18	81%	6	25%
2	4	18%	17	71%
33 3	-	-	-	-
4	-	-	-	-
1	15	68%	13	54%
2	7	31%	11	46%
34 3	-	-	-	-
4	-	-	-	-

Table 31 Use of the LS 'Miming' in the Interview in the First Year



APPENDIX 83

Question Number	GIIA		GIIB	
	N	%	N	%
21c	-	-	-	-
21d	-	-	-	-
36b	7	46%	7	41%
(a)	15	100 %	15	100%
(b)	15	100%	12	50%
60(c)	11	73%	6	35%
(d)	10	66%	5	29%
61a	5	33%	6	35%
62b	15	100%	9	52%
62d	-	-	-	-
62e	8	53%	3	17%
62f	12	80%	11	64%

Table 5.32 Use of the LS 'Self-Monitoring' in the Interview in the Fourth Year

APPENDIX 84

Question Number	GIIA		GIIB	
	N	%	N	%
(1)	10	66%	5	33%
(2)	4	26%	10	66%
9 (3)	1	6%	2	13%
(4)	-	-	-	-
(1)	15	100%	17	100%
(2)	-	-	-	-
44(3)	-	-	-	-
(4)	-	-	-	-
45a	15	100%	17	100%
45b	15	100%	17	100%
45c	11	73%	9	52%
45d	7	45%	6	35%
46a	8	53%	3	17%
46b	1	6%	4	23
46c	15	100%	15	88%
46d	15	100%	13	76%
46e	-	-	-	-

Table 33 Use of the LS 'onitoring Others' in the Interview in the Fourth Year

APPENDIX 85

Question Number	GIIA		GIIB	
	N	%	N	%
21a	15	100%	16	94%
21b	-	-	1	5%
22a (Int.)	8	53%	13	76%
(Adv)	3	20%	6	35%
22b (Int.)	6	40%	11	64%
(Adv)	8	53%	8	47%

Table 34 Use of the LS 'External-Monitoring' in the Interview in the Fourth Year

Question Number	GIIA		GIIB	
	N	%	N	%
(1)	14	94%	1	5%
11(2)	1	6%	11	64%
(3)	-	-	-	-
(4)	-	-	-	-

Table 35 Use of the LS 'Planning' in the Interview in the Fourth Year



APPENDIX 86

Question Number	GIIA		GIIB	
	N	%	N	%
(1)	15	100%	12	70%
6 (2)	-	-	5	30%
(3)	-	-	-	-
(1)	13	86%	6	35%
(2)	2	14%	8	47%
7 (3)	-	-	2	11%
(4)	-	-	-	-
(1)	11	73%	10	58%
10(2)	4	26%	6	35%
(3) -	-	1	1	5%
39a	7	46%	10	58%
39b	7	46%	7	41%
39c	1	6%	-	-
(1)	2	13%	4	23%
51(2)	13	86%	10	58%
(3) -	-	3	3	17%
64a	15	100%	16	94%
64b	6	40%	5	29%
64c	-	-	-	-
64d	2	13%	8	47%

Table 36 Use of the LS 'Formal Practising' in the Interview in the Fourth Year

APPENDIX 87

Question Number	GIIA		GIIB	
	N	%	N	%
(1)	4	26%	-	-
(2)	6	40%	2	11%
31(3)	5	33%	15	88%
(4)	-	-	-	-
37a	6	40%	4	23%
37b	3	20%	1	5%
37c	15	100%	14	82%
37d	6	40%	3	17%
37e	2	13%	1	5%
38a	8	53%	14	82%
38b	7	46%	2	11%
38c	1	6%	1	5%
(1)	11	73%	4	23%
42(2)	4	26%	11	64%
(3)	-	-	-	-
58(1)	5	33%	6	35%
(2)	10	66%	11	64%

Table 37 Use of the LS 'Functional Practising' in the Interview in the Fourth Year

APPENDIX 88

	GIIA		GIIB	
	N	%	N	%
(1)	3	20%	2	11%
(2)	9	60%	5	29%
8 (3)	3	20%	5	29%
(4)	-	-	5	29%
(1)	4	26%	-	-
(2)	7	46%	6	35%
13(3)	3	20%	6	35%
(4)	1	6%	5	29%
(1)	2	13%	10	58%
(2)	9	60%	7	41%
17(3)	4	26%	-	-
(4)	-	-	-	-
(1)	4	26%	-	-
(2)	6	40%	5	29%
18(3)	5	33%	10	58%
(4)	-	-	2	11%
(1)	-	-	-	-
(2)	8	53%	4	23%
19(3)	4	26%	7	41%
(4)	3	20%	6	35%
36a	8	53%	10	58%

Table 38 Use of the LS 'Being Active' in the Interview in the Fourth Year



APPENDIX 89

Question Number	GIIA		GIIB	
	N	%	N	%
(1)	-	-	-	-
(2)	15	100%	7	41%
12(3)	-	-	10	58%
(4)	-	-	-	-
24d	10	66%	9	52%
29d	12	80%	9	52%
(1)	-	-	-	-
(2)	14	93%	12	70%
41(3)	1	6%	5	29%
(4)	-	-	-	-
(1)	-	-	-	-
(2)	12	80%	1	5%
43(3)	3	20%	15	88%
(4)	-	-	1	5%
49b	11	73%	7	41%
(1)	-	-	-	-
(2)	13	86%	12	70%
52(3)	2	13%	5	29%
(4)	-	-	-	-
(1)	-	-	-	-
	9	60%	7	41%
53(3)	6	49%	10	58%
(4)	-	-	-	-
(1)	11	73%	2	11%
(2)	4	26%	12	70%
54(3)	-	-	3	17%
(4)				

Table 39 Use of the LS 'Resourcing' in the Interview in the Fourth Year

APPENDIX 90

Question Number	GIIA		GIIB	
	N	%	N	%
(1)	13	86%	7	41%
(2)	2	13%	9	52%
15(3)	-	-	1	5%
(4)	-	-	-	-
27c	14	93%	8	47%
29a	1	6%	1	5%
29b	6	40%	10	58%
29c	12	80%	11	64%

Table 40 Use of the LS 'Memorising' in the Interview in the Fourth Year

Question Number	GIIA		GIIB	
	N	%	N	%
20a	11	73%	6	35%
24a	10	66%	8	47%
24b	5	33%	4	23%
(1)	1	6%	-	-
(2)	14	93%	16	94%
32(3)	-	-	1	5%
(4)	-	-	-	-
(1)	-	-	-	-
(2)	15	100%	15	88%
35(3)	-	-	2	11%
(4)	-	-	-	-
47c	9	60%	9	52%
55a	15	100%	12	70%

Table 41 Use of the LS 'Inferencing' in the Interview in the Fourth Year

APPENDIX 91

Question Number	GIIA		GIIB	
	N	%	N	%
24c	8	53%	6	35%
47a	1	6%	-	-
47b	-	-	-	-
47d	6	40%	3	17%
49a	-	-	2	11%

Table 42 Use of the LS 'Question for' Clarification' in the Interview in the Fourth Year

Question Number	GIIA		GIIB	
	N	%	N	%
27a	6	40%	13	76%
55b	-	-	6	35%

Table 43 Use of the LS 'Translating from into Arabic' in the Interview in the Fourth Year



APPENDIX 92

Question Number	GIIA		GIIB	
	N	%	N	%
27b	4	26%	2	11%
55c	2	13%	2	11%
61c	2	13%	2	11%

Table 44 Use of the LS 'Translating From or into French' in the the Interview in the Fourth Year

Question Number	GIIA		GIIB	
	N	%	N	%
27d	14	93%	5	29%
49c	15	100%	12	70%

Table 45 Use of the LS 'Contextualisation' in the Interview in the Fourth Year

APPENDIX 93

Question Number	GIIA		GIIB	
	N	%	N	%
47e	5	33%	8	47%
49d	2	13%	5	29%
55d	-	-	-	-
61b	12	80%	14	82%
62a	-	-	3	17%
62c	-	-	5	29%

Table 46 Use of the LS 'Avoidance' in the Interview in the Fourth Year

Question Number	GIIA		GIIB	
	N	%	N	%
(1)	15	100%	13	76%
33 (2)	-	-	4	24%
(3)	-	-	-	-
(1)	9	60%	8	47%
34 (2)	6	40%	8	47%
(3)	-	-	1	5%

Table 47 Use of the LS 'Miming' in the Interview in the Fourth Year