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Students 'needs in learning E.S.P

Case study: The 2nd Year Computer Science LMD students
at Chlef University

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Dedication

To my parents, my wife, all my teachers and colleagues.

Abstract

The purpose of this case study is to identify the needs of the second year Computer Science LMD students in learning English for specific purposes in the department of computing at Hassiba Benbouali University, Chlef. The participants were a group of 41 students and their teachers of English for the academic year 2010-2011.To collect data the researcher used a participant observation and two questionnaires; the first one was meant for the teacher whereas the second was administered to the 2nd year LMD students. The findings brought out an overall identification of the students' needs with positive opinions of all two groups on the needs of using the specific English courses designed for computing students in their department, as well as the four macro-English language skills (listening, speaking, reading, and writing) that are greatly needed. The findings also reinforced the importance of implementing this need analysis as an important stage to design a course later that would fit those needs and suggestions provided by the teacher and the students. Therefore, more English courses specially designed to suit the students' needs are recommended in future curriculum development. The dissertation develops in four chapters. The first chapter sums up the present situation of ESP in Algeria in general and to the Computer Science department in particular. The second chapter introduces, defines and explains English for specific purposes (ESP) and needs analysis (NA). The importance of taking into account the students' needs in the process of ESP teaching/learning is investigated. The third chapter is devoted to the fieldwork. It deals with the teacher's questionnaire, the student's questionnaire and observation which is the third tool used in this research, including the analyses of the answers provided. Finally, the fourth chapter analyses the

findings and proposes some tentative solutions.

List of Abbreviations and Acronyms

EAP: English for academic purposes

EFL: English as a foreign language

EGP: English for general purposes

ELT: English language teaching

EOP: English for occupational purposes

ESL: English as a second language

ESP: English for specific purposes

EST: English for science and technology

EVP: English for vocational purposes

GE: General English

NA: Needs analysis

PSA: Present situation analysis

SE: Specific English

TEFL: Teaching English as a foreign language

TSA: Target situation analysis

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General Introduction

   English is considered as the international language of science and technology. Researchers and scientists need to learn this language to have access to different documents and references written in English. The latter facilitates for them the retrieval of information from various written sources,which they could benefit from so as to update academic research and develop in their related field of study. The emergency of a new trend to learn English as a second or foreign language, which is now known by "ESP" (English for specific purposes), was a must during the Second World War. The determining role played by the USA during that period, not only influenced historical events,but also exerted a strong pressure on international trade and business relationships. As a result, the world of science and technology transfer has also been conditioned by the mastery of English,which is established now as the first international language. In Algeria and just after its independence, English was welcomed to be taught at schools and universities. Pupils and students were being familiarized with this new language. The Algerian authorities have given much importance to the learning of English in order to achieve development in the different scientific fields for academic studies of graduate and post-graduate students who needed to pursue the world's scientific and technological development. As a result, English becomes omnipresent in any curriculum taught at universities, department of Arts, Science and technology; moreover, some departments required its use more than others. Hassiba Benbouali University, Chlef where the specificity and the requirements of this particular discipline emphasize the importance of the English language for the learning and understanding of all terminology based on computing.

   The students are required to read and understand written documents in English in relation to their field of study. Thus, reading academic texts (such as text books and research articles) seems to be the greatest requirement for students in most educational situations where English is taught and used for specific purposes. Hence, the difficulties already encountered by university students in the non-existing courses, the inadequacy of the teaching materials and techniques, the modest experience of the researcher as an English teacher in this department, justifies this work. The current English language

teaching situation at the University level for Computer Science Department, University Hassiba Benbouali,Chlef,does not lead to good results because of several reasons.Firstly,the English language teachers are not specialists in the field nor experienced at all to carry out the teaching of English for specific purposes.Secondly,no predetermined objectives are defined in the teaching of English and the students' needs are not taken into account at all. As a result, the students fail in their attempt to acquire the basic knowledge of both the English language and the Computer Science in which they are specializing. Therefore, a new approach such as English For Specific Purposes (ESP) based on students needs should be adopted.

Students needs requirements, and interests should be taken into account when designing teaching materials. Such identification is likely to increase the teachers' awareness of the students' needs and help course designers to design more efficient English courses. Thus, needs analysis is a prerequisite in most educational institutions where English is used and taught for specific purposes.Teaching or learning a language effectively, can be better achieved when teachers are aware of their learners' needs and preferences which are of crucial importance in the development of the learner's autonomy and are vital for designing a syllabus.

The objectives of this study are first,to identify students' perceptions of their language needs.Second,to discover how students rate their own competence in particular skills.Third ,to determine to which extent their opinions match those of their teachers.Regarding the situation of English for Specific Purposes Course at this Department, two samples are chosen to deal with in this study.First,The teachers of English at the department of Computing (only one English teacher for the second and the fourth year students).This may look a very small sample in practical terms; it however covers all the English teachers in the Department of Computing.Second,The 2nd year LMD students of the department of computing (41 students). As it is difficult to work on the whole population (about 215 students), Randomization was the strategy used to choose the sample. We have opted for this method because in random sampling, according to Brown (2001:72) "each individual in the population must have an equal chance of being selected", which reduce the effect of bias and enhance the objectivity.

The present work aims at studying whether such an analysis of needs is present in the elaboration of the English programmes to second-year LMD students at the Computer Science Department.For this reason and as a primary question for this study :

1- What are the reasons of the 2nd year Computer Science students for learning English in this Department ?

If the current situation for English language does not lead to good results, so :

2- What are the skills the students need more for a better learning?

3- Are the English teachers of this Department qualified to teach ESP?

This situation leads us to a general agreement that 2nd year LMD students require to treat their needs to better their situation in English.

The researcher steers this study by the following hypotheses:

Hypothesis 1: The Computer Science students are aware of their English level and the importance of learning this language will be among their first objectives.

Hypothesis 2:Among the four skills , listening and speaking are of great need for the students.

Hypothsis 3: English teachers are not qualified for teaching ESP and they need to improve their methods of teaching it.

Effective language teaching and learning may be better achieved when teachers are aware of their learners' needs and preferences,which are of crucial importance in the development of the learner's autonomy and are vital for designing a syllabus.

So, as long as both teachers and students of this Department are concerned ,it is necessary to follow these strategies of predetermined objectives.

1.1.Introduction

In this chapter, the researcher will discuss the situation of ESP in Algerian Universities with special emphasis on the learning situation at the department of Computer Science at Hassiba Benbouali University, Chlef. The situation of English teaching learning in Algeria in general,will also take place in this chapter with a particular focus on how is it taught at the Computer Science department, focusing on the learners'needs,the teaching situation,English as a module in this department and the English teacher of this department.

1.2.The methodology used :

It is widely known that Descriptive research involves collecting data in order to test hypotheses or answer questions regarding the subjects of the study. In contrast with the qualitative approach the data are numerical. The data are typically collected through a questionnaire, an interview, or through observation.In descriptive research, the investigator reports the numerical results for one or more variables on the subjects of the study.For this reason , descriptive approach would be more adequate for our research. We think that knowing the actual and immediate state of the students' needs would be more fruitful than registering their past needs and hence the historical approach doesn't fit our present research. Moreover, the experimental approach doesn't fit our work, for it necessitates a full working group and needs a long period of time.

To obtain information regarding the situation of ESP course at the Department of Computer Science, University of Chlef, two samples chosen from the following population:

a) The teachers of English at the Computer Science Department:(about02 teachers) This may look a small sample in practical terms; it however covers all the ESP teachers in this Department.
b) The 2nd year LMD students of the Computer Science Department (100 students).

As it is difficult to work on the whole population, Randomisation was the strategy used to choose the sample. We have opted for this method because in random sampling, according to Brown (2001:72) "each individual in the population must have an equal chance of being selected", which reduce the effect of bias and enhance the objectivity.

1.3. Structure of the Dissertation:

The dissertation develops in four chapters. The first chapter deals with the learning situation of the Computer Science Department, within a general view on it. The second Chapter reviews the literature on ESP and on needs analysis. It is devoted to a general definition of ESP and sums up the present situation of ESP in Algeria. There was an introduction, definitions and explanations of needs analysis, as well. The importance of taking into account the students' needs in the process of ESP teaching/learning is investigated. The third chapters are devoted to the fieldwork proper. It deals with the questionnaire administered to the students and analyses the answers provided. Besides the questionnaire administered to English language teachers and the analyses of the answers provided. The classroom observation which is considered to be the third tool in this research study was also treated and developed in this chapter.

Finally, the fourth chapter analyses the findings and proposes some tentative solutions.

1.4. Definition of the Terms of the Study:

Practitioners of English language teaching (ELT) see TEFL as standing for teaching English as a foreign language to non-native speakers in a non-native speaking environment (Kennedy and Bolitho, 1984).

In such a context of acquiring English as a foreign language, the learners want to use or are required to study English for specific purposes such as English for science and technology, English for business and so on (Kennedy and Bolitho, 1984: 4-5). In this process of teaching English as a foreign language, the English language teacher is required to consider as objectively as possible why the learners need English (Kennedy and Bolitho, 1984: 2). This objectivity is seen through an analysis of these needs identified as necessities, lacks and wants which can result in a strategy of

predetermined objectives (Hutchinson and Waters, 1987). The primary function of a needs analysis is to express and to determine the final objectives to which English language learning is put (Hutchinson and Waters, 1987). The other function of a needs analysis is to take into account the students' initial needs, including learning needs and also to investigate students' strengths and weaknesses at the start of their language course (Richterich and Chancerel, 1987).

In order to make his or her analysis of needs accurate and efficient, the language teacher must consult three main sources of information: the language teachers, the students and the institution the students are from (Richterich and Chancerel, 1987).

Once the English language teacher finds himself or herself involved in an ESP environment with students needing an ESP learning, he or she must determine by means of a needs analysis the English course to be taught, the content, the forms, the methodology of teaching and, finally, the set of communicative functions and abilities that should be achieved by the students (Kennedy and Bolitho, 1984).

1.5.The research tools :

To conduct this research, two questionnaires, one addressed to the language teachers who have taught at the department of computer science and another to second-year LMD students, have been designed and used. In adition to a classroom observation,which is used as a third tool .

The researcher is aware that the use of three research instruments guaranties the research validity and enhances its objectivity, that's why, the answers of the research questions are by collecting quantitative data from teachers' questionnaire ,students' questionnaire and from observation which is the third tool.

The questionnaires will be designed for the purpose of gaining further insights into the situation in the department of Computing. A questionnaire is the only instrument that can serve as a means of collecting a considerable amount of data with a minimum of time and effort. It is not only easy to administer, but it also provides a general view of the investigated problem which is difficult to obtain by other means of investigation. Questionnaires, as pointed out by Anderson (1990, p.207), allow the gathering of reliable and valid data, relatively, in a short time. The importance of questionnaires,

along with other instrument types such as tape recording, role plays, and interviews, in foreign language teaching and learning research was due to their recognized advantages as instruments for collecting information. Questionnaires are in most of times anonymous and the participant finds it, somehow, easy to complete and preserve their privacy .Besides, It can reach a large number of participant easily. Moreover, data collected via questionnaire is accurate and easy to analyse by researchers and it saves time and financial resources.Even if questionnaires also have some disadvantages, the researcher tried to make the respondents at ease when completing the questionnaire by showing its importance and the role that their objectivity plays in answering the questionnaire and tries to focus on the main aim of the study. Another process, by which the researcher can study some real life situations and record significant events, is Observation.It evaluates the individual's behavior in both controlled and uncontrolled situations. It is also considered to be a direct method for studying various aspects of human behavior, as it gives the researcher the opportunity to record events at the time of occurrence. Observation is an important tool for all researchers and is frequently used to collect data in both quantitative and qualitative studies. There is much more to observation than just 'watching' and there are different types of observation techniques which can be employed.Observation is way of gathering data by watching behavior, events, or noting physical characteristics in their natural setting.

Observation has a long tradition in the social sciences: for example, it has been

extensively employed by psychologists (*Irwin, l 980; Brandt, 1 98 1 ; Liebert,*

1995) and by educational researchers (*Foster, 1996b*). Loolung from a more

sociological perspective, Adler (1994) review five 'observational

paradigms' which can be distinguished in the way observational methods have

been used, and give several examples of each.Moreover, Observation, as well as

participant observation, is important.In Data collection techniques, it is not only the

behaviour, or situation, itself which is of interest .It is also, and centrally, the meaning

of that behaviour or situation as seen by the people we are studying which is the focus.

For the observation of the courses, the researcher met the teacher in order to give her an appointment and know about the timing of the course. The course took place in a room in the building of the Computer Science Department .The researcher went looking for the teacher who was supervising the students' exams in another department. After meeting her, the researcher explained for her the purpose of that meeting which was to share information that helped both the teacher and observer prepare for the observation.There was also a talk about course information (including the syllabus), class activities on the days of the observation, what will happen during the observation, and observation follow up opportunities. After that the English teache of the Computer Science Department agreed with the observer/researcher, the latter started joining the courses along a month.

1.6. English language teaching in Algeria:

The introduction of English in Algeria seems to correspond to the post Second World War period. At that time Algeria was still dominated by France and was one of its important colonies. As education was organized according to the political decisions and objectives imposed by France, the decision of teaching English was initiated by the French colonial authorities. Basically, English was mostly taught by French teachers who used the same teaching methods as practiced in the French metropolis. The pupils attending secondary schools in Algeria were thus being familiarized with this new language which was being welcomed at that time.

In higher education,the Algerian higher educational institutions,use Arabic and French languages as a medium of instruction. For the English language in Algerian faculties and institutions,learners meet this language only in the classroom where it is taught as a pedagogical support, for most of the documentation is in English, and for scientific reasons because a great part of the scientific terms are in English.In recent years,The demand for English has exploded due to its role as the global language.The status of English is that of a foreign language.So,Teaching it as a foreign language in Algeria is inspired by its importance that enjoys high level of presence in the world.

It can also be another way to diminish French interference as claimed by Miliani (2003: 07)

"In a situation where the French language has lost much of its ground in the socio-cultural and educational environments of the country; the introduction of English is being heralded as the magic solution to all possible ills-including economic, technological and educational".

The increasing demand for English to match particular needs gives birth to English for Specific Purposes (ESP). Practitioners have included other sub-areas within the general study of ESP, among which English for Science and Technology (EST) is one. It is concerned with the discourse of scientific and technical English. The facts that English is an international language and is therefore the language of science have made the area of English for Science and Technology a "driving force" (Flowerdew, 1990, p.328). Hence, the department has integrated the English module within the computing programme so as to keep pace with scientific developments.At the University of Chlef, English is taught for almost all scientific fields. In such a setting, learning English is not for the sake of the language itself, but rather for the learner's purpose for learning the language, i.e., the objective of computing students for learning English is to realize meaning while reading texts which are mostly written in English.

1.7.The Computer Science Department and the LMD system:

This research is concerned with a case study carried out at the Department of computer Science,at Hassiba Benbouali University,Chlef.Higher education in this university began during the academic year 1983/1984 which means twenty seven years ago.The Computer Science Department was founded in 1999. Among the different aims of This department is the preparation of different specialists in the different fields of computer programming and applications.The latter produces a generation of technical professionals who participate in the diffusion of e-culture among different levels of society and also contribute the advance of economic development through the conversion functionality in government and private sectors to fully electronic machine. Among its purposes also is to train students to have a university diploma in computing, these students will acquire skills that will improve their competency to be practitioners of the computer and the related software. Their field of study will make them

comprehend the nature of numerous modern software systems, and identify the distinct components that constitute them. Even for a better transmition of new innovations and ideas will be Their objectives for team works.. This diploma will also enable them to find work in computing-related industries. The LMD system was introduced for the student in the academic year(2008/2009).In the classic system the "Lisence" is accomplished during a four year curriculum.Which is not the case in the LMD system. It is accomplished in three years. The classic system was adopted by the Algerian university for a long time,however some drawbacks appeared in the last period. This necessitates a change since the university system expectations were not satisfied with the classic system.

Students will have their "Lisence" degree by the end of the third year in the LMD system. For the acheivemlent of the new system requirements imposed by the future expectations of the country , the Algerian government has begun a global reform of the system of higher education. To rely on LMD system is very beneficial for the Algerian university since it is a unified education system. The LMD system contains new features.Among them,is that the learners get credits which they can use wherever they go. If they stop for a while and resume studying there is no need to re-learn all the modules, just they give the credits that they have already been acquired. For the License in computing or in another field, a learner must earn 120 credits. Wherever a student goes, if he has a Masters' degree, he can enter the Doctorate program and can even change Majors .

The main purpose for applying this new system in the Algerian university is to stratify the same reforms that are applied in developed countries. The purpose of this reform is to assist the Algerian educational system and research in order to go in the same level with the international ones. The LMD system is an Anglo Saxon programme adopted by most European countries and other countries in the world where it proved its success. As a result, the adoption of this system by the Algerian universities, including the University of Chlef ,which is our case study, is a step towards Globalization. The application of the LMD system by the Algerian universities permit the establishment of a real re-foundation of the programmes that

should be adequate to go in the same path with development in the world of education and science. Since this was a new system in the Algerian educational system, it is important to represent some of its key features. It is made of the Licence with 6 semesters (three years of study and the equivalence of the BA i.e. Bachelor Degree), a Master degree of two years (4 semesters) is the second phase whereas the last period is the Doctorate studies of three years of research (6semesters). The aim behind changing the system of teaching, mainly at the level of the University of Chlef is to follow the experience of the preceding Algerian universities in the adoption of LMD to enable the students to have equal chances to be accepted in different work fields and to create an overall innovation within the Algerian universities to allow them follow the flow of real foundations adequate with the evolution of scientific research and educational techniques. The system also is based on the so-called "Teaching Units" which the students should collect by the end of each semester. Another new element is the system of "Credits" which means that if students do not collect the needed credits, they may pass to the following semester with the credits got before but they still indebted until they get back what remains to gather the needed credits by the end. Talking about the department of computing in the University of Chlef or in other universities and departments there are six semesters in the first phase of this system which is the "Licence" degree. In each semester, students are expected to attend 400 hours. New subject fields have been added in this system to allow students have as much opportunities as possible when passing to the second phase of the system which means the Master Degree and also new divisions occur especially in the second year.As an example,the two sections we mentioned before.The "WEB" and the "IA" sections.These two different fileds appear in the second year in the department of computing which were existing in the classic system . To sum up ,the LMD system stimulates new steps and stages of education. The courses are offered and regrouped in the field of education and course of study.One field is containing several sciences.The course of study has made in semesters and units. Each unit has an importance in the proportional credits of study (courses, tutorials, and schooling education ...)

1.8.The required conditions for the new baccalaureat holders:

Like all the universities in Algeria, , The procedures of administrative and pedagogical inscription of new bachelors are subjected to criteria establish by the Ministry of Higher Education and Scientific Research and are the subject of a circular. A prospectus will be given to the new bacalaurait holders with their Statement of Notes of the Baccalaureat in order to facilitate thier orientation towards the dies to which they have the right to register.The new 'Baccalaureate' holders are classified according to there streams (branches) in the secondary schools,and priority is given to technical branches to be accepted in the Computer Science department. There are also other complementary conditions,which are suitable for scientific branches. Besides the national classification, students of the scientific branches should have 12/20 or more in mathematics and physics. After being accepted in Computing Department, the students will normally spend a period of three years study to graduate and obtain the computing 'Licence' degree. During this period students are theoretically assisted and trained to become either teachers in secondary or middle schools or to carry on post graduate studies at University upon an admission test.the three years spent to get the graduation aims at consolidating the basis of previously acquiered language in secondary school.

1.9.The teaching situation:

As it is the case for almost all Algerian universities,French is the medium of instruction and communication and not English. However, students are compelled to read some books,articles and other needed documents of their field of study in English. The English language is a compulsory module that the students have to attend one session per week and they are evaluated through a written exam at the end of each semester along the three years of the Bachelor degree. Their English teacher designs by him/herself a variety of written activies related to the field of their study in order to help the students increase both linguistic and academic skills, and to develop knowledge related to the field of computing. The ESP course would help ESP students to deal with reliable materials suitable for their specialization and provide them with the skills and strategies needed to meet their English needs and their objectives.

Besides the module of English, the students study along the week different modules related to their specialty .

1.10.The sample of the study:

This study was conducted at the University of Chlef, department of Computing. The sample of study consists of 2nd year LMD students. They study English one hour and half per week. They are divided into 2 sections; "WEB" and "IA", the teachers in the department see the importance of this division in order to facilitate the assessment of the students on one side and to help the student to concentrate on a field rather than another on the other side.These2 sections, called groups in the administration, appear in the academic year 2010/2011. The aim of this study is to obtain information regarding the attitudes of students towards the integration of computer in English classes. One sample of participants (40 students) was chosen at random from the following population: The 2nd year LMD students of the department of computing during the academic year 2010/2011.They were chosen at random from 215 students. We chose this method because random sampling permits legitimate generalization from the survey results to the population of interest, according to Brown (2001:) "each individual in the population must have an equal chance of being selected", Which will enhance objectivity in research. The researcher selected 2nd year LMD students rather than the other academic years mainly because the students are somehow mature when compared to the 1st year students, they do not know a lot about the regime in the university, this place is considered as the transition phase between the secondary regime and the higher education. Unlike the university, in the secondary school students are accustomed to be given all the necessary information they need by the teacher. This led us to think of the 1st year students are not capable enough to know what is suitable for them and which is not. They will consider everything as new and good.University teachers need also to try and understand the differences between school and university, with particular regard to how they can best orient their students towards continued and enhanced learning in their first year of tertiary study.

Second year LMD students in the Computer Science Department, at Hassiba Ben Bouali university of Chlef, are divided into two groups, each group learns a specific specialty (option in Computing).One group learns (IA) "Intelligence Artificielle" which means artificial intelligence and the second one learns (WEB) "Technologie du WEB" that means WEB technology.

The general details that are taken from the administration of the Computer Science Department during the academic year (2010/2011) are as follow:

Number of students   : 169 divided into 02 groups (options)

(01)   ------------   114 Intelligence artificielle (IA)

(02)   ------------   56 (WEB)

They form 04 groups each group is divided into two (IA) and (WEB)

(IA)   114

Female 54 / male 60

- White year: 08 males

- Abandoned: 05 (04 males and 01 female)

- Excluded: 07 (03 females and 04 males)

(WEB) 56

Female 37/ male 18

- White year: 08(06 males and02 females).

- Abandoned: 04(03 males and 01 female).

- Excluded: 01 female.

1.11.English as a module in the Department:

Generally speaking ,This module provides a consolidation and extension of previous linguistic knowledge within the study and production of material of use on undergraduate programmes in the fields of computer science . It presents and practises key language structures, integrating them with strategies for communication.

The module will have a broadly technical / scientific focus and examine texts and academic conventions appropriate to this genre.

Learnig English as a module in this department makes the students become more autonomous and independent in thier approach to language learning and know how to use a wide range of resources to achieve this goal. It develops language and study skills to help them succeed on thier undergraduate programme.The listening skills, for instance is for greater understanding and better note taking in lectures; speaking skills for successful participation in seminars and discussion groups; reading skills for more

effective reading; referencing skills for selecting useful sources and using the library effectively; writing skills for effective academic assignments and exam answers.

According to the national curriculum, students study English as a compulsory subject. The administrators do not impose any kind of courses with regard to the curriculum; they only give the time table to the teacher, who is a part time teacher since the organization of this department, who will decide upon the courses referring to what he has already studied in the university. Thus, he is the one who "knows" what the students need and what they do not.

1.11.1.Time devoted to English in theComputer Science Department*:*

Algerian universities begin their academic year in October.They finish the first semester by February and the second semester by June till July.

Time-tabling of English, in the department of computing in the University of Chlef, is after a whole long day of studying, it is on Wednesday from 11:00 to 12:30 for (WEB) section, between 2 modules in the morning and one in the afternoon and on Thursday from 11:00 to 12:30 for (IA) section after other modules starting from 8:30 and at the end of the week. The module of English took a form of (CM) that is all the groups are gathered in one large room. The teacher usually passes the tendency sheet to the students to write down their names and put their signatures. This helps the teacher to supervise the students and calculate their absences, if any; because more than 3 unjustified absences for a student exclude him completely.

1.11.2.The English teacher of the Computer Science Department:

Since the beginning of this department teachers are recruited in order to give courses to computing students. Unlike the majority of other ''computing modules'' a "BA" in English or a license is enough to be accepted to teach there. They are not under supervision and cannot be required to use specific teaching methods. The teacher of English requires that students are to be taught the four skills (listening, speaking, reading, and writing) besides other skills like taking notes and doing oral presentation in a way that is at the reach of each student so they can improve across the whole range of skills. Teachers are asked to select items that are appropriate to

their students' grade or level. The teacher is a female non native speaker of English. She has BA in English obtained from the University of Chlef with teaching experience, consisting of 7 months in the University. She taught mainly scientific branches; computing, architecture and biology in the University of Chlef. She taught both English and French languages for them. Before she joined the university, she taught French and English for one year.

1.11.3.Teacher's Training:

The new approach to education increases the need to professionalize the act of teaching. The reform of the education system introduces several elements that will affect the role of teachers and the nature and significance of the competencies required to teach. Briefly, these elements are: increased autonomy for schools, an approach to learning that places the student at the heart of the learning process, a competency-based approach to the design of teacher training programs, multi-year cycles in schools, and the policy of adapting schools to the needs of all students.The new conception of learning that gives students primary responsibility in the learning process requires teachers to use new pedagogical approaches and ways of dealing with students. Teachers must adapt their teaching methods to the rate of progress of each student; they must focus on student-learners in order to redefine their relationship to knowledge and facilitate its acquisition.

In the absence of specialized institutions devoted to the training of teachers of foreign languages, each teacher relies on his own experience in deciding about the strategies and improves himself (if ever he does) individually. Observation shows that many Algerian English teachers teach just the same way they were taught.

1.11.4.The students and focusing on marks :

In addition to the absence of communication in the classroom, there is another entrave which is the system's concentration on grades as a measurement of success or failure.

According to Travis and Wade, this is among the factors that decrease the learner's intrinsic motivation:

> *"The fact that our school system relies heavily on grades may help explain why the average college graduate reads few books. Like all extrinsic rewards, grades induce temporary compliance but not necessarily a lifelong disposition to learn"(Travis & Wade 1997:232)*

This feature makes the learner concerned with exams and marks rather than the value he gets from what he is learning. It decreases his curiosity and thirst to learn things apart from the syllabus.By concentrating on marks, the weak pupils may cheat in exams.

Lastly, It transforms knowledge from a precious thing to be sought into numbers and scores.

1.12.Seminars and scientific meetings of the department:

Department of Computer Science and Information Technology in the University of Chlef contributes in hosting seminars and scientific meetings to inform faculty and students on what's new in the world of computers and information technology. It organized the fifth scientific days (les cinquièmes journées scientifiques), the 13th and 14th April, which they called the info days. This manifestation was an opportunity for researchers from different universities of Algeria to present their works related to different domains in computing, these works are discussed and the best articles are chosen to be published in the magazine of "Nature et Technologie". Competitions were organized between computing students and gifts were distributed.

1.13.The library in the department of computing:

For a long time, university libraries in Algeria, as their counterparts in developing countries, have consisted of repositories of old and obsolete materials,with few old titles of ceased journals.

Inadequate funding has led to poor quality holdings and renewal of journals has ceased with the so called « serial pricing crisis ». Moreover the public publishing sector, with its proper problems, cannot meet the demands of the growing number of students. Thus, library acquisitions have relied on imports mainly from Arab countries such as Syria, Egypt and Lebanon to support departments teaching in Arabic language and from France for the remaining departments teaching in French and

English.(Bendib,1986).University libraries have remained as public stores, with poor holdings and reading rooms used mainly by the students just before exams. University libraries consist of rooms with some shelves of more or less old books which do not even meet the curricula. They are run, when possible, for few hours a week by voluntary teachers. Even homeworks are ordered at cybercafés and final print-outs are handed over to teachers without having been studied. Academic and research library collections are built to meet the specific research and information needs of the institutions' academic and research programs. The effectiveness of library collections is measured by the extent to which they facilitate research activities and students' projects and assignments. Developing a relevant, up to date, balanced and usable collection is an important aspect of library services. There is an urgent need for libraries to become more virtual and digital. Sometimes the time table of the students does not allow them to join the university libraries and fetch the necessary books for them, for that reason and especially those students are inclined towards using the net and joining cyber café the foundation of a digital library will help students to find the books,articles and theses they need.

1.14.The learners needs:

Academic and research library collections are built to meet the specific research and information needs of the institutions' academic and research programs developing a relevant, up to date, balanced and usable collection is an important aspect of library services.the need for libraries to become more virtual.The teacher must also fight the following attitudes and beliefs towards EFL learning.For instance,the idea that English cannot be learned in state schools and only private institutions can provide qualitative education. The fact that students grew up with such a belief, cultivated by families for years, so it is not easy to change this idea .In adition to that , English is considered to be a secondary course, not examined in the Accreditation process after the end of the four semesters courses in the Institutes of Vocational Training .So,Why should the students spend time on such a course?

Moreover,The teachers are not properly qualified to teach ESP and are not interested in their needs.The students do not pay attention to the lessons.It can also be confirmed

that most student consider The ESP course as a fun time. Astudent can have a good command in English which may allow him to get the passing mark in the final exam. So, attending the course is of less importance.

Administration also considers ESP as a secondary course. Thus, there is a tendency to spend the budget on books and facilities necessary for other subjects but not for English. The projector for example, which is supposed to be shared, is used primarily by other subject teachers and never by the English ones, under the mutual agreement that the other subjects are the primary ones. Nevertheless, ESP teachers should find a way on how to solve these problems.

The researcher's experience, being an EFL teacher in the Institutes of Vocational Training, from the first time they were created proved the following:

- A careful course design and good preparation.
- Extensive informal discussions with the students regarding needs and interests
- Study of the whole curriculum of a specific speciality
- Cooperation with other subject teachers and administration.

1.15.Teaching Aims and Learners' Needs:

In the past, more stress was being laid on reading and writing the language and the speech ability was utterly neglected. It is said that for over a century of English teaching the teachers continued to talk about the language instead of talking the language. Talking the language is more important, as it acquaints the student with the correct form of speech as well as structures.

During teaching English the teacher lays undue emphasis on the one and neglects the other with the result of crippling some of the student's abilities. The teacher, therefore, should from the very beginning plan his lessons in order to achieve the desired objectives bringing about all-round development of the language skills. If the aims of teaching English are fixed clearly before him, each lesson will be a step forward to the desirable direction and facilitating gradual promotion and achievement of objectives without any of them being lost sight of or being unduly emphasized upon.

Most of the time, learners ask themselves: why do we learn such and such a thing?This question springs from the fact that they do not know the aims of the curriculum.They

come to the classroom to receive pieces of knowledge memorize them then give them back in the exams to move to the next year. They do not know what they will benefit from what they learn in their real lives. On the other hand, teachers do not know what their learners need to know. They do not even make efforts to know. Here the gap widens between the two partners who are supposed to work in collaboration to achieve success and development.

1.16.Conclusion:

In the previous chapter ,the different points that explains the learning situation, starting from the required conditions for the new baccalauriat holders to belong to this Department, with special focus on the situation of the department within the classic and the LMD systems,have been mainly discussed at the level of Computer Science Department,Hassiba BenBouali University,Chlef.In the following chaper, the development of ESP from different points of view within its origins,definitions and branches,will be discussed.In adition to the status of English in Algerian universities,the methodology and the ESP teachers.Furthermore,the definition of needs analyses and the need of a designing a course, will be treated.

Chapter two: Literature Review

2.1: Introduction:

In this chapter the researcher will review English for Specific Purpose and need analysis related literature, this will be via insights in previous writing and studies done by pioneers in the field and which have significance relevance with this research content. In the development of this chapter, the researcher will summarise the most prominent contributions related to the theoretical aspects concerning needs and needs analysis.

2.2: English for Specific Purposes:

A great change has occurred in the learning and teaching of languages. More and more, learners are interested in using languages because of some oriented purposes. To this effect, Hutchinson and Waters (1987) write:

> *"Previously the reasons for learning English (or any other language) had not been well defined. Knowledge of a foreign language has been regarded as a sign of a well-rounded education, but few had really questioned- why it was necessary."* Hutchinson and Waters (1987: 6)

This new tendency of learning a language is so popular that it attracts a large audience in whom we find different categories of learners. Designing an ESP course is by understanding students' needs. As Hamp-Lyons(2001:126) suggests:

> *"ESP begins with the learner and the situation, whereas General English begins with the language".* Hamp-Lyons(2001: 126).

E.S.P refers to the teaching of English for utilitarian purpose, which means studying English to use it in specific domains and workplace or training programs, e.g. for hotel and technical trades etc., or some academic or professional study e.g. engineering, medicine, law. Thus, E.S.P is an approach to language teaching based on learners' needs. Its foundation lies in the question why does this learner need to learn a foreign language? The teacher has to investigate the uses in which the language will be put, to determine accurately what these specific purposes are. Then the teacher is one step nearer being able to translate these needs into linguistic and pedagogic terms in order to produce and teach an effective course. When the needs are clear, learning aims can be defined in terms of these specific purposes to which the language will be put, whether it

will be reading scientific papers or communicating with technicians to determine the precise area of language required, skills needed and the range of functions to which language is to be put. ESP is being described as the teaching of English for any purpose that could be specified. Others, however, were more precise, describing it as the teaching of English used in academic studies or the teaching of English for vocational or professional purposes. Bruton, Candlin and Leather (1976a) studied the discourse of doctor-patient communication and applied their findings in specialist course design. This is one of the earliest examples of how analyzing the linguistic characteristics of the workplace could then lead to a specific purposes course. Robinson (1980) wrote a thorough review of theoretical positions and what ESP meant at that time. Coffey (1985) updated Streven's work and saw ESP as a major part of communicative language teaching in general. At first register analysis was used to design ESP courses. Register analysis was the focus on grammar and structural and non-structural vocabulary found in target situations within the ESP environment. The underlying idea behind register analysis was; that while the grammar of scientific and technical writing does not differ from that of general English, certain grammatical and lexical forms are used much more frequently (Dudley- Evans & St. John, 1998). A course in basic scientific English compiled by Ewer and Latorre (1969) is a typical example of an ESP syllabus based on register analysis. However, using just register analysis failed to meet desired outcomes. Thus new courses were designed to meet these perceived failures. Target situation analysis became dominant in ESP course design as the stakeholders and employers demanded that courses better meet their needs. Technical English (Pickett & Laster, 1980) was an early example of a textbook using this approach.

2.3: Emergence of ESP:

English for Specific Purposes (ESP) or English for Special Purposes arose as a term in the 1960's as it became increasingly aware that general English courses frequently did not meet learner or employers wants. Strevens (1977) says that the history of ESP goes back half a century. He goes further to say that ESP can be found in two forms mainly: the traveller's language course – which he says goes back to the 16th century - and what he calls the 'German for science students' type of course. Perhaps more interestingly, he continues by saying that the Second World War engendered the need for specialist

language courses where students only needed a very limited competence in a language in order to fulfil pre-set de-limited tasks. He gives the example of Royal Air Force personnel being trained to listen to Japanese fighter aircraft radio dialogue. The personnel were trained only in listening skills and with a very limited amount of lexical input. Thus the stage was set for the boom in this area that was to follow the Second World War.

Hutchinson and Waters (1987) mention basically three reasons that led to the emergence of ESP, the demands of a brave new world, a revolution in linguistics and learner centeredness. Today it is still a prominent part of EFL (English as a Foreign Language) teaching (Anthony, 1997b). Johns and Dudley-Evans (2001) state:

> *"The demand for English for specific purposes… continues to increase and expand throughout the world"*.Johns and Dudley-Evans (2001: 115)

The '*internationalism*' Cook (2001: 164) of English seems to be increasing with few other global languages i.e. Spanish or Arabic, close to competing with it.

Under the term of ESP numerous sub-divisions appeared like English for Academic Purposes (EAP), English for Business Purposes (EBP), English for Occupational Purposes (EOP), and English for Medical Purposes (EMP), and other sub-divisions yearly added to the list in accordance to various purposes. In Japan Anthony (1997) states:

> *"A rapid growth in English courses aimed at specific disciplines, e.g. English for Chemists arose"*. Anthony (1997: 1)

This is claimed mainly because teachers at many universities are given complete responsibility to design their own syllabi.

ESP has increased due to the pressure exercised by market, globalization and the focus on learners' needs and wants that should be met wherever possible among the academic and business community, Brunton (2009). ESP courses were designed to meet the learning gap that general English textbooks could not provide.

Belcher (2006, p.134) says that ESP includes:

> *"An ever-diversifying and expanding range of purposes".* Belcher (2006: 134)

This continued expansion of ESP into new areas has arisen due to the ever-increasing globalized world (Robertson, 1995). As our global village becomes smaller

so the transfer of resources, capital, goods, and information increases. Flowerdew (1990) attributes its dynamism to *"market forces and theoretical renewal"*. Belcher (2004) also noted trends in the teaching of ESP in three distinct directions: the sociodiscoursal, sociocultural (Mitchell & Myles, 1998), and sociopolitical. Kavaliauskiene (2007) writes on a new individualized approach to learners

> *"To gain each learner's trust and think of the ways of fostering their linguistic development".* Kavaliauskiene (2007, p.8)

From the outset, the term ESP was a source of contention with many arguments as to what exactly was ESP? Even today there is a large amount of on-going debate as to how to specify what exactly ESP constitutes (Belcher, 2006, Dudley-Evan & St. John, 1998, Anthony, 1997).

2.4: Post-war ESP:

Despite the long history it can be said that the ESP movement is placed in the second half of the 20th century. The rise of ESP can perhaps be seen as the result of two separate but related developments: economic and educational. The first reason for the development of ESP was the rise in the 'currency' of the English language. This was brought about by the economic dominance of the United States after the Second World War. The vast influx of US dollars into many countries around the world created with it as a by-product the need to communicate in English, mainly in the world of science and technology. As a result, a large percentage of journals and scientific data were to be found only in the English language. The second movement leading towards the rise of ESP was an educational one, where the learner was starting to be considered as more central to the educational process. Strevens (1977) notes the existence of a major *"tide"* in educational thought, in all countries and affecting all subjects The movement referred to is the global trend towards *"learner-centred education"*. (Strevens 1977:152).

2.5: Reflections on ESP According to Dudley-Evans:

In fact, it is Dudley-Evans in 1997 in Japan who sets out during one hour an extended definition in terms of 'absolute' and 'variable' characteristics. Basically, this definition is deeply influenced by Strevens's definition of 1988 but with modifications as what follows: Absolute Characteristics:

- ESP is intended to fit specific needs of the learners.
- ESP uses the underlying methodology and activities of the field it serves.
- ESP focuses on the language uses to perform these activities in terms of grammar, lexis, register, study skills, discourse and genre.

Variable Characteristics:

- ESP may be related to or designed for specific disciplines
- ESP may use, in specific teaching situations, a different methodology from that of General English.
- ESP is designed for adult learners, either at a tertiary level institution or in a professional work situation. Simultaneously, it can be for learners at secondary school level.
- ESP is generally designed for intermediate or advanced students.
- Most ESP courses assume some basic knowledge of the language systems.

This description clarifies a great deal what an ESP course constitutes of. Brunton (2009) argues that things, ideas and situations have changed dramatically since Dudley-Evans' definition was written and today many ESP learners are of below intermediate level. Maleki (2006) demonstrated that low English language proficiency of Iranian EFL students hindered their academic progress. He also claims that enough language proficiency is needed for university level ESP courses. Also it would be expected of all general English courses to meet the specific needs of learners.

Perhaps one of the main distinguishing characteristics is that all ESP (especially EOP) courses are carried out for a group of workers from one area of work. There are a series of other features of ESP that several authors have put forward. Belcher (2006), states that:

> "*ESP assumes that the problems are unique to specific learners in specific contexts and thus must be carefully delineated and addressed with tailored to fit instruction*". Belcher (2006: 135).

Mohan (1986) mentions that ESP courses focus on preparing learners "*For chosen communicative environments*" Mohan (1986: 15)

Learner purpose is also stated by Graham and Beardsley (1986) and learning centeredness Carter (1983); Hutchinson & Waters (1987) as integral parts of ESP.

Thus it could be argued that ESP from the outset focused on learner centered teaching, a situation that was certainly not true of traditional general English courses. As stated above however, this situation has changed dramatically in recent years. Lorenzo (2005) claims that:

> *"ESP concentrates more on language in context than on teaching grammar and language structures.'* Lorenzo (2005: 1).

Yet, grammar still plays an important and necessary part in an ESP course, Brunton (2009). Lorenzo also points out that as ESP is usually delivered to adult students, frequently in a work related setting (EOP), that motivation to learn is higher than in usual ESL (English as a Second Language) contexts. This area of motivation is also of interest in this research. Carter (1983) believed that self-direction is important in the sense that an ESP course is concerned with turning learners into users of the language. Thus ESP played an integral role in communicative language teaching.

Flowerdew (1990) points out that ESP has problems in establishing itself in a clearly defined area within ELT (English Language Teaching) in general because:

> *"Is that many of the ideas closely associated with ESP have been subsequently appropriated by the 'parent' discipline".* Flowerdew (1990: 327)

He exemplifies with functional/notional syllabuses which have been adopted into the process of language teaching. He also includes the example of needs analysis which traditionally distinguished ESP courses from general English course design. Also one of the main distinguishing factors of ESP from general English is the continued high focus on the learner. Not just at the beginning of a course but increasingly during a course as well.

2.6: ESP versus general English:

ESP (English for Specific Purposes) is as recognizable activity within the broader professional framework of English language teaching (ELT), with implications for the design of syllabuses and materials as well as its presentation and then evaluation. EGP (English for General Purposes) refers to contexts such as the school where needs cannot readily be specified. It is more usefully considered as providing a broad foundation rather than a detailed and selective specification of goals

like ESP. The definition of EGP is an unhelpful polarization, particularly because the meaning of —general purposes" is typically left vague. A more helpful view is suggested by Strevens, who prefers the term —English for Educational Purposes"(EEP) to account for a school-based learning of a language as a subject element within the overall school curriculum. Aside fro m the —rough separation" at definition level, there exists overlapping connection and proportion between them. To clarify their relations, Widdowson (1983) accounts for distinctive features of ESP and EGP; among them these are important ones:

EGP	ESP
• The focus is often on education. • As the future English needs of the student's are impossible to predict, course content is more difficult to select. • Due to the above point, it is important for the content in the syllabus to have a high surrender value.	• The focus is on training • As the English is intended to be used in specific vocational contexts, selection of appropriate content is easier (but note not "easy' in itself). • Therefore, an EVP syllabus need only have a high surrender value linguistic content in terms of the English foreseen to be most relevant to the vocational context. The aim may only be to create a restricted English competence.

Table2.1 ESP versus general English

These distinctive features do not imply absolute separateness", but they in turn reveal the true nature" of them, based on it one can clearly find the overlapping areas and keep track of GE in ESP. Much of discussion presented up to now were

brief and needed theoretical arguments regarding ESP and EGP.

Strutt (2003) in his introduction describes his textbook (English for International Tourism) as needing no specialized knowledge:

> *"It is not technical or over-specialized in nature.'* Strutt (2003: 4)

If writers' believe that their textbooks are not really specific or technical, then it becomes harder to describe using them as teaching ESP. The Language of Business English: Grammar & Functions (Brieger & Sweeney, 1994), what one might think of as an ESP textbook looks remarkably similar to any general English textbook using grammar as a means of structure. It is only that all examples are used within a 'business' context that separates it from a normal EFL textbook. Ellis and Johnson (1994) on listing several differences between business and general English then goes to say:

> *'We acknowledge that there are many situations where the distinctions are not so clear.'* Ellis and Johnson (1994: 10)

Donna (2004) reveals that business English *"has much in common with general EFL"* Donna (2004: 2), yet, Donna disputes that the purposes of a business English course are different, she focuses on students' and stakeholders' expectations and student's work as being different from general EFL classes.

In recent years all English courses are becoming focused on expectations of the learners' and output produced during the course, Wright (1992) described one of the differences succinctly; General English is concerned with everyday life these

> *"Universal topics are socializing, shopping, traveling, eating out, and telephoning friends……So when one learns a language, one must be exposed to linguistic items relating to these universal topics. This is the task of a general English course".* Wright (1992: 1)

A specific English course may contain material pertaining to a general English course but:

> *"When we reach the stage at which any topic constitutes an individual's profession, it becomes crucial that he have mastery of the specialized language pertaining to it".* Wright (1992: 1)

A simple distinction to make between ESP and general English is that ESP builds upon what has been learnt and studied in earlier general English classes.

2.7: ESP Branches:

The term "Languages for Specific Purposes" is actually an umbrella term that applies to several different categories of courses which differ according to the learner's needs. Johns (1991) provides the following model for instruction in English, one that is widely used in the US:

English for Specific Purposes (ESP)

English for Occupational Purposes (EOP)		English for Academic Purposes (EAP)	
English for Professional Purposes (EPP)	English for Vocational purposes (EVP)	English for Academic purposes (other than EST)	English for Science and Technology (EST)

Subcategories of English for Specific Purposes (ESP) English for Specific Purposes (ESP), therefore, encompasses two types of instruction: English for Occupational Purposes (EOP) and English for Academic Purposes (EAP). Courses in English for Occupational Purposes train individuals to perform on the job, using English to communicate. This type of course would be useful for airline pilots, for instance, or hotel staff who need English to perform their professional duties. English for Academic Purposes, on the other hand, features primarily a common core element known as "study skills" such as academic writing, listening to lectures, note- taking, making oral presentations, which enable one to succeed in English-language academic settings.

With regard to the main points that have been previously mentioned, it is important to notice that ESP is a strong movement which has imposed its influence all over the world, but still there are many things to do for its future development. This perspective of expansion presupposes that there must be a constant improvement of better or suitable programmes and courses, of effective teaching, of serious analysis

and of more consistent theoretical work in varied disciplines and, particularly, in human sciences.

2.8: The Training of ESP Teachers:

There are many higher educational institutions in Algeria that train EFL teachers in Algeria and which award degrees in EFL Teaching and Translation after four years of study. EFL curricula, however, do not cover the methodology of ESP teaching at tertiary level. Thus, a typical ESP teacher is a General English teacher who is employed to teach an ESP course. The university graduates become potential applicants for a job of English language teaching as a foreign language in secondary schools. Alternatively, these graduates can also apply for an eventual position in the department of English or other faculties such as Computing. However, it is important to note here that there is no official teacher training scheme at this level, either pre-or in-service, because these students are not supposed to be university teachers, except in the cases mentioned above. After finishing their post-graduate studies, these teachers are awarded a post-graduate degree (magister) and eventually a doctorate. This category of teachers can officially teach English in the department of English and is given full staff status.

2.9:The learning context :

One important feature of the learning context is that of time allocation. In effect, in the designing of a language course or syllabus, the question of how many hours are allocated to that teaching obviously has much to do with determining what level of attainment can be reached. For instance, in the Computing department only one hour and a half per week during is devoted to the English course for only the second and the fourth year students. The number of hours determines the level of proficiency and also the content of the course. However, one must bear in mind that the teaching can be extensive or intensive, as far as Computing science is concerned. The teacher needs to use the time allocated efficiently. If the number of contact hours is beyond the teacher's control, he must set his objective to what can reasonably be achieved in the time available. Thus the question of time needs to be closely linked to the statement of the objectives of any course as far as the case of the English teacher at the Algerian University is concerned,

"The objectives have been set for him and he has only a fixed, and often inadequate, amount of time to reach the objectives" D.A Wilkins (1974: 44)

In addition to that, most of the time, the session allocated in the time table is placed at the end of the day if not at the end of the week also. That in itself signals the importance given to the course and the poor expectation of both the Administration as well as the students. The rate of absence in the English course is naturally the highest.

2.10: Methodology in ESP Classes:

Another area of debate within ESP concerns the role of methodology. Widdowson (1983) has argued that:

> *"Methodology has generally been neglected in ESP"*. Widdowson (1983: 87)

However, today there are so many various courses under the ESP umbrella that it is impossible to discuss this question, clearly different methodologies have to be used according to the course design and goals and outcomes of those courses. The teachers within the ESP umbrella might change their style depending on the course taught. Wright (1992) believes:

> *"Methodology is also of crucial importance. Since ESP courses aim to develop linguistic skills relating to particular spheres of activity, not only the nature of the linguistic items introduced, but the ways in which they are introduced and how they are practiced, are highly significant"* Wright (1992: 5)

ESP in the Department of Computing is considered as a secondary course. This is proven by the fact that curriculum developers gave no particular attention to English for Specific Purposes and did not provide specifications for the course content, methodology, etc. The teacher is free to teach whatever he/she judges relevant. Another option is to teach grammar and syntax and possibly conduct certain discussions of general interest under the thought of improving students' structural and communicative needs. No communicative activities and techniques are used at the department of computing to teach English. The focus is on structure development. The conclusion is that grammar-translation methodology is still popular in ESP classes, which contradicts the communicative methodology.

The end product of these procedures is boring lessons, frustration and sometimes

provocative behavior done by students who talk to each other during the course or not paying attention to their teacher of English. As a result, the teacher, who may lacks of experience in teaching or feels stressed and helpless whenever he/she has a lesson. His/her self esteem as a professional is diminished and most of the times he/she quits the job, since it is a part time one and not so motivating financially.

2.11: Needs and Needs Analysis:

The fact is that any ESP course is needs driven is undisputable (Wright, 1992), and has an *"emphasis on practical outcome"*. (Dudley-Evan & St. John, 1998). state that needs analysis is and always will be an important and fundamental part of ESP It is:

> *"The corner stone of ESP and leads to a very focused course"*. Dudley-Evan & St. John (1998:1)

Dudley-Evan & St. John (1998) state that indeed needs analysis might have once been the corner stone of ESP but is now increasingly common for many EFL situations. Clearly course designers must have carried out a needs analysis, even unintentionally, when designing their courses. Holme (1996) believes that:

> '*ESP is simply a narrowing of this needs spectrum*.' Holme (1996: 3)

Kaur (2007) points out correctly though that it is not just general EFL courses that neglect needs analysis and describes the situation of Malaysia where:

> *"Many instances of ESP teaching and especially of course design are often ad-hoc and not entirely based on comprehensive needs analyses"*. Kaur (2007: 1)

Poon (2007) suggests a lack of time was a major factor in courses not being designed after systematic needs analysis was carried out. Although time is a major factor in an exclusion of a needs or deficiency analysis (whichof their target situation needs they lack or need to study more), money is also a major factor.

Clearly an in-depth needs analysis with an examination of target situations even for a small group of learners would cost several hundred dollars, a sum that many stakeholders with tight training budgets might balk at.

Needs analysis evolved in the 1970's Munby (1978). However, since the 1980's there has been debate if gathering expert and data driven objective information about learners is enough Tudor (1997). Nowadays there is increasing focus on looking at learners' subjective needs:

> *"Their self-knowledge, awareness of target situations, life goals, and instructional expectations"*. (Belcher, 2006: 136).

There is also an increasing focus on *"appropriate perspectives on language learning and language skills."* Far (2008:2).

Clearly the subject of needs analysis is fundamental to all English instruction today, and the key question is whether the needs analysis is carried out in a thorough manner, with all participants involved, or whether it is carried out in a haphazard fashion. We also have to look closely at perceived needs and wants and realistic or obtainable or desired wants. Clearly there will always be a tension and friction between the teaching triangle of instructor/s, students and stakeholders.

Certainly though ESP was a driving force behind needs analysis as Richards (2001) says,

> *'The emergence of ESP with its emphasis on needs analysis as a starting point in language program design was an important factor in the development of current approaches to language curriculum development.'* Richards (2001: 36)

There is another aspect of ESP courses that is debated widely, that is how broad or narrow a focus should the course have (Dudley-Evans & St. John, 1998, Flowerdew, 1990).

Should a course focus on subject area content exclusively and a set list of target situations or skills (narrow focus) or set out to cover a wider range of skills and target events (broad focus) perhaps even beyond the immediate perceived needs of the learners. Carter (1983) identified one type of ESP as English as a Restricted language. Clearly for certain types of courses, the focus can start or end up being narrow.

Kaur (2007) found that students were very happy with a narrow focus course as they felt no time was wasted during their course. However, Mackay and Mountford (1978) point out that knowing the restrictive language of their target situation would not enable them to function outside of that narrow context.

Students' perceptions can be misguided and only focused on short-term goals. This means that an adept instructor has to change those perceptions before or during a course. the term "need" means is understood in different ways with regard to the fact that many participants are involved in devising the ESP courses, namely the institution which organises the language courses, the language teacher, the learner/student, and in some cases the sponsor, the needs' analyst and the linguistic expert even when they are outsiders. According to Chambers (198026), there is a wide variety of definitions supplied by the dictionary. In fact, this word seems to carry both ambiguity and imprecision. It is also a term which is perceived as desires; it can cover a wide range of necessities, wants and lacks of something:

> *"It is fairly obvious that the term "need" is both ambiguous and imprecise…This terminological inexactitude has permitted a profusion of related but not identical items being commonly referred to as "needs" (usually with some qualifying adjective), requirements, or objectives and being treated as if they were more or less identical"*. Chambers (1980: 26).

Nevertheless, the main question is how it should be possible both to fit and to match the different appreciations in order to carry out an analysis which normally implies scientific rigour. For that reason, Chambers (1980: 25) puts it:

> *"The value of needs analysis may go unrealised unless establish different levels of needs, allotting some kind of priority It is necessary first to remove superfluous terminology, and second to establish different levels of needs, allotting some kind of priority between them."* Chambers (1980: 25)

Then, in terms of analysis especially analysis related to needs, in EFL, it is not an easy task to determine the levels of needs. For example, Robinson (1991: 8) quotes Brindley's statement in which he distinguishes between the objective and subjective needs of the learner. The first of these terms refers to needs which are derivable from different kinds of factual information about learners, their use of language in real-life communication situations as well as their current language proficiency and language difficulties. The second term refers to the cognitive and affective needs of the learner in the learning situation, derivable from information about affective and cognitive factors such as personality, confidence, attitudes, learner's wants and expectations with

regard to the learning of English and their individual cognitive style and learning strategies.It is also the case of Hutchinson and Waters (1987: 58) who see in needs three levels being defined as 'necessities', 'lacks' and 'wants' which are 'objective' or 'subjective'.One of the greatest contributions of English for Specific Purposes (ESP) to language teaching has been its emphasis on careful and extensive needs analysis for course design (John, 1991). Richards and Platt H. (1992) state that:

> *"NA is the process of determining the needs for which a learner or group of learners requires a language and arranging the needs according to priorities"*. Richards and Platt H. (1992: 242)

In doing this, they illustrate, needs analysts gather information about the learner in order to know the objectives for which the language is needed, the situation in which the language will be used, with whom the language will be used, and the level of proficiency required. In another definition of needs analysis, Nunan (1988) focuses more on the information-gathering process; he claims that:

> *"Techniques and procedures for collecting information to be used in syllabus design are referred to as needs analysis"*. Nunan (1988: 13)

Researchers have realized that it is not practical to attempt to teach the whole of a foreign language, as this will require more time and effort than is practically possible for the majority of learners and teachers alike (Maley, 1983). Accordingly, focusing on the reasons why learners need to learn the foreign language will better enable language teaching professionals to cater for their learners' specific needs and save a lot of wasted time and effort. The seminal work of Munby (1978) has led researchers, especially in the field of English for Specific Purposes (ESP), to propose various NA taxonomies and suggest various ways in which students' needs may be analysed like Hutchinson and Water (1987). According to Hutchinson and Water (1987), needs analysis started mainly in the field of ESP. Nevertheless, they argue that as far as needs analysis is concerned, there should not be any difference between ESP and General English (GE). They state that:

> *"It is often argued that the needs of the general English learner, for example the schoolchild, are not specifiable. . . . In fact, this is the weakest of all arguments, because it is always possible to specify needs, even if it is only the need to pass the exam at the end of the school year. There is always an identifiable need of some sort. What distinguishes ESP from General English is*

not the existence of a need as such but rather an awareness of the need". Hutchinson and Waters (1987: 53).

Similarly, Richards (1990) believes that:

> *"Most of the literature on needs analysis originally came from the realm of TESP but needs analysis procedures have increasingly come to be seen as fundamental to the planning of general language courses".* Richards (1990) cited in West (1994: 13)

In order to practically support this argument, Seedhouse (1995) presented an example of how NA procedures could be implemented in the GE classroom. These procedures enabled the researcher to improve the language teaching curriculum so as to suit his students'psychosocial needs, something that is much more sophisticated than providing students with a certain set of lexical items or grammatical structures. Consequently, it seems plausible to argue that any course should be based on an NA of the learners, as this is how the procedures of ESP could be beneficial to general English. This argument serves as a focal point for the purpose of this article. In the subsequent part of this paper, I will briefly introduce two NA taxonomies that should give the readers an idea of how NA has been approached and delineated by various researchers.

Under the general heading of need, Hutchinson and Water (1987) identify the following divisions:

Target Needs: they believe that target needs is an umbrella term that hides a number of important distinctions. They look at the target situation in terms of necessities, lacks and wants. Necessities according to them are:

> *"the type of need determined by the demands of the target situation, that is, what the learner has to know in order to function effectively in the target situation "* Hutchinson and Water (1987: 55).

Besides, the authors believe that identifying necessities alone is not enough and that we also need to know what the learner knows already, as this helps us decide which of the necessities the learner lacks. In other words, we need to match the target proficiency against the existing proficiency, and the gap between them is the learner's lacks. Moreover, learners' wants and their views about the reasons why they need language should not be ignored, as students may have a clear idea about the necessities of the target situation and will certainly have a view as to their lacks. Actually, this might be a problem as the learner's views might conflict with the perceptions of other interested

parties, e.g. course designers, sponsors, and teachers.

Learning Needs: explain how students will be able to move from the starting point (lacks) to the destination (necessities). Hutchinson and Waters (1987) claim that it is naive to base a course design simply on the target objectives, and that the learning situation must also be taken into account. They add that the target situation alone is not a reliable indicator, and that the conditions of the learning situation, the learners, knowledge, skills, strategies, and motivation for learning are of prime importance.

Hutchinson and Waters then offer a target situation analysis framework that consists primarily of the following questions:

Why is the language needed?

How will the language be used?

What will the content areas be?

Who will the learner use the language with?

Where will the language be used?

When will the language be used?

They also offer a similar framework for analysing learning needs that comprises the following questions:

Why are the learners taking the course?

How do the learners learn?

What resources are available?

Who are the learners?

Where will the course take place?

When will the course take place?

Finally, the researchers offer various ways for gathering information about the target needs such as: questionnaires, interviews, observations, data collection, and informal consultations with sponsors, learners and others. Starting from Hutchinson and Waters' (1987) classification of needs analysis, West (1994) suggests the following division:

Target situation analysis: it identifies the necessities, i.e. the demands of the target situation or, in other words, what the learners need to know in order to function effectively in the target situation.

Deficiency analysis: it is, as mentioned earlier, the gap between what the target trainees

know at present and what they are required to know or do at the end of the program. Other aspects of deficiency analysis investigate whether students are required to do something in the target language that they can not do in their native language.

 Strategy analysis: it mainly identifies the learners' preferred learning styles. Obviously the focus here is on methodology, but there are other related areas such as: reading in and out of class, grouping size, doing homework, learning habits, correction, preferences.

Means analysis: it is mainly concerned with the logistics, practicalities, and constraints of needs-based language courses. West (1994) points out that some analysts believe that instead of focusing on constraints, it might be better if course designers think about how to implement plans in the local situation.

 Language audits: this basically includes any large-scale exercise forming the basis of strategic decisions on language needs and training requirements carried out by or for: *"individual companies, professional sectors, countries or regions".* (West 1994: 12). West indicates that language audits may simply be used to identify and describe the current state of language teaching. Nevertheless, they may also be used to help a certain country or organization to formulate a new strategy based on the clients' needs that may take months or even years to implement. Finally, a good point regarding NA has been stated by Benesch (1996). She distinguishes between descriptive needs analysis (DNA) and critical needs analysis (CNA). DNA is mainly concerned with the description of the target situation so as to function as a basis for curriculum design and/or curriculum development. In DNA, thus, no attempt is made in order to change the status quo, and students are trained within the current state in order to fulfill the demands of the target situation. CNA, on the other hand, attempts to find ways that may modify the existing conditions and, consequently, aspire to change the target situation. Benesch (1996) states that the majority of NA in the fields of ESP/EAP is mainly descriptive. Another distinction has been endeavored by Sysoyev (2000) who prefers the term students' analysis to needs analysis. He states that the former does not only inform us of students' needs but it also acquaints us with other equally important factors such as: students' motivation, learning styles, field knowledge in the native/foreign language.

2.11.1: **Implementing Needs Analysis:**

As the research to date holds, the learners and teachers may have different needs. Robinson (1991) believes that needs analysts should be cautious in collecting information from various sources due to the multiplicity and diversity of the views on prerequisites for an ESP course. Three sources of precourse needs indicators were distinguished by Richterich and Chancerel (1987): students (their needs and proficiencies), students' employers, and academic organisation. West (1992: 12) maintains that 'Needs as interpreted by the sponsors may indeed conflict with the needs felt by the learner. Hutchinson and Waters (1993) holds that the relationship between necessities as perceived by a sponsor or an ESP teacher, and what the learners want or feel can be at extreme poles. However, he suggests that learners' perceived wants and wishes should be considered carefully, and due to objective and subjective reality of needs, each learning situation should be considered uniquely and systematically. Bearing in mind a wide range of needs due to the influence of different social and cultural factors on student's learning (Peck, 1991), a needs analysis is considered as a prerequisite in any course design (Richterich and Chancerel, 1987). According to Knox (1997), a needs assessment enables researchers to justify their assumptions whether or not potential educational needs are sound, to design a programme in terms of topics, materials so as to be responsive to the needs of participants. This can maximise the likelihood of students' participation. Finally such focus on satisfying learners' needs will help the learners to insist to learn and apply what they learn. Richards (1990) deals with this issue from the point of curriculum development, and he holds that the data to be collected from learners, teachers, administrators, and employers in the planning process will help to identify general and specific language needs and content of a language programme. Besides, it will provide data to review and evaluate the existing program. The research to date emphasises the significance of a needs analysis for devising a course, writing textbooks or course books, and the kind of teaching and learning that takes place Robinson (1991) Jordan (1997)). Yet it is recommended that a needs analysis should be carried out during the life of each course, Richterich and Chancerel (1987).

"As students become more involved with the course, their attitudes and approach may change". Robinson (1991: 15).

Therefore, identification and analysis of needs should be a continuous process Richterich and Chancerel (1987, Knox (1987). This can help both administrators and teachers to introduce necessary changes, if deemed necessary, so as to promote learners in their progress throughout the program (White, 1988).

2.11.2: Pedagogical Implications of Needs Analysis:

Implementing an academic needs analysis has a significant role in the identification and examination of needs for any educational institution. An ongoing needs analysis should be a Prerequisite for any programme/course design in order to achieve effective instructional outcomes. Besides this, it can help educators and administrators to gain awareness of the 'context variable' (Chaudron, 1990) and programme designers -to provide appropriate instructional input to foster effective learning. Concerning the fact that academic needs of administrators and educators, and students generally vary across time, the requirement of an ongoing needs assessment for any educational institution becomes crucial in order to promote effective teaching and learning. Bearing in mind that administrators and educators traditionally rely on their perceived academic needs in specifying learners' felt academic needs, more objective assessment is required for a more effective instructional design. Therefore, an empirical validation of academic needs is essential in order to get an objective state of affairs on these phenomena. An operational unit at language institutions can provide continuous objective and reliable data on changing academic needs of teachers and learners by administering questionnaires, interviews, and diaries to all the participants. It can suggest an overview, reconsideration and redesign, if deemed necessary, of the academic curricula in general, syllabus design and instructional materials construction specifically, to enhance an effective instruction and to ensure that the institution is always informed, as regards the changing academic needs of teachers and learners, to make its plans accordingly.

2.12: Course Design:

Curriculum development is another important issue in ESP. Bloor (1998) discussed issues related to ESP design similar to the work of Dudley-Evans & St. John (1998) who set out a detailed summary of ESP course design. Richards (2001) wrote a detailed account of the history of ESP course design. Xenodohidis (2002) states that

> *"The goals should be realistic; otherwise the students would be de-motivated".* Xenodohidis (2002: 7)

Certainly having clear goals is necessary for a course. Chen (2006) stresses the importance of an identification of a 'common core' of English language needs as well as a diverse range of discourse and genres to meet 'specific' needs. However, as back as 1980 Chitravelu (1980) spoke about having a 'core' of language in an ESP course. Anthony (1997) claims that:

> *"One of the main controversies in the field of ESP is how specific materials should be."* Anthony (1997: 3)

In this context he was talking about team teaching with a general English teacher. He argued that a lack of specificity from course books pushes the teachers to adapt them to suit the learners. Gatehouse (2001) shows that it is possible for general English to be successfully included in an ESP course. When designing a curriculum for ESP students in the field of EOP

(English for Occupational Purposes) learning tasks and activities should have '*a high surrender value'*, which means that the students would be able to use what they learned to perform effectively in their professions and field of interest, Edwards (2000). Designing the course based around this belief increases the students' intrinsic motivation which should aid their learning (Gardner, 2000, Walqui, 2000). McCarten (2007) pinpoints

> *"Making vocabulary personal helps to make it more memorable.'* McCarten (2007: 26)

ESP courses can have an advantage over general English courses. Today English instructors are aware of the importance of making all tasks and activities personal, thus again the line between ESP and general English has become blurred. Hutchinson and Waters (1987) believed that all decisions as to content should be based on the learners' rationale for learning. When designing a curriculum or syllabus Johns and Evans

(2001) suggest:

> *'That the students' target English situations have identifiable elements".*
> Johns and Evans (2001: 117)

Thus once the elements have been identified the process of curriculum design can proceed. However, many ESP courses today are delivered without a target situation analysis being carried out. Dudley-Evans and St John (1998) claim that:

> *"Materials need to be consistent and to have some recognizable pattern".* Dudley-Evans and St John (1998: 171)

In addition to that, materials have a very purpose-related orientation which Gatehouse (2001) believes is an essential component of any material designed for specific purposes. Having a clear purpose behind materials also promotes motivation (Dornyei, 2001a).

Gao (2007) summarizes related issues to ESP course design when dealing with ESP course for business students in China:

> *"When designing an ESP course, the primary issue is the analysis of learners' specific needs. Other issues addressed include: determination of realistic goals and objectives; integration of grammatical functions and the abilities required for future workplace communication, and assessment and evaluation".* Gao (2007: 6)

Researchers' attention shifts towards the issue of negotiated syllabi, they believe that if learners can state their wants and needs, then surely they can also help design their own courses. As Kaur (2007) says,

> *"When ESP learners take some responsibility for their own learning and are invited to negotiate some aspects of the course design.....they feel motivated to become more involved in their learning".* Kaur (2007: 9)

The teacher, anyway, has the final say in a negotiated syllabus if student choices are detrimental to their own learning. Williams and Burden (1997) set out a list of learning strategies and skills that teachers should develop in students' to enable autonomous to take place among them.

It should not be forgotten though that even a successfully designed ESP course may have a mismatch between skills. Therefore, the role of the teacher in an ESP course is undeniable.

2.12.1: The Role of ESP Teacher:

As ESP teaching is extremely varied some authors (Dudley-Evans and St John, 1998) use the term "practitioner" rather than "teacher" to emphasize that ESP work involves much more than teaching. ESP practitioner can have several roles.

The ESP practitioner as a teacher ESP is a practical discipline with the most important objective of helping students to learn. However, the teacher is not the primary knower of the carrier content of the material. The students, especially where the course is specifically oriented towards the subject content or work the students are engaged in, may know more about the content than the teacher. The teacher has the opportunity to draw on students' knowledge of the content in order to generate communication in the classroom. When the teaching is a specific course on, for example, how to write a business report, it is vital that the teacher adopts the position of the consultant who has the knowledge of communication practices but needs to "negotiate" with the students on how best to explore these practices to meet the objective they have. The relationship is much more of a partnership. In some situations the role of ESP teacher extends to giving one-to-one advice to students (e.g., in non-English speaking countries students will have to publish in international journals and need advice in both language and discourse issues).ESP teachers need to have considerable flexibility, be willing to listen to learners, take interest in the disciplines or professional activities the students are involved in, and to take some risks in their teaching. The ESP practitioner as course designer and material provider. Since it is rarely possible to use a particular textbook without the need for supplementary material sometimes no really suitable published material exists for identified needs - ESP practitioners often have to provide the material for the course. This involves selection of published material, adapting material if it is not suitable, or writing it. ESP teachers also need to assess the effectiveness of the teaching material used whether it is published or self-produced. However, since the teachers are encouraged by their employees to write new material there is a danger of constant re-invention of the wheel; advantages of published materials are ignored even when they are suitable for a given situation

Although many 'General English' teachers can be described as using an ESP approach, basing their syllabi on a learner needs analysis and their own specialist knowledge of

using English for real communication, many ESP teachers are using an approach furthest from that described above. Coming from a background unrelated to the discipline in which they are asked to teach, ESP teachers are usually unable to rely on personal experiences when evaluating materials and considering course goals. At the university level in particular, they are also unable to rely on the views of the learners, who tend not to know what English abilities are required by the profession they hope to enter. The result is that many ESP teachers become slaves to the published textbooks available, and worse, when there are no textbooks available for a particular discipline, resolve to teaching from textbooks which may be quite unsuitable. Dudley Evans describes the true ESP teacher or ESP Practitioner (Swales, 1988) as needing to perform five different roles which are: Teacher, Collaborator, Course designer and materials provider, Researcher and Evaluator. The first role as 'teacher' is synonymous with that of the 'General English' teacher. It is in the performing of the other four roles that differences between the two emerge. In order to meet the specific needs of the learners and adopt the methodology and activities of the target discipline, the ESP Practitioner must first work closely with field specialists.

One example of the important results that can emerge from such collaboration is reported by Orr (1995). This collaboration, however, does not have to end at the development stage and can extend as far as teach teaching, a possibility discussed by Johns et al. (1988). When team teaching is not a possibility, the ESP Practitioner must collaborate more closely with the learners, who will generally be more familiar with the specialized content of materials than the teacher him or herself.

Both 'General English' teachers and ESP practitioners are often required to design courses and provide materials. One of the main controversies in the field of ESP is how specific those materials should be. Hutchinson et al. (1987) support materials that cover a wide range of fields, arguing that the grammatical structures, functions, discourse structures, skills, and strategies of different disciplines are identical. More recent research, however, has shown this not to be the case. Hansen (1988), for example, describes clear differences between anthropology and sociology texts, and Anthony (1998) shows unique features of writing in the field of engineering. Unfortunately, with the exception of textbooks designed for major fields such as

computer science and business studies, most tend to use topics from multiple disciplines, making much of the material redundant and perhaps even confusing the learner as to what is appropriate in the target field. Many ESP practitioners are therefore left with no alternative than to develop original materials. It is here that the ESP practitioner's role as 'researcher' is especially important, with results leading directly to appropriate materials for the classroom.

The final role as 'evaluator' is perhaps the role that ESP practitioners have neglected most to date. As Johns et al. (1991) describe, there have been few empirical studies that test the effectiveness of ESP courses. For example, the only evaluation of the non compulsory course reported by Hall et al. (1986:158) is that despite carrying no credits

> *"Students continue to attend despite rival pressures of a heavy programme of credit courses".* Hall et al. (1986:158)

On the other hand, recent work such as that of Jenkins et al. (1993) suggests an increasing interest in this area of research.

As Robinson (1991) asserts, an ESP teacher or instructor should be flexible and any EFL teacher should welcome the opportunity to teach an ESP course as a chance to perhaps learn something new and increase their own knowledge span. Scrivener's (2005) comments on the role of the teacher:

> *"Go on teaching all the normal English you already teach in all the ways you know how to do already, but use lexis, examples, topics and contexts that are, as far as possible, relevant to the students and practice relevant specific skills".* Scrivener's (2005: 324).

2.12.2: Authenticity of materials:

Recently new debate has arisen as to the authenticity of materials within ESP. Although from the outset of ESP, the use of authentic materials was a fundamental concept. Authenticity was the main idea behind ESP exercise typology (Coffey, 1984). Bojovic (2006) believes that material should be authentic, up to date and relevant for the students' specializations. However, as Wang (2006) points out:

> *"Authentic materials are not automatically good materials or necessarily appropriate for learners and their specific roles".* Wang (2006: 2)

They can contain cultural and social knowledge which goes beyond learners' interpretation (Widdowson, 1990). Wang (2006) points out though, that authentic

materials can lead to increased motivation as they have a real communicative purpose because authentic materials have a prominent role to play in any English classroom and especially if possible in an ESP course. Wright (1992) thinks if the language level of the learners is low then authentic materials may have to be adapted; if their level is higher then "*the degree of authenticity becomes greater*" Wright (1992: 6).

The importance of selecting relevant authentic materials in ESP was set out by Dudley-Evan and St. John (1998). This has driven a need for instructors to evaluate their course books more closely to see just how suitable a match they are for their students.Evaluating materials for ESP is a vital skill which as Anthony (1997) states:

> *'Is perhaps the role that ESP practitioners have neglected most to date.'*
> Anthony (1997: 3).

Zhang (2007) set out a series of steps to evaluate materials used in class. Brunton (2009) evaluated a modern ESP course book designed for Hotel workers using these criteria. Ironically it is the very success of ESP that has given rise to this debate, and perhaps failure of recent ESP courses. Bookshelves are filled with a large amount of books designed for ESP students; this plethora of material thus reduces individual instructor's motivation to construct their own course content with a focus on the immediate learners' context and particular needs. Anthony (1997b) argues that:

> *'Materials writers think very carefully about the goals of learners at all stages of materials production.'* Anthony (1997: 3)

Clearly this will not happen when designing or using a generic assigned course book. Gatehouse (2001) believes that there is a value in all texts, but goes on to say that:

> *"Curricular materials will unavoidably be pieced together, some borrowed and others specially designed.'* Gatehouse (2001: 10)

Anthony (1997b) had a very negative view of teaching from ESP course books believing that teachers were often slaves to the book or worse taught from textbooks which were unsuitable. Wright (1992) arguing against textbook courses says:

> *'The scope of existing materials is often not appropriate to the needs of a particular group of trainees. Textbook courses are too broad or too narrow, too long or too short.'* Wright (1992: 9)

However, he acknowledges that the reason for ESP courses often using textbooks is that teachers do not get paid to design their own specific materials for a specific class of students. Toms (2004, p.3) strongly argued, especially against using a general

English course book for learners with specific needs stating that:

> *"The course book has an ancillary, if any role to play in the ESAP syllabus."* Toms (2004: 3)

Actually, teachers would want students to be able to talk about themselves and their lives along with an ability to read and summarize academic texts. A further argument for the use of general English in conjunction with specific English was put forward by Spack (1988) who found that academic students frequently had a problem with general English words. Skehan (1998) argued that using course books goes against all notions of learning centeredness with regards to the individual stating:

> *'The scope to adapt material to learner differences is severely constrained.'* Skehan (1998: 260).

If needs analysis has been carried out properly and students are given the chance to negotiate the curriculum with the instructor, then a good ESP instructor can indeed adapt written materials and make informed choices as to what material to include and what to leave out.

A needs analysis is a useful tool to investigate learners' reasons for learning language, but as Chambers shows it is not an easy task. The first step in such an analysis is the attitude to adopt towards the terminology which is implied when needs are associated to an analysis which should be, scientifically speaking, objective and accurate. The term "needs" is sometimes seen as necessities, wants, desires, and lacks. Therefore, to overcome this aspect of difficulty, Chambers sees in needs "priorities" which are established by needs analysis. These priorities will determine in reality the ultimate objectives to be fulfilled and the form, the ways and the functions to which the English language will be put.

2.13: Conclusion:

In this chapter we reviewed literature related to Needs Analysis, as the first essential step in designing any ESP course, and English for Specific Purposes. We discussed the main issues in course design and the authentic materials that the teacher uses when developing a course. In addition to that, we discussed the role of the ESP practitioner. In the next chapter, the researcher will present the sample of the study, the research tools, the results of the study and will analyse them.

3.1.Introduction

In this chapter results of the field work that is carried out at the Department of Computing during the academic year 2010/2011, are presented through tabulations. This aims at seeking information about students' needs in learning English for Specific purposes (ESP).

*The questionnaire is conducted to the teachers of English in the department.

*The questionnaires are designed and given to 41 students in the department of Computing. Only 21 papers have been returned.

Among the students of the Computer Science Department, a group of 41second-year students have been selected at random to answer a questionnaire that has been designed in order to investigate fourteen points.

Two main reasons have influenced the decision of selecting such a category of students. Firstly, they are mature enough to make an evaluation about their level of achievement in English. The second-year indicates that they have an idea about their needs. To that effect Robinson (1989: 398) states: "The students are normally adults, albeit young adults, rather than school children." While Kennedy and Bolitho (1984: 14) write: "In fact, many ESP learners are adults." Secondly, those students are concerned with the needs analysis that is presently conducted, and it is felt that their opinions must be taken into great consideration. In fact, they constitute one of the reliable sources of information. As Chambers (1980: 26) put it: "Richterich and Chancerel (1987) authoritatively suggest three separate sources of information: the student, the student's employer and the teaching organisation". Taking into consideration, the opinions expressed by the students can reveal that they certainly have specific aims in mind. Thus, Robinson (1989: 398) adds: "ESP students normally have such specific aims, an important element of ESP course design is the analysis of needs: finding out first what it is that students on a particular course need English for." Before dealing in details with the fourteen questions that constitute the questionnaire addressed to the computer science students, it is essential to emphasise the fact that a certain number of students either have partly answered the questionnaire or have left parts of questions unanswered Robinson (1991:12) mentions this alternative in the use

of the questionnaire: "the disadvantage is that not many people will bother to fill it and return it."

One can deduce with regard to the results which have been recorded that those students either have felt embarrassed to answer because of some particular points arisen for discussion or simply because they have not understood the questions. Nevertheless, whenever it is the case, the real percentage of respondents in this situation will be enounced for each question separately as it comes. Finally, the tabulations of the results have been operated only on the respondents who have completed the questionnaire.

3.2 The Teacher's questionnaire and analysis:

In this part the researcher will focus on the teacher's details, his qualifications and his training experiences in teaching English.

Q1: Status and Qualifications:

Status and Qualifications			
Part time	✗	**Licence**	✗
Fulltime		**Magister**	
		Doctorate	

Table 3.1: status and qualifications

Q2: Your degree

The table above shows that the entire respondent is a Part time teacher. It also shows that the respondent holds a license degree and consequently should not be able to tackle the ESP course with confidence.

Q3: Did you have any previous ESP training courses?

Yes	
no	✖

Table 3. 2: teachers' previous ESP training

The teacher did not have any ESP training during the Licence curriculum. This confirms our previous claim that English teaching in the department of Computing is not taken very seriously. Teachers are only holders of a Licence degree and are not well equipped in terms of training to teach ESP to students and achieve the required results. This leads us to conclude that all the future teaching problems could be easily related to the teachers' training which needs a total re-thinking.

Q4: English teaching experience:

Years in the Secondary school	**1**
Years at the university	**1**

Table 3.3: English teaching experience

This question overlaps with the previous one. It aims at providing a much more detailed description about the teacher's experience since starting teaching. Clearly mentioned, the teacher has had teaching experience of English in a secondary school. The teaching experience at the university level 2nd and 4th years.

Q5: How many hours are allotted to teaching English per week in the Computing Department? :

This question seeks information about the amount of time allocated to the EFL course in the Department of Computing.2 hours /week. Therefore, the respondent has to teach only 1h: 30 of English per week. However, 1h: 30 per week of teaching ESP in not enough, as will be emphasised later. This is a very important factor to remember as far

an evaluation of the EFL course, in terms of students 'needs and wants, is concerned. Consequently it can be understood that the above situation means that the teacher-student contact is limited and this must have an adverse effect on the students' attitudes towards the English language and their interest as a result. One of the possible explanations lies in the fact that, basically, the English language course is considered as an elementary subject by many students, as will be seen later in the students questionnaire.

Q6: What is the average size of each class?

This question seeks information about the average class size in each class. The reason for this question is to identify the effect of class size on the teaching-learning situation. The responses from the questionnaire showed that the majority of the classes fall into the size category of 20 to 30 students, suggesting overcrowded classes and their impact on teacher's tasks.

Q7: Use of any published textbooks:

Yes	
No	✖

Table 3.4: Published textbooks

The table above shows that the respondent does not use published textbooks when preparing their EFL courses. This reflects the teaching conditions in the Algerian universities which means the conditions encourage the teachers to produce their own teaching materials, and so respond to the student needs more effectively.

Q8: Do you have any special material designed for your students?

Yes	
No	✖

Table 3.5: material designed for students

This question overlaps with the previous one. The fact that the teacher does not use published textbooks also means that no specific teaching materials designed for computing students are employed. Again, these results verify the hypothesis stating that

the teaching conditions and practices are not adequate, which is reflected in all the responses already discussed.

Q9: Do the English teaching materials cover the needs of the entire course?

Yes	
No	✖

Table 3.6: Evaluation of teaching materials

This question seeks information about the crucial issue of this research, which revolves around whether or not the English teaching materials in use cover the academic needs of the entire course or not: This implies that no textbooks nor teaching materials are used, so, the needs of the entire course are not completely satisfied, a fact which we can see later in the students' questionnaire replies as well.

Q10: Classification of skills in terms of importance.

	Very important	important	Not important
Listening	✖	/	/
Speaking	✖	/	/
Reading	/	✖	/
Writing	/	✖	/

Table 3.7: classification of skills

This question deals mainly with the relative importance of each English teaching skill.

a) Listening and speaking skills: The teacher ranked these skills as very important. This is because of the importance of teaching materials such as audio-visual aids, which are the prime source of motivating interest in listening to English especially that all students deal with computers.

b) Reading and writing skills: Concerning these skills, it is clear from the table above that the respondent agreed that these skills are important, as far as their student's needs are concerned. The main reasons, students are required to read a considerable number of textbooks and research articles written in English. Most of the world's scientific and technical knowledge is in English.

Q11: Students areas of weakness:

Vocabulary	✖
Sentence structure	
Reading comprehension	
Grammar	
Writing and composing	
Speaking and conversation skills	✖
Scientific and technical English	✖

Table 3.8: Areas of students' weaknesses

This table presents the key areas of teaching activities. The area of students' weakness is dominated by vocabulary, Speaking ,conversation skills ,Scientific and technical English. These weaknesses are due either to the lack of a sound course basic or to the students' backgrounds in the English language in secondary school. This reflects the general lack of interest and motivation.

Q12: Do the following objectives describe the teaching English language teaching in the Department of Computing?

	Yes	No
Training to use Scientific and technical texts in English	✖	
Attending lectures and courses taught in English	✖	
Studying English just a part of their curriculum		✖

Table 3.9: Objectives of teaching English

These three questions overlap as they seek information about the objectives which best describe English language teaching in the department of Computing.

Concerning the first objective, it has been identified by the respondent , that means,it is seen as the main role of the ESP course, which is to train students to use English in Scientific and technical texts related to their special field of interest. For the second objective, it can be seen that the teacher thought that attending lectures and courses taught in English describe the teaching aims and objectives of the English course. As for the last objective, the teacher said 'No'. This explains the importance of teaching English in the department of Computer Science, because the basics of computing stand up on the learning of English.

Q13: Students' needs in English language teaching in terms of teaching activities: rank of communicative skills; 1 = most to 4 = least

	1	2	3	4
Understand lectures in their field of study in English		✖		
Take part in oral discussion in English				✖
Read textbooks in their field of study			✖	
Write answers to examinations questions	✖			

Table 3.10: Rank of communicative skills

This question concerns the students' needs in terms of teaching activities, i.e. the ranking of the communicative skills from 1 = most to 4 = least important, as far as students' needs are concerned, as determined by their teacher. The table shows that item n° 3 "read textbooks in their field of study» and writing skill were rated most highly. Therefore, all the respondents believed that Computing students' needs revolve mainly around teaching via special materials relevant to their interest, and training them to write correct answers for examinations, as the latter is compulsory.

Q14: Students' level of English when entering university:

Not enough	✖

Just enough	
More than enough	

Table 3.11: Students' level

This question seeks information about the students' level of English when entering University. It is clear that the students' level is not good enough when starting the English course; the teacher agreed about this point.

Q15: Do you work in collaboration with subject lecturers?

Yes	
No	✖

Table 3.12: Collaboration with subject lecturers

This question aims at collecting information concerning any collaboration the English language teacher has had with the computing subject teachers in the same Department. The table shows that it does not happen .Because there is only one English teacher in this department .The teacher gives research papers to the students and use dictionaries for difficult words. If any kind of collaboration that leads to a better organisation of the ESP course is encouraged by the teacher.

Q16: Use of translation into French/Arabic when teaching:

Table of results:

Always	Sometimes	Never
	✖	

Table 3.13: Use of translation

This question raises the point, whether or not the teachers used any translation into Arabic/French as an aid when teaching English. The teacher said 'sometimes'. It can be said that the teacher is obliged or judge it necessary to use translation in either of the two languages mentioned, as a result of the students' low level of comprehension of

lectures. The teacher believes that the use of translation in teaching EST facilitates their tasks and saves them a great deal of repetition and misunderstanding.

Q 17: How do you evaluate your students?

Oral tests	
Written test	
Both	✖

Table 3.14: Type of evaluation

This question seeks information about the type of examination. In fact the examination procedure in Algerian universities is generally the same, a mixture of written **and oral tests.**

Q18: What type of tests do you use?

A text with questions on it	
Multiple-choice questions	
Essay questions	✖
Others	

Table 3.15: Type of tests

The teacher agrees that students are examined through essay questions. This procedure has not been successful, it can be said that the students are used to texts with questions on it. They feel more confident with it and it can be better if it is the multiple choice questions because of their scientific field of study.

Q19: To reach the necessary standard in teaching ESP, do you think the students are given:

Table of results:

Just the right amount of time	
Not enough time	✖
Too much time	

Table 3.16: Teaching ESP in terms of time

This question seeks information about the minimum standard commitment in teaching ESP, in terms of time. The tables above shows that the teacher thinks that not enough time is given to the students to allow them acquire the appropriate standard in English. This has an adverse effect on the teacher-student relationship and, due to the lack of time, the students lose interest and their motivation diminishes accordingly.

Q20: How do the students find the content you present to them?

They like it	✖
They don't like it	

Table 3.17: Students' opinion about the content

This question aims at evaluating the content of the teaching materials presented to the students.The teacher feels that the content of the texts and other teaching materials they use is too high for the level of the students (which has already been seen as not enough when entering university (Q14).This point is significant, in the sense that there are no locally produced teaching materials, which have obliged the teacher to use other published materials, which are not tailored for the type of students we have in Algerian universities.

Q21: Do your students use computers at home?

Yes	✖
No	

Table 3.18: Students' use of computers

In this table, it is mentioned that all the participants use computers at home, because they have to since their field deals with computers.

Q22: What is the most important factor in the success of teaching English in your department? From 1(most) to 4 (least)

	1	2	3	4	5
Smaller classes				✖	
Adequate teaching facilities					
All students have well trained in secondary schools		✖			
Students are strongly motivated in learning English	✖				
Good teaching texts and materials are available			✖		✖

Table 3.19: the important factor in the success of teaching English for computing students

As it is mentioned in the table above, the teacher agrees that students are willing to learn English due to their strong motivation and needs.

Q23: Which of the following do you recommend your students to do in order to achieve a good communicative competence in the English Language?

Reading and reading comprehension	
General vocabulary	
Scientific or special vocabulary	✖
Listening comprehension	✖
Grammar	✖
Conversations	✖
Writing compositions	✖

Table 3.20: Students' activities to achieve communicative competence

This table shows the main recommended skills that should be done by students to achieve a better communicative competence in the English language. Mainly, the reading, listening, grammar, conversations and writing compositions are proposed for students.

Q24: Have you any suggestions for making the English course more effective and more relevant to the students' needs in their field of study?

Apart from the comment made in the previous issues, the respondent has another suggestion for making the English course more effective and more relevant to the students' needs in their field of study, which is to determine a special program for their special field of study.

The interpretation of each question separately has permitted to find out that many questions can be linked together forming groups related to specific items or points for discussion. The analysis of the English language teachers' questionnaire has permitted to highlight the difficulties encountered by those teachers in their work. Among these difficulties, one of them has particularly kept our attention; that is the increasing number of students every year. This factor negatively influences the work of the language teachers and affects their efficiency. Undoubtedly, the results of the language teachers' questionnaire pinpoint some areas in urgent need for solution.

3.3.Students' Questionnaire

Second year LMD Students of the computer Science department are divided into two sections: WEB Technology and Artificial intelligence. Among them, a group of 20 students have been selected at random to answer a questionnaire that has been designed in order to investigate fourteen points.

The main reasons that have influenced the decision of selecting such a category of students, is that they are mature enough to make an evaluation about their level of achievement in English. Being in the second year and making their own choices, indicates their capacities. In addition to that, those students are concerned with the

needs analysis that is presently conducted, and it is felt that their opinions must be taken into great consideration. In fact, they constitute one of the reliable sources of information. As Chambers (1980: 26) put it: "Richterich and Chancerel (1987) authoritatively suggest three separate sources of information: the student, the student's employer and the teaching organisation". Taking into consideration, the opinions expressed by the students can reveal that they certainly have specific aims in mind. Thus, Robinson (1989: 398) adds: "Given that ESP students normally have such specific aims, an important element of ESP course design is the analysis of needs: finding out first what it is that students on a particular course need English for." Before dealing in details with the fifteen questions that constitute the questionnaire addressed to the computer science students, it is essential to emphasise the fact that a certain number of students either have partly answered the questionnaire or have left parts of questions unanswered. Robinson (1991: 12) mentions this alternative in the use of the questionnaire: "the disadvantage is that not many people will bother to fill it and return it." One can deduce with regard to the results which have been recorded that those students either have felt embarrassed to answer because of some particular points arisen for discussion or simply because they have not understood the questions. Nevertheless, whenever it is the case, the real percentage of respondents in this situation will be enounced for each question separately at it comes. Finally, the tabulations of the results have been operated only on the respondents who have completed the questionnaire.

3.3.1. Analysis of the Questions

Question 1. Do you consider English important for your studies?- Yes - No

In order to know the importance of English for this kind of learners this question is aked. As Kennedy and Bolitho (1984: 6) point out: "Much of the demand for ESP has come from scientists and technologists who need to learn English for a number of purposes connected with their specialisms." On the other hand, this question suggests that it is possible to get a full appreciation of the motivation of the students related to English learning. According to Kennedy and Bolitho (1984: 15), this motivation

corresponds to the highest level of motivation that can be met in ESP students: "'Level One', the highest level, when English is required to obtain a degree or a desirable job or to get promotion." Roe (1977 cited in Kennedy and Bolitho, 1984: 15) write, this motivation is defined as "instrumental motivation (where English is seen as a means to achieving some practical or professional purpose)_"

Importance of English	N	%
Yes	40	97.56
No	01	2.43

Table 3.21: Importance of English

Table 3.1 indicates that 97.5% of respondents have answered "Yes" while 02.4% have answered "No". Since almost all the students have answered "Yes", one can conclude that English is very important for their studies, and so their motivation remains higher. Undoubtedly, this motivation has to be taken into account in terms of specified needs expressed by the students. Kennedy and Bolitho (1984: 14) assume that: "If it is possible to find out a student's motivation for learning English and match the content of the course to this motivation, the chances of successful language learning are increased.

Question 2. Do you have any professional activity in addition to studying? Yes –No

The question aims at identifying the learner put in his social environment. It is important to know whether the social environment affects his perception of the need for English. Robinson (1989: 404) mentions in her article Richterich and Chancerel's approach to needs analysis and writes: "Richterich and Chancerel's work takes more account of the human factor"_"and emphasises the importance in any language course of its context in society."

Aditional activities	N	%
Yes	13	31.7
No	28	68.29

Table 3.22: Additional activities

For the second question, 65.8% of respondents have answered "No" while 34.1% have answered yes. So, 65.8% of students are just pursuing their studies while 34.1%

both study and work.

Question 3. If yes, what is it?

a. part-time teaching at university.

b. teaching in secondary school.

c. working in a national institution

d-working in a private company.

e- others

options	N	%
Part-time teaching at the university	0	0
Teaching in secondary school	2	15.38
Working in a national institution	2	15.38
Working in a private company	4	30.76
others	5	38.46

Table 3.23. Nature of Additional Activities

The third table illustrates the results obtained at question 3.No choice has been made by students for the "Part-time teaching at university" option ;whereas 38.46% of the students' choices were for other activites;"working in a private company" has received 30.76%; "teaching in secondary school" and "working in a national institution" have got 15.38% of choices. The highest percentage shows that 5 out of 13 students favour other activites.It is interesting to see also that 30.76% of students work in their own company.

Question 4: Do you use any English in your job? - Yes - No :

The fourth question which is addressed only to the respondents who answered "Yes" to the second question tries to investigate further needs among the various EOP (English for Occupational Purposes) if any. Kennedy and Bolitho (1984: 4) state that: "EOP is taught in a situation in which learners need to use English as part of their work or profession."

Use of English in additional activities	N	%
Yes	7	70
No	3	30

Table 3.24: Use of English in additional activities

In the fourth table, the results show that 7 from 10 students answered with "yes" about their use of English in additional activities; one can notice that the second question, the third and the fourth ones are correlated together. The three questions have been stated in order to identify the student in his social environment.

It should have been interesting to know whether there is a present need and use of English for those who pursue occupational activities and to identify the requirements of the language imposed to a large extent by the society around.

Question 5: What is/are the skill(s) you have most concentrated on? (Please, classify in order of importance, giving 1 to the most important to 4 to the least important).

a- listening
b- speaking
c- reading
d- writing

The fifth question has focused on the skills, and one has to evaluate the emphasis allotted to each skill on the basis of needs expressed by the students themselves during the period of their studies. The question suggests that it could be one or more skills that are needed.

To that effect, Robinson (1989-402) stares:" Moving towards language, the analyst needs to know which of the four language skills are made use of".

Options	Rank1	Rank2	Rank3	Rank4
Listening	15 36.58 %	09 21.95 %	04 09.75 %	04 09.75 %
Speaking	09 21.95 %	09 21.95 %	10 24.39 %	03 07.31 %
Reading	05 12.19 %	08 19.51 %	11 26.82 %	08 19.51 %
writing	03 07.31 %	06 14.63 %	07 17.07 %	15 36.58 %

Table 3.25: Emphasis on the Skills

Reading the above table, it is seen in the first rank that the listening skill is laid more emphasis on (36.58%), followed by the speaking and reading skills (respectively

21.95% and 12.19 %) while only (07.31 %) is laid on the writing skill. In her work, Clark (1977: 152) assumes that the sums of the ranks are a convenient tool for a comparison between some options submitted to an ordered classification. This comparison is based on the following principle: the option with the least sum of the ranks is the most important and so forth.

Options	Sum of the ranks
Listening	61
Speaking	69
Reading	86
writing	96

Table 3.26: Sum of the Ranks

Table 3.5.2 is a tabulation of all the sums of the ranks, and it is interesting to notice a significant change where the respondents have stated three skills as being the first priorities, respectively "Reading", "Speaking" and "Listening". The writing skill is the least favoured.

Bar graph 1: Emphasis on the Skills

Figure 3.1, mentioned above, is another clear representation of the emphasis of the skills and summarises the results that have been recorded. Hence, it is clear that there has been much demand on three skills (listening, Speaking and Reading) whereas the writing skill less demanded.

Question 6: Would you say that, at the present time, your level in

English is:

a. very low ?

b. low ?

c. good ?

d. very good ?

The sixth question is seen as a means to assess the students' level in English at the present time with regard to the language learning that has been achieved during their studies in a successful or an unsuccessful way. In this question, the students have been asked to make an evaluation about their own level because their personal opinion is worth considering.

The aspect of level which is questioned here involves the linguistic skills and abilities acquired by the students in agreement with their needs of the language in their specific field. Thus, Robinson (1989: 396) puts: "Many students all over the world are studying technical or academic of the English language must be such that they can reach a satisfactory level in their specialist subject studies.

options	N	%
a	6	14.63
b	20	48.78
c	13	31.70
d	2	04.87

Table 3.27: Students' Evaluation about their Level in English

Table 3.7 sums up the results recorded in the sixth question Respectively, 48.78 % of the respondents have selected the option "b" while 31.70 % have preferred the option "c"; "a" and "d" options have reached the least score,14.63 % for option "a» and 04.87 % for option "d" . This evaluation is significant because it is achieved at the end of the compulsory English syllabus (two years). If such results are seen, this may indicate that a great number of students are still facing lacks in English from the very beginning of their studies.

Question 7: If you still find difficulties in using English, what are the aspects of

English you find most difficult? (Please, classify by order of difficulty giving 1 to the most difficult, 2 to the second most difficult down to 5 for the least difficult.)

a. grammatical structures related to general English?

b. lexical items related to general English?

c. grammatical structures related to scientific and technical English?

d. scientific words and expressions written in English?

e. lexical items related to Computer Science?

In the seventh question, the students are asked to make an evaluation about the present state of their attainments of the linguistic code of English. The five main options which appear in the question have been proposed on the basis of informal interviews and discussions with the students. To that effect, Robinson (1991: 23) states that: "The nature of the relationship between context or domain and the learning and use of the language is clearly vital to ESP and highly worth investigating." On a sample of 41 students,31 have answered this question.The rest was unanswered. This problem has been previously mentioned being one of the disadvantages of the questionnaire. This may be due to the form of certain questions engendering either a lack of comprehension or perhaps an unwillingness to answer them. Perhaps it may be that their difficulties are of another type which has not been identified yet. The results are summarised in table 8.1 where each cell indicates the score and the percentage of the corresponding rank in the choice operated by the students. Thus, for example, the option "Grammatical structures related to general English" has been selected 4 times (16%) in the third rank (rank3).

options	Rank1	Rank2	Rank 3	Rank 4	Rank 5
A	05 16.12 %	01 03.22 %	02 06.45 %	06 19.35 %	13 41.93 %
B	00 00 %	02 06.45 %	08 25.80 %	16 51.61 %	05 16.12 %
C	09 29.96 %	03 09.67 %	15 48.38 %	05 16.12 %	03 09.67 %
D	13 41.93 %	13 41.93 %	01 03.22 %	02 06.45 %	02 06.45 %
E	10 32.25 %	05 16.12 %	03 09.67 %	00 00 %	10 32.25 %

Table 3.28: Evaluation of the Students in their Present State of English

Reading the results, one can consider only the scores or percentages of the

classification of the different options at the first rank. Thus, the first column (rank1) emphasises the different aspects of difficulty met by the students. The main difficulty is met in "Scientific words and expressions written in English"; the second most difficult aspect concerns the "Lexical items related to Computer Science" and the third most difficult deals with the "Grammatical structures related to scientific and technical English". The first two options, namely "Grammatical structures related to general English" and "Lexical items related to general English", appear to be causing fewer problems to the students. Obviously, there is a clear gap in the aspects of the language that can cause most problems to the students. Thus, moving from general to specific English seem to be causing most problems perhaps indicating a poor command of the language related to the subject-specific content.

It is possible to use another statistical method -the sum of the ranks to analyse the results that are listed in table 3.8.1. It consists in calculating the sum of the ranks of each option; that is, the weighted sum of each row.

This procedure has produced table 3.2.9 as follows:

Options	Sum of Ranks
Grammatical structures related to general English	102
Lexical items related to general English	117
Grammatical structures related to scientific and technical English	95
Scientific words and expressions written in English	60
Lexical items related to Computer Science	83

Table 3.29: Sum of the Ranks (SR)

The most difficult option corresponds to the least sum of ranks and the least difficult option corresponds to the greatest sum of ranks. Table 3.8.2 shows that the most difficult aspect of English according to the students is the "Scientific words and expressions written in English".

"Grammatical structures related to scientific and technical English" is the second most difficult aspect of English. At the third level "The lexical items related to computer science" option appears. Finally, "Grammatical structures related to general English" and "Lexical items related to general English" are considered by the students as being

aspects of English causing less problems.

Question 8: How would you describe your attitude towards English language learning at the beginning of your studies?

a. favourable?

b. unfavourable?

The ninth question has been added in order to make an appreciation of the attitude of the students towards English learning at the beginning of their studies. Kennedy and Bolitho (1984: 16) mention that: "Attitude to an ESP course may be influenced by a student's previous learning of English."

options	Number	%
a	33	80.48
b	08	19.51

Table 3.30: Student's Attitude towards English Learning

According to the results recorded in table 3.9, 80.48 % of the respondents have expressed a favourable attitude towards English learning while 19.51 % have not. Considering what has been stated by Kennedy and Bolitho quoted above, one may deduce that there could be alternative ways to justify the attitude of the students in terms of needs For instance, those who have expressed a positive attitude towards English learning might have acquired a valuable experience in their English because of the specificity of their subject discipline. According to Kennedy and Bolitho (1984: 135), «A learner is bound to approach an ESP course with heightened expectations." If this is not the case for the other 19.51 % who have showed a negative attitude, it may be explained by unsuccessful previous English Learning or perhaps by the feeling that English learning is not an absolute necessity.

Question 9: Do you find the number of hours provided for English learning:

a. too much?

b. sufficient?

c. just reasonable?

d. not sufficient?

The tenth question has focused on the students' perception of learning needs related to the period of time in which this learning has taken place. Most needs analysts, in fact, consider that time is an essential factor which must be taken into account when conducting an ESP course. Robinson (1989: 398) expresses this fact in: " ・ SP courses are normally constrained by a shortage of time." Thus, in the question, four options have been proposed in order to obtain a valuable appreciation concerning this main point.

options	Number	%
A	05	12.19
B	09	21.95
C	10	24.39
D	17	41.46

Table 3.31: Students' Opinion about English Learning Period

Table 3.10 summarises the results that have been obtained for the four options. The distribution starts from the least percentage for the first option up to the highest percentage for the last option. This increase in the percentage is seen as such: 12.19 % for the first rank, 21.95 % for the second rank, 24.39 % for the third rank and finally 41.46 % for the fourth one. It indicates clearly that a large proportion of the sample think that the number of hours provided for English learning is not sufficient if not, just reasonable.

Question 10: At the present time, do you use books/documentation in your own field printed in English?

options	Number	%
Yes	22	53.65
No	19	46.34

Table 3.32: Use of Scientific Books Written in English

On the basis of the results shown in table 3.11, we notice that 53.65 % of the respondents have answered "yes" whereas 46.34 % have answered "no". The difference between the percentages seems to indicate that a majority of students use specific documentation written in English. In fact, reading documentation in English is

seen a source "providing access to technology and science" (Kennedy and Bolitho, 1984: 11)

Question 11: If yes, what percentage of books or documentation printed in English do you approximately use?

a. 25%
b. 50%
c. 75%
d. 100%

options	N	%
A	11	50
B	08	36.36
C	03	13.63
D	00	00

Table 3.33: Percentage of Use of Books Written in English

The results recorded on table 3.12, show that 50 % of the students have taken the option "a", while 36.36 % have preferred the option "b", for the option "c" the percentage of students is 13.63%.But the last option has been left (0%). The highest percentage appears in the option "a", which expresses a use of specific books written in English but in a very reduced amount.

Question 12: Do your Computer Science teachers encourage you to use specific documentation written in English?
- Yes
- No

options	N	%
Yes	26	63.41
No	15	36.58

Table 3.34: Use of Scientific Documentation Written in English

Concerning the use of this specific documentation written in English, we notice that the option "yes" has received 65.7% of answers when the option "no" has received 34.3%. In the specific field of the students, the use of books written in English can have some advantages, among them understanding and transferring science and technology advances.

Question 13: If yes, what are the objectives of the use of this specific documentation?
a. to develop your knowledge in relation with the whole programme of Computer Science.

b. to write summaries/essays according to Computer Science teacher's instructions (for a TP for instance).

c. to prepare Computer Science examinations.

d. others (please specify).

options	N	%
A	18	43.90
B	12	29.26
C	09	21.95
D	02	04.87

Table 3.35: Final Objectives

The results that have been summed up in table 3.14 state that 43.90 % of the students use specific texts written in English to develop their own knowledge of specific subject; whereas 29.26 % of them use specific documentation to write or summarize essays according to Computer Science teacher's instructions. The option "c" has received 21.95 % while only 04.87 % for option d. Among the objectives that have been listed, it is the one of knowledge transfer through reading which interests most students. Then consulting books written in English for writing summaries or even a 'mémoire' constitutes a valuable but difficult enterprise for a second-year student. Kennedy and Bolitho (1984: 71) put: "EAP groups at any level are certain to need reference or library skills. They will need to know how to use the catalogues in a library, how to look up topics in an index, how to get the best out of a bibliography, how to use dictionaries, encyclopedias and other works of reference. A student may be given a project or assignment in his special subject. He may well have available a list of recommended reading, some of which may be appropriate for his project". In reality, what is written and submitted to evaluation may determine success or failure. Furthermore, Kennedy and Bolitho (1984: 70) assume that: "It is important to define a reader's purpose in coming to a text as this will dictate the skills and strategies to be adopted by the reader and the level of comprehension he is operating at". The option "d" has been proposed as the last instance to encourage the students end the list of the items. Unfortunately, only two of them have mentioned but without precision, thus nothing has been added to enlarge our comprehension of some final objectives.

Question 14: At the end of your studies, and in relation with your acquired knowledge of English, you have become able to:

A-listen to lectures in English.   – Yes - No

b-speak English fluently.   - Yes   - No

c -read general English easily   - Yes - No

d -read scientific English easily.   - Yes   - No

e- Write English correctly.   - Yes - No

f- Listen to conferences/talks presented by experts in English.   - Yes   - No

g- Exchange views with foreign experts in formal and informal situations.   **Yes- No**

h- Write reports on Computer Science in English   - Yes   - No

I- Find a job where English is required.   - Yes   - No

J- Conduct further research.   - Yes   - No

options	Number of "YES"	Number of "NO"
a	27 65.85 %	14 34.14 %
b	18 43.90 %	23 56.09 %
c	30 73.17 %	11 26.82 %
d	24 58.53 %	17 41.46 %
e	20 48.78 %	21 51.21 %
f	20 48.78 %	21 51.21 %
g	18 43.90 %	23 56.09 %
h	26 63.41 %	15 36.58 %
i	25 60.97 %	16 39.02 %
j	23 56.09 %	18 43.90 %

Table 3.36: Level of achievement reached

Table 3.15 can be read on the principle of the highest percentage summed up for the

yes-answers. It is noticed that 75% is obtained for option "i"; 71.43% for option "a"; 67.86% for option "c"; 60.71% for both options "d"; 57.14% for option "e"; 46.43% for option "a"; 42.86% for option "b"; 35.71% for options "g" and "j"; and, finally, 28.57% for option "f".

evaluation of the target objectives

Bar graph 2: Abilities in the Use of English

- a: Listening to lectures presented in English

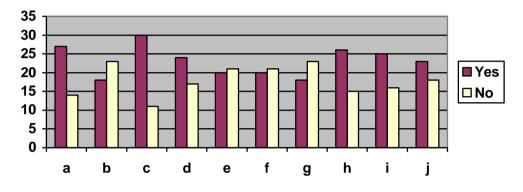- b: Speaking English fluently

- c: Read general English easily

- d: Read scientific English easily

- e: Write English correctly

- f: Listen to conferences/talks presented by experts in English

- g: Exchange views with foreign experts in formal and informal situations printed in English.

- h: Write reports on Computer Science using documentation

- i: Find a job where English is required

- j: Conduct further research .

The results expressed in figure 3.4 illustrate in a clear way the answers provided about the different abilities expected from the students at the end of their studies. Thus, options "b", "g", "f" and "j" indicate that some of the necessary abilities in performing either general or scientific English are not even partially developed. Furthermore, option "h" indicates a potential lack for students interested in further research (in post-graduate studies, for instance). Perhaps, the only positive aspect is seen in option "i"

because it seems that finding a job where English is required cannot be a difficult task for most students. As a conclusion, this question has been resourceful in terms of target needs as enounced by Hutchinson and Waters (1987: 55-62). The results of this particular question would reinforce our opinion about seeking what is the best for the student's interest in a process where the learner is the centre, where"Everything starts from him and everything goes back to him" (Robinson, 1989: 4).

The analysis of the students' questionnaire has helped us to discover lacks and wants perceived by the students, especially in the answers provided for the seventh and the eighth questions. It let us think that not only the intermediate objectives but also the final objectives have not completely been attained.

3.4.Observation

Observation can be defined as a process in which observers study some real-life situations and record significant events. It aimed at evaluating the behavior of the individuals in controlled and uncontrolled situations. Observations can be used to collect information for research studies and data analysis. The observations should be made by qualified people with controlled objectives for each set of observations. The observations should be made in settings that will not influence the conduct of the observations or contaminate the observations in any way. Discussions with a specific group of people can provide valuable data to researchers.

3.4.1The importance of observation

Observation is considered as a direct method for studying various aspects of human behavior.Observation gives the researcher the opportunity to record events at the time of occurrence.There are cases when observation is not totally reliable especially when the participants may intentionally attempt to exhibit artificial behavior when he/she knows that he/she is being observed. For that reason the researcher

attended the courses along the 2 months to avoid any kind of intended behavior. Besides, it is time consuming and costly.

3.5.General Stages in the Process of Observation:

3.5.1.Planning for Observation:

Planning for observation includes definition of specific activities of the study to be observed; the nature the participants; the aim of observation and determination of the length of each observation period.

3.5.2.Execution of Observation

The execution of observation includes:

Appropriate arrangement of specific conditions for the participants under study.

Suitable role and physical positions for observing, focusing attention on the specific characteristics of behavior under observation and recording every tiny and crucial component.Making the observation and recording the facts.

3.5.3 Analyses and Reflections on the Results:

After the agreement that took place between the teacher and the observer/researcher the latter started joining the courses along 2 months.

The main questions that the researcher used to guide her reflection and note-taking were the following:

*What do the students like to do and not to do most in the course of English?

* How do those students with high English proficiency and those with low English proficiency practice in class?

*What are the skills that the students usually participate in?

*Are they happy to come to the English course? Do students feel stress free?

*Is the class a teacher- centered one or a learner- centered one?

3.6.The class observation:

The class was carried on in a large room that contained tables gathered in 4 rows with a desk for the teacher at the front and a white board.the situation of the class, the shape and the way of students'sitting,play a big role in motivating students to learn and

the teacher to teach.Moreover,forEnglish language,laboratories are more convenient for a better understanding and good results.

3.7.The Teacher's Observation:

Along the period of observation, the teacher usually come on time.She always had an informal discussion with her students, either in English or in French before starting the course.She uses only texts and topics related to the field of computing which is the specialty of students. In other words, the teacher together with the students discussed only computing related matters.She always explains and talks into English and never use their mother tongue as a tool for more clarifications. To help students' understanding, she repeated, rephrased, modified, and gave French translations. In order to make sure that students understand her directions or questions, she often circulated and talked to students individually after giving instructions to all. If she received no answer, and generally she did not receive, the teacher pointed students to answer.The teacher asked the students to answer calling them by their first names and insisted on some to answer.The teacher did not get much verbal reaction. Even when the students responded, their voice was very low and could hardly be heard.

The teacher tried to motivate students to answer regularly,this was by simplifying the question to make it clearer.She tries to establish a learner-centered " atmosphere", with the belief that class should be student-centered and interactive

This is by giving the word to students to answer or to state their ideas, work in groups on one similar topic and even she asks them to write on the board activities or the answer that they give. Yet, it is often a teacher-centered because the students are "passive recipients" especially when they refuse to answer.The teacher needed to remind them to concentrate on the course frequently.She encouraged students to speak; sometimes she asked them to express themselves even in French.She refused collective answers and encouraged each student to participate individually; in order to know the level of each student, on one hand, and to allow them to have the habit to use English and to cope with their errors.The supervision of the teacher is very important especially for unmotivated students. There was a need for smaller classes and more scheduled time.

The teacher taught only terms and not expressions or real situations. The students' silence obliged the teacher to use grammar translation method frequently.

3.8.The Students' Observation:

They rarely answer willingly.The main "activity" that they prefer is that when the members of the group, who were presenting, were speaking, not because they listened to them and took notes as it normally should be, but because it was an opportunity for them to discuss and do other things.Students with middle proficiency in English usually speak in class, express their ideas, negotiate with the teacher and enhance themselves in various activities. Among those students a holder of BA in English, the others studied English the same as the others; apparently they are good in English. However, students with low proficiency in English ten to keep silent all the time refuse to read or to speak if asked by the teacher and if they answer they speak in a low voice, incorrect English, and in most of the times they speak in Arabic.

In most of the times, when the students enter to the class, they looked stress-free and we can say happy (friendly teacher and not important module), but after, around half an hour, they looked tired and bored (they keep looking to the clock and do other activities to make the time passed quickly)……this pushed us to think of an other way of teaching. We suggest adding the number of hours e.g. at least 2 times a week in each session 1 hour and a half, Apparently, students like best writing in a way that they just copy what is written on the board. Besides, they do not have the skill or the habit to note-taking. In fact, the silence of the students all the time was a hindrance for the researcher to decide upon which skill the students prefer, hence, all decisions are possible.The students seemed to be curious about the text the teacher asked them to read. They enjoyed reading it silently but they became anxious after she asked them to read the passage loudly in front of their classmates.

The less motivated students would follow the teacher's instructions while she was beside them, but they were distracted after a while.
They concentrate on the lesson just when they are supervised.
Less motivated students needed regular supervision.

Some students were very interested in the course even if they need more motivation to study.

Students who sat at the front, usually, concentrate better than those who sat at the back. This can be owing to the fact that those at the front are closer to the teacher which is not the case for those at the back, unless the teacher was walking beside them. We suggest that the shape of the arrangement of the tables should be re-organized to fit both the learners and the teacher.

When they were reading the passage, the students' pronunciation was to a given extent so weak and they can not pronounce all the words from that passage. They even pronounce English words as French ones. Students' chat among them was so notable and took to much time in the course.

The students tend to sit at the back to escape the teacher remarks and questions. Seemingly, low proficiency students did not speak aloud (in the academic context) because of the lack of confidence in speaking English in front of the teacher or the other students.

Less then 10 students were, to a given extent, highly motivated when compared to others.

Giving collective answer was a sign that the students lack self confidence when asked to form coherent sentence and say them for the others. (Weakness in forming sentences and in speaking).

In more than one occasion they express their positive attitudes towards the use of technology in classroom and they were curious about it.

Those students with middle proficiency in English are both males and females, but they are very few.They lack the skill of presenting an expose in English orally.

Among the critical characteristics of the oral presentations were that the teacher was the only one who concentrated on the content of the project, which was not the case for the other students who did not take notes, noisy the teacher followed the high school way of teaching which is not the case for students at the university level.

3.9.The Lesson Observation:

The use of textbook is very important in class, yet, it is not the case here in this course (it is the case in all departments and modules). Then again, both teacher and

students did not use it. Choices are left for the teacher to select what she perceived to be beneficial for the learners.

Students and teacher generally did not follow any guidelines in the process of teaching and learning.In-class activities include reading passages, answering questions, look for the meaning of words and do oral presentations.

In general, the main topics that were discussed are related to computing field.

3.10.Summary of the Courses Description:

In this section, we are going to describe,briefly,the main characteristics of the courses that the researcher attended along two months.

Starting from the first course, it was the same as the preceding courses, in which the teacher suggested a passage to be read and discussed via different activities about it. It was usually related to the field of computing. The lesson observed was on Wednesday from 11:00 to 12:30 am. The students, the four groups, met in large room consisted of tables gathered in 4 rows, white board and the desk of the teacher at the front in the left side. The number of attendants usually ranged from 17 to 22. The teacher greeted the students and introduced the content of the lesson. Then, she distributed the texts, only, typed on handouts i.e. without the tailored activities and devoted 10 minutes to read the passages silently. After silent reading, she recommended that some students read one by one the different paragraphs to the others. The major tasks of the lesson were to help students read passages, answer questions, recognize whether the statements are true or false and acquire new special terms related to computing. The teacher explained, asked questions, clarified ambiguous words, the ones she asked them to underline in the text, either in English or by giving French translations and insisted on the students to give their answers and participate.

That was the summary of the general description of the courses of English in which the teacher prepared for the lessons by suggesting texts and activities and addressed different tasks. However, by the end of the year, the teacher asked students to work in groups each group consisted of 4 students or more. She proposed many topics for the students to select one, read about it, organize it in a form of a project and present it orally in front of their classmates. Each session one group passed and

discussed many issues related to the project, the members talked one by one and the teacher asked questions.Among the major characteristics of the groups were that in each group there was one student with higher level in English than the others and all of them relied on him/her to answer and explain for the teacher. If they were obliged by the teacher to answer, they code switched and arrived at talking in Arabic or sometimes in French.

3.11.Recording and analyzing the observation:

Recording and analyzing of the observation data should take place either simultaneously or just after the observation. In this case study, the observer recorded her observations simultaneously with the actual event and analyzed immediately after she has observed while the details are still fresh in her mind. In doing so, the observer took utmost care to minimize the influence of her biases, attitudes and personal views on the observation report. Therefore, the observer carefully and objectively recorded the relevant data. Subjectivity and emotional involvement negatively affect the results of the study.

3.12.Conclusion

In this chapter ,all necessary steps have been taken so that to get true and exact results from the data analysis.The three tools used in this work field have been chosen for a better analysis. The analysis of the students' questionnaire has helped us to discover lacks and wants perceived by the students.It let us think that not only the intermediate objectives but also the final objectives have not completely been attained. The analysis of the English language teachers' questionnaire has permitted to highlight the difficulties encountered by those teachers in their work. Among these difficulties, one of them has particularly kept our attention; that is the increasing number of students every year. This factor negatively influences the work of the language teachers and affects their efficiency. Undoubtedly, the results of the language teachers' questionnaire pinpoint some areas in urgent need for solution.Observation was the third tool used by the researcherin this study to observe and record impressions and reflections on the way the participants deal with this module.

Chapter 4:Interpretation of the Findings:

4.1.Introduction

After analysing both questionnaires and the results of observation, the main objective in chapter four is to provide a discussion of the findings of the current work.These findings lead the researcher to draw suggestions and recommendations,which aim at raising the proficiency levels of graduate students and the prestige of the faculties. These objectives are almost the most important needs for the majority of the higher educational institutions .The latter can be achieved only if a pedagogic and organisational curriculum exists in their ESP teaching . The curriculum aims to meet all these expectations.

4.2.Discussion of the findings :

In the previous steps on this research study ,the researcher gathered the necessary data, and now it is time to discuss the research questions of this project in the light of both previous studies and this one. In order to do so, three research tools were used. Questionnaire for students and another one for teachers besides an observation along a month.

This research is based on a number of research questions to arrive at convenient results.

The first research question was:What are the students' reasons for learning English?

The objective of this question was to identify which kind of motivation the students have towards learning the English language and then identify their reasons for learning English. According to the results, the majority of students,, say that they learn it because they need it in their studies; this means that they are instrumentally motivated. Also some of them say that they study it because it is a university requirement and aware of the great role that English plays in the modern world and the fact that it is the language of science. Hence, the instrumental motivation comes as the first source of motivation for the students. The personal or developmental motivation comes as the second source of motivation of the students .

This part was conducted to determine which type of motivation -instrumental, integrative and personal - could be the primary source of computing students' motivation towards learning the English language. It was easily seen through the findings which show that students' demonstrated greater emphasis on instrumental

reasons for learning the English language including utilitarian (e.g. in conversations that took place during the completion of the questionnaire the students mentioned that enable me to get a job easily) and academic reasons (e.g. enable me to carry my tasks more efficiently, it is a university requirement and to understand better the literature of computing issues which is in most of times written in English). This apparently reinforces the idea that the students see English as playing a vital role in their lives, either currently or in the future.

 Furthermore, emphasizing the pertinent role of English in the computing world, computing students should face this fact since important books, articles and journals written in English are of great importance .Personal causes (e.g. for a personal development and to enhance their status) were also regarded as important motives by the students. Yet, for the last motivational aspect namely, integrative motivation, the students' responses provide evidence that they, the majority, do not learn English because they want to understand the European culture. This might be caused by a growing feeling of national confidence and the fact that the students are aware of the differences between the cultures. On the other hand, another interpretation of the current results, especially students who mentioned that they are interested in the European culture, might be attributed to the students' desires to know and understand the culture of the West but not to fully integrate in that culture. The latter reason might be more acceptable and applicable as results from the interviews showed that the majority of the students rejected to learn the language to be a part of the culture of the English speaking World ,which means to be bicultural. In addition to that, some of them explained that they wished to learn about the western culture so as to broaden their horizon and familiarize them with that culture. On the whole, the results indicate that computing students chose to be bilingual but, to a given extent, not bicultural. The most reasonable explanation for that might be that the students' attitudes towards English are motivated and associated with utilitarian reasons. Westernization has been rejected and replaced by a positive attitude that looks at English as a tool for modernization and, according to them, a prerequisite for finding jobs, particularly in the private sector and go further in their studies, this will enable them to function effectively in both their academic and professional settings.

It can be also justified that motivation has positive effects on learning language skills.

The second research Question was : What are the skills the students need more for a better learning?

The answer for this question can be drawn from the students' choices for the following statement in the questionnaire administered for the students.

It is clearly mentioned in the fifth question which has focused on the skills, and the emphasis alloted to each skill on the basis of needs expressed by the students themselves during the period of their studies. The question suggests that it could be one or more skills that are needed.

Reading the results in table 3.25, it is seen in the first rank that the listening skill is laid more emphasis on (36.58%), followed by the speaking and reading skills (respectively 21.95% and 12.19 %) while only (07.31 %) is laid on the writing skill. In her work, Clark (1977: 152) assumes that the sums of the ranks are a convenient tool for a comparison between some options submitted to an ordered classification. This comparison is based on the following principle: the option with the least sum of the ranks is the most important and so forth.

The third research question was : Are the English teachers of this Department qualified to teach ESP?

To answer this question, both findings of the teacher's and of students' questioners will be explored. The findings show that the English teacher of the Computer Science Department is a Part time teacher and holds a license degree ,which indicates that she should not be able to tackle the ESP course with confidence. The teacher did not have any ESP training during the Licence curriculum and this one is answered in the teacher's questionnaire,which confirms the claim that English teaching in the department of Computing is not taken very seriously. Teachers are only holders of a Licence degree and are not well equipped in terms of training to teach ESP to students and achieve the required results. This leads us to conclude that all the future teaching problems could be easily related to the teachers' training which needs a total re-thinking. Moreover,The fact that the teacher does not use published textbooks also means that no specific teaching materials designed for computing students are employed. Again, these results verify the hypothesis stating that the teaching conditions

and practices are not adequate, which is reflected in all the responses already discussed.

4.3.Limitations of the Study:

First of all,this study is not generalizable. It was conducted with students in only one department, which is the Computer Science Department, Uinversity of Chlef, and the sample do not necessarily reflect the whole population. The results of the study reveal the attitudes of students in this department which would not be appropriate to generalize this situation to all the students who may face very different conditions from the participants of this study, for instance, the availability of materials which is not the case in all the other departments. This study is limited with (2011-2012) academic years at the University of Chlef and the results of this study may be confined to the second year Computer Science LMD students only. Results can not be generalized because in other contexts, personal reasons can be as the first source of motivation like in others the integrative reasons can be the first impelling ones.

4.4.Weaknesses of the Teaching/Learning Process:

The results of the study reveal a number of weaknesses that the process of teaching and learning carries, theses weaknesses are due to various factors which will be discussed further. An effective teaching/learning process in an ESP course is an important issue that the teacher in collaboration with the students should achieve.

The system of education in our universities still applies the traditional mode of learning, unfortunately, which views education as, basically, a matter of storing information for retention and later recall in exams. This trend is based on the theory that important pieces of information are identified and delivered by teachers and required from students.

Recently, researchers are interested in developing learner autonomy and its effects on foreign language teaching and learning. Benson (2001), basic conclusions on autonomy are:

- The Learner autonomy is the fact that the learner takes an active role, independent attitude towards learning and works independently which means it is beneficial to learning.

- The notion of "learner autonomy" is supported by the view that language learners have a natural inclination to control their learning.

- Learner autonomy is a systematic capacity to control different levels of the learning process. This personal involvement of the learner leads to more effective learning.

Evidently, the learner autonomy has many advantages for the learner of English himself, and of other languages, however, it is a hard task for teachers to foster autonomy amongst learners in practice due to the nature of the traditional structure of the teaching and learning process. Benson (2001) summarizes the awkward nature of fostering autonomy very aptly:

"One clear outcome of the research is that any attempt to transfer control over one aspect of learning is likely to have complex effects on the system of learning as a whole. Flexibility in the guidelines for the implementation of a curriculum often creates spaces in which individual teachers can allow learners a degree of control over aspects of their classroom learning. However, if the curriculum itself lacks flexibility, it is likely that the degree of autonomy developed by the learners will be correspondingly constrained."

The results reveal also that the students have different learning styles that the teacher should discover them and help students by changing the way of teaching to fit them. For Mariani (1996), the main mission of the teacher is to help the students find out their own ways of learning because each student responds to a learning task in a different way from another.

According to the results, particularly those of the observation, the students are passive components in the process of teaching and learning English. In most of times they are silent and only the teacher who asks and responds. Research shows that passive involvement leads to limited retention of the acquired information by student as indicated by Dale, cited in Mckeachie (1995) who indicated that after two weeks, we will be apt to remember 10% of what we read, 20% of what we hear, 30% of what we see, 50% of what we see and hear, 70% of what we say, 90% of what we say and do, and 100% by hearing, seeing, doing and smelling, feeling and tasting.

Again, the findings show that the students are silent and unable to express themselves

in English, even if the teacher insists on them to talk they refuse or they speak in Arabic or French in order to escape from the answer. This is called the fear of mistakes; it is the psychological aspect of language learning, it hinders the students learning the language. This implies that more than half or almost all of the learners are intimidated by the others, since having to perform, in front of their peers, causes a real problem for them. Those performance fears are quite often the profound roots in the previous failures of experience of language learning. Shy and unconfident learners pay attention more to the forms of language and correctness in producing it than to other aspects, because they know their limited capacities in respecting the well established norms of English. Psychologically, the fear of mistakes *"is a fear of losing face"* this typically characterizes mature adult learners (Rivers, 1992). Adult learners give great importance to the others comments and the way they are judged by them.

They are very cautious about making errors in what they say, for making errors would be a public display of ignorance" , Shumin (1997).

4.5.Lacks in the Language Teacher's Profile:

ESP in the Computer Science Department, University of Chlef is considered a secondary course. This is proven by the fact that curriculum developers gave no particular attention to English for Specific Purposes and did not provide specifications for the course content, methodology, etc.

All taught subjects but English have a curriculum and the only suggestions given to the EFL teachers are certain commercial books to consult or use. These books do not cover all specialities but rather the most common ones, such as English for Finance, English for Electronics, etc.Thus, the teacher who is expected to teach a not common speciality such as Construction and development of CNN machines has difficulty even to understand what this speciality is about.The simplest option for the EFL teacher is to consult and use similar books, on general engineering or mechanics for the speciality mentioned above, under the thought that they might include some useful things for the students, but never for sure. Another option is to teach grammar and syntax and possibly conduct certain discussions of general interest under the thought of improving students structural and communicative needs.The end product of these

procedures is boring lessons, frustrated and sometimes provocative students, showing disruptive or challenging behaviour by talking to each other during the course or not paying attention to the teacher.The teacher, on the other hand feels stressed and helpless whenever he/she has alesson, his/her self esteem as a professional and as a human being is diminished and most of the times he/she quits the job, since it is a part time one and not on a permanent basis.

In fact, the findings of the current case study confirmed our hypothesis that concerns the case of ESP teaching/learning in this department; that is, many aspects of the ESP process are not been taken into consideration and that causes dissatisfaction on the part of computer science students. The profile of the ESP teacher in the department was one of the main causes of frustration among the computer science students. It can be because English teachers generally spent an insufficient period of time at the computer science department and most of teachers experienced a significant mobility and teach one or two years from one department to another, simply because they are part time teachers. Actually, this is not regarded as a positive aspect because one academic year corresponds to a specific stage in the whole period of studies. Therefore, from the point of view of needs analysis, it is high time to study the validity of the students' needs and the kind and content of curriculum applied in that period. When the teacher of English stops working in the department at the end of the year, he or she can not asses the results of his or her work. Consequently, the principle of continuity and of achievement has been neglected. Different groups of learners are given to the teacher of English at the same time without taking in account any pedagogic considerations; in other words, that limited time devoted for the teacher in meeting different levels with their specific needs and objectives does not enable the teacher to identify and asses those needs because the division of groups is made in accordance to the number of hours that the part-time teacher has to cover. Pedagogically speaking, the number of difficulties is increased, which pushes us to question the fact that the part-time teacher or the recently graduated teacher with little or even no experience in English teaching or in ESP is allowed to teach all the levels starting from the first year to the master level simultaneously and independently.

According to the previous discussion, we have to go back to the definition

presented by Dudley-Evans (1988) that concerns the real characteristics of ESP practitioner. The latter should be capable of accomplishing five important roles. According to Anthony (1998) who quotes Dudley-Evans (1988) himself inspired by Swales (1988) *"the true ESP teacher or ESP practitioner"* is supposed

"To perform different roles. These are (1) Teacher, (2) Collaborator, (3) Course designer and materials provider, (4) Researcher and (5) Evaluator".

More or less, the teacher of English met at the computer science department assumes the role of teacher, course designer and somehow materials provider, yet she is not collaborator, researcher, nor evaluator. The teacher did not assume those roles mainly owing to the mobility of the teachers and some other reasons like the lack in ESP training, an insufficient experience in ELT, time constraints and the neglect of the students because they are not highly motivated towards the learning of English. To sum up, we can say that the teacher is in charge of teaching duties for which she is not totally prepared for.

4.6. The Negative Attitude of the Institution towards the ESP Subject :

Another significant issue that emerged from the analysis of the results is that the administration of the department did not specify the content of curriculum to the language teacher to be taught, and did not precise the final aims put for English language learning. As a result, the English teachers are giving the responsibility to teach the way they thought appropriate and to decide upon materials that they think that they fit the learners' needs. Then again, this faculty did not provide necessary conditions to help the language teachers fulfilling their tasks especially the way the English module is planned and included in the timetable. Consequently, the teacher of English and computer science students show their dissatisfaction about the marginalization of the English module when compared to other modules of the computer science curriculum. That was the prominent reason that causes frustration among the participants in this study because most students have stated that the number of hours of the English module is not sufficient if it is taught to help them improve their level.

4.7.Pedagogic Considerations:

A further step in this case study is related to the use of the four skills and from which of them more emphasis should be on. Apparently, the teacher of English and the computer science students do not share the same views about the priority of the skills because the teacher gave much more priority to listening and writing whilst the students gave priority to speaking and reading.

Finally, after the comparison between the needs of the computer science students and the target objectives, the results emphasized the fact that the final objectives of the learning of English arrived at are not the ones expected either by the students since the needs have not been accurately stated. This situation can result in deficiencies and dissatisfaction among the students, particularly if they are aware of the utility of English computing purposes.

4.7.1.Suggestions for Improvement:

After the discussion of the findings of the study, it is necessary to propose some suggestions for improvement and amelioration of the way English is taught in the department.

4.7.2.The Prerequisites of an Efficient ESP Practitioner:

The main concern is the English teacher who plays a crucial role in the process. It seems appropriate to consider a set of specified criteria imposed upon the language teachers by faculty when they intend to implicate in an ESP enterprise. It is worth mentioning that not only a satisfactory experience in EFL is needed but also training in ESP is required as well. Adapting from general to specific English should be accepted by most language teachers when they move to other departments and scientific subjects. Luckily, the English language department is emphasizing the importance of ESP and in the present curriculum of EFL which is taught, an ESP module is included. Therefore, future teachers will find in it a suitable prospect to improve their knowledge and to be trained to teach ESP. Moreover, the principle of collaboration between language and computer science teachers should be put in practice and emphasized along the ESP process because it influences positively both parts. The team-teaching can be beneficial to the language teachers who, more or less, know little or nothing about the field of computing in this case study and who can mitigate their difficulties

by referring to the scientific competence of computer science teachers on one side. On the side, computing teachers can benefit from language teachers' knowledge to solve language problems of their students especially in reading computing related literature or when they use scientific documentation and authentic texts written in English. Both parts, of course, have to establish their roles and responsibilities in an atmosphere of mutual understanding and confidence. Hutchinson and Waters (1987: 165) explain the importance of this kind of relationship in:

> *"ESP teachers might, for example, find themselves having to work in close cooperation with sponsors or subject specialists who are responsible for the learners' work or study experience outsid the ESP classroom. This is not always an easy relationship: suspicion of motives is common. The effectiveness of the relationship depends greatly on how it is handled by both parties, but, since it is usually the joint roles and responsibilities. ESP teachers who have enlisted the help of the subject specialist it is their main responsibility to ensure that potential problems are anticipated and avoided, and that a harmonious working arrangement is created. One of the keys to success in this area is for ESP teachers to establish clear guidelines about their and the specialist's separate"*

English teachers should be aware of their roles as evaluators and researchers because only in this case that the principle of continuation and improvement can be achieved. If they are acting as evaluators and researchers, they will investigate objectively the validity of their language teaching methodology used, of syllabus and of content. The language teachers should also assume active roles to benefit from the technology and equipment when available to reinforce their teaching. They should get in contact with the faculty administration to allow them the use of various technologies and the administration should react positively with those needs and help integration technology in class. If this is not possible, they must be able to develop an attitude of flexibility and of adaptability to any static conditions of the environment. Such a suggestion is emphasised by Hutchinson and Waters (1987: 163) who state it as follows:

> *"The ESP teacher may also have to negotiate in a more physical sense.Cramped classrooms, often in inconvenient locations, badly*

> *ventilated or heated, with a great deal of outside noise, are only*
> *too common. Equally, the teaching may take place in workshops*
> *or on the factory "shop floor" (as in, e.g. EOP), or on the*
> *premises of businesses and other concerns, often without such*
> *basic classroom "apparatus" as a blackboard.*
> *The role ESP teachers are called on to play here is obviously*
> *one of adaptability and flexibility. They need to be prepared to accept*
> *such conditions as to some extent inevitable, to strive to improvise while*
> *also patiently campaigning for improvements with the sponsors".*

It should be focused that in both questionnaires, no reference about the use of audio-visual aids was done purposely. This is merely due to the fact that after many informal interviews, we concluded that language teachers avoided this teaching method mainly because it is impossible to manage sessions of that kind with the size of classrooms they have. But we still believe that these means can have a positive effect on the computer science students in many aspects of English learning. Then the emergence of the Internet today offers many good opportunities to both language teachers and computer science students and exploring them will enable them to acquire a valuable experience if well-planned cyber-spaces are created at university. The English teachers should have permanent discussions with the computer science students because they are practical and resourceful with their comments and suggestions about the language learning which the students expect a lot from it. By making the science students participate in the process of teaching and learning, both English teachers and students are fully concerned and will have a mutual agreement concerning all aspects. Hutchinson and Waters (1987: 163) emphasize this positive aspect by stating:

> *"One final point to note is that, as with learner needs, teacher knowledge*
> *is not a static commodity. Many ESP teachers are surprised at how*
> *much knowledge of the subject matter they 'pick up' by teaching the*
> *materials or talking to students."*

4.7.3.Change in the Status of English Teaching:

It is widely agreed that the English language is an international language for communication and for other purposes such as science and technology transfer. The Department of Computer Science, like many others, is concerned with these new

development and change. This point of view suggests that more attention should be paid to the status of English teaching.

4.7.3.1.The Role of the Institution:

For efficient English teaching/learning, the faculty should help the English teacher by providing the access to technology resources available in the university and by ameliorating a certain number of conditions (timetable, number and size of groups). The faculty administration also should work with the students who can positively contribute in the improvement of the current situation by proposing a set of recommendations about what should be done, if it is possible.

4.7.3.2.The Role of the ESP Teacher:

In order to allow the English language gain better status than it is now in the department, the ESP teacher must be aware of his or her roles and duties in the teaching-learning process. Therefore, he or she should participate actively in the main decisions, specifically the ones where his or her opinion is influential.

4.8.The necessity of an E.S.P course:

The findings of the study could be of some value for teachers and course designers in conceiving an ESP course. It could also act as a first step in designing an ESP course for students of Computer Science. Difficulties can be anticipated in gathering all the data at the university level necessary for this study. Therefore, It is dealt only with 2nd year LMD students of the Computer Science department. Results of this study do not necessarily reflect other students' opinions in other departments

English cannot be learned in state schools and only private institutions can provide qualitative education. Since students grew up with such a belief, cultivated by families for years, how can they change now? English is a secondary course, not examined in the Accreditation process after the end of the four semesters courses in the Computer Science Departemtn. Why should learners spend time on such a course?

The teachers are not properly qualified to teach ESP and are not interested in their students'needs. Why should they pay attention to them?

The ESP course is fun time. Learner have a good command in English. They can get the passing mark in the final exam. Why bother attending the course?

Administration also considers ESP as a secondary course. Thus, there is a tendency to spend the budget on books and facilities necessary for other subjects but not for English. The projector for example, which is supposed to be shared, is used primarily by other subject teachers and never by the English ones, under the mutual agreement that the other subjects are the primary ones.So,how can the ESP teacher solve these problems?

To answer all these questions and find solutions to all the discussed notes, a Careful design and course preparation,interests study of the whole curriculum of a specific speciality and Cooperation with other subject teachers and administration, must be tuckelled.

4.8.1.The goals and objectives of the English for Computing course:

The goals and objectives of the English for Computing course. The goal of the course will be to familiarize the students with the terminology used in the operation of a computer. After the end of the course the learner must be able to comprehend basic computer terminology and produce relevant material in English, from simple letter writing to more complicated texts. He/she must also be able to understand, analyse and present quantitative data. He/she must be able to communicate effectively in job related situations, establish, and maintain relationships with members of the target community.

The objectives of the English for Computer Science Course can be devided with the five skills (translation being the fifth one), for better comprehension.

Listening:

- To understand native speakers and professionals, speaking about their job.
- To understand experts talking about aspects of computing science

Speaking:

- To communicate about computing topics

Reading:

- To understand a wide variety of texts, using computer terminology, job advertisements, and quantitative data.

Writing:

- To write descriptions and explanations of components and processes
- To write study and work related letters.

Translation:

- The students will be able to translate from English to French , or sometimes from English to Arabic and vice versa texts on computing, from simple to more complicated ones.

4.8.2.The content of the course:

The content of the course. In other words, what the syllabus should include.

Reilly (1988) also gives some practical guidelines to syllabus choice and design:

Define what students should be able to do as exactly and realistically as possible, as the result of the instruction

Rank the syllabi in order of importance according to the desired outcomes

Evaluate available resources match them with the syllabi

Designate one or two syllabi as dominant

Review how combination and integration of syllabus types can be achieved and in what proportion.Translate decisions into actual teaching units

In practice, the development of a course follows the same procedure as the development of a curriculum. The only difference is that the curriculum is designed

by specialists in the field, while the course, by the teachers. Decision-making plays an important role for both curriculum and course development, the process of which is illustrated in the following figure:

Stage 1

- Planning the course

Stage 2

- Teaching the course

Stage 3

- Modifying / Replanning the course

Stage 4

- Reteaching the course

During the whole process, decision-making and assessment is continuously taking place, so that modifications can be applied.Proliferation of new teaching methods, new concepts and models provide the teacher with many options to choose from.

For the English for Computer Science course, a combination of context conceptualization processes should be used: The traditional approach was closely related to the students needs. For example, grammar was identified as a problem by half of the students according to the needs analysis. However, general grammar might not be helpful, as special attention must be given to the function the structure has in the text it was taken from. For example the sentence: Aluminium is a metal which is light and resistant to corrosion grammatically can be analysed as a sentence composed by a main and a subordinate clause, but from a functional point, it performs the act of a definition. A scientist uses a plethora of definitions, classifications and so on. The student must not only be able to recognise the functions but also to produce the appropriate grammatical form to express the

function ((Kennedy & Bolitho, 1984).Further more, not all grammatical issues are so frequent in ESP. For example, in ESP there is a tendency for more passives and more nominal groups to occur, so the teacher must pay more attention to the teaching of these grammatical phenomena.

The grammatical structure inventory produced for the English for Computing course took the following form:

- Derivatives
- Prefixes and suffixes
- Comparisons
- Cause and effect sentences
- Put the verbs in the correct tense (emphasis on passive voice)
- Substitution tables (make up sentences using the table and selecting the correct grammatical form)
- Gap filling with words from the text
- Make up your own sentences, using the constructions given
- Synonyms/opposites
- Join the phrases to form sentences

To introduce the functional and communicative notion in the procedure described above, the following inventory was developed:

- Decide what the underlined pronouns refer to
- Re write the sentences in logical order
- Decide on the correct sequence of the following statements
- Re-write the paragraph, using the notes given to you
- Use linking words to form a logical connection and paragraph structure

Communicative situations were involved, since they gave a different dimension to language learning. Introduction of simulation games and problem solving techniques seemed appropriate and of interest to the students. For example:

The four skills approach should be also used, as well as tasks and activities, related to computing (e.g. asking for information on computer operation). More

specifically, tasks aimed at activities, which would enable students to deal with situations related to their future employment.

To sum up ,the course design should include the following:

- Needs assessment, including formal and informal instruments
- Learning styles analysis
- Specific, measurable and achievable goals and objectives
- Collecting relevant to the speciality material
- Deciding on the suitable to the learners needs exercises and topics
- Organising the material according to the students needs and overall course duration
- Reading on research and development in approaches to course design
- Planning effective classroom strategies to enable adult students to achieve goals and objectives
- Opportunities for independent self study, outside the class
- Administering and writing tests

Evaluation of the course should also be integrated in the teaching process. The teacher should be able to know whether goals and objectives were met, whether the teaching methods were effective, or whether new things and procedures should be involved in the course design process.

4.8.3.Assessment and Evaluation:

Nunan (1990) states that in language teaching, assessment is related to determination of students proficiency whereas evaluation to the process of collecting and interpreting information about an educational program. In other words, assessment shows what the learners know and can do in English, whereas evaluation reflects students reasons for failing or succeeding and ways of improving their learning.

Both distinctions were taken into account in the course design process, in the way

described here.

In the Computer Science Department, two formal tests take place during the semester. The tests are compulsory and the average in the two tests gives the semesters grade for the course.

Although, this is the case, It is explained that the reason for doing the test, is to diagnose specific strengths and weaknesses and to assess their achievement in the course. The test would not influence the students final marks but it would help them to be better prepared for the formal examinations.

The test would be a way to exert a certain pressure on students studying, since as adults, they had job and family commitments and limited time for study, as. Additionally, it would limit the possibility of developing gaps in the foreign language, which would be difficult to fill in the next semesters. Moreover, it would provide feedback on the effectiveness of the course and in general, it would be an on-going part of the entire process.

4.9.Student's Environment Constraints:

In the case of the computer science student, the environmental aspect of his life should be taken into consideration like his socio-cultural background which interferes in his studies. In fact, it is difficult to make the computer science student aware of the utilitarian role of the English language in an environment which privileges other languages (chiefly French) rather than English. Additionally, the practice of the English language is restricted only in class languages is sometimes a difficult task. Again, this problem has to be seriously taken into consideration.

4.10.Conclusion:

To sum up, our study emphasizes the existence of two main aspects that led to a critical situation.The first aspect is that the participants concerned do not really contribute to an enterprise which is worth spending time, energy and means. The second aspect and along our investigation, there is no regular needs analysis carried

out either at the beginning or even in the middle of the ESP teaching-learning process If our comments and suggestions are applied, they may help improve ESP teaching/learning at the Department of Computer Science to a given extent.

General conclusion :

Taking into account the main concepts of needs analysis, we have relied on the different contributions developed by specialists such as Munby (1978), Chambers (1980), Kennedy and Bolitho (1984), Hutchinson and Waters (1987), Richterich and Chancerel (1987) and Robinson (1989, 1991). In our study, we have focused on Present Situation Analysis (PSA) (Chambers, 1980; Richterich and Chancerel, 1987) and on Target Situation Analysis (TSA) (Munby, 1978) as frameworks of investigation. We have put in practice these fundamental methods in the study of students' needs in ESP at the Department of Computer Science.

It is important to mention the position and the demand that the teacher and students occupy in the process of English teaching/learning in this case study. If we consider the students, we can see that they reveal an urgent need to study English with varied forms. For these students, learning English is closely related to utilitarian purposes. They are aware enough to formulate and to justify this demand of English. We can notice that dissatisfaction   has been expressed by most of these students. The science teachers also should participate in this dynamic process by proposing authentic texts written in English to the students. They often ask them to write reports based on those texts but generally in French, which they evaluate at the end. Hence, they rely on the English teacher to help the students develop this ability of reading and even writing in English. Most science teachers and students think that the language teacher understands the field of Computer Science and that he or she can provide the specific scientific terminology sometimes using translation from English into Arabic or French and vice-versa.Team-teaching or collaboration between science and language teachers is necessary to improve the current situation. Some students in Computer Science department consider the module of English as a waste of time even if they feel its necessity after graduate studies when dealing with further research or for any occupational objectives which means they are not highly motivated. If the faculty

administration is questioned about the validity learning English they undoubtedly state that English is absolutely necessary. But in practice, we can notice that it is the contrary. When paying attention to the timetable paired with the weekdays which are planned for the different subjects of the curriculum, we perceive that the subject of English occupies the less privileged place. Furthermore, the programmes of the science subjects are devised by the Ministry of Higher Education and Research. In the case of the English subject, there is no programme. As a result, this situation represents a real problem of programme content to the English language teacher who generally cannot overcome this kind of difficulty. Furthermore, the institution considers that the English language teacher can solve this problem.In the Department of Computer Science, only the science subjects are taken into account while the importance of the English subject is ignored.

Another important aspect because it states the situation of the language teacher and more specifically the profile required for achieving such a function. Between a new teacher of general English and an English language teacher with a limited experience of ESP, we can conclude that it is difficult to reach a valuable level of attainment. The way that the language teachers are chosen to be sent to the Department of Computer Science to teach ESP does not obey any specified criteria. Specialists in ESP have provided suitable definitions of the profile of an ESP teacher. When we want to check these definitions in our case study, we can see that the profile of the language teachers sent to the Computer Science Department does not always obey the features of such definitions. For instance, much more demand is expected from the language teacher who must express the different roles assumed by the true ESP teacher ESP practitioner, that is, being a'teacher',a collaborator',a'course designer and materials provider', a 'researcher' and finally an 'evaluator'.Our analysis of the English teaching problems at the Department of the Computer Science has brought more questions than answers. We think that more thorough and consistent studies are necessary to overcome the difficulties of the English language teaching to the scientist.

The Analysis of the needs was by two groups: the students and their teacher of English .The findings also revealed the positive opinions of all two groups on the needs of using the specific English courses tailored for them to achieve a better results in their

study.

All four macro-English language skills (listening, speaking, reading, and writing) were greatly needed. Reading skills were considered as the most important. Therefore, more English courses specially designed and geared to students' needs were recommended as an urgent need for the Computer Science students.

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Appendices
Appendix I: Teacher's Questionnire

<u>Teacher's Questionnaire</u>

Dear colleague,

The purpose of this Questionnaire is to find out whether the current state of teaching English for specific purposes in the department of Computing meets your current and potential needs for you to function successfully.

Your opinion is highly appreciated

1- Your status in the department of Computing:

Part time teacher	
Full time teacher	

2- Your degree

licence	
Magister	
doctorat	

Yes	

3- Did you have any E.S.P training | No | | courses?

4- Your experience in teaching English

Years in the secondary schools	
Years at the university	

5- How many hours are allotted to teaching English per week in the department of Computing? ………….

6- What is the average size of each class? Number of students? …………………..

7- Do you use any published textbooks?

Yes	
No	

8- Do you have any special material designed for computing students?

Yes	
No	

   If yes please specify ………………………………………………………

9- Do these materials cover the needs of the entire course?

Yes	
No	

10- How do you classify the following skills in terms of importance?

	Very important	Important	Not important
Listening			
Speaking			
Reading			
writing			

11- In which aspects of English do you think students are usually weak?

Vocabulary	
Sentence structure	
Reading comprehension	
grammar	
Writing and composing	
Speaking and conversion skills	
Scientific and technical English	

12-Do the following objectives describe the teaching of English in the department of C computing?

	Yes	No
Training to use Scientific and technical texts in English		
Attending lectures and courses taught in English		
Studying English just a part of their curriculum		

13-The students require English in order to : from 1(most) to 4(least)

Understand lectures in their field of study in English	
Take part in oral discussion in English	
Read textbooks in their field of study	
Write answers to examinations questions	

14-How much English to the majority of your students know when entering university?

Not enough	
Just enough	
More than enough	

15-Do you work in collaboration with the subject lectures?

Yes	
No	

If yes, what kind of collaboration is involved? ……………………
………………………………………………………………………………
………………………………………………………………

16-Do you use Arabic/ or French when teaching E.S.P?
………………………………………………………………………………………………
…………………………………………..

17-How do you evaluate your students?

Oral test	
Written test	
Both	

18-What type of test do you use?

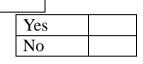| A text with questions on it	
Multiple-choice questions	

Essay questions	
Others	

19-To reach the necessary standard in teaching E.S.P, do you think the students
are given :

Just the right amount of time	
Not enough time	
Too much time	

20-How do the students find the content you present to them?

They like it	
They do not like it	

21-Do your students use computers in learning the
English language?

Yes	
No	

22-What is the most important factor in the success of teaching English in your
department?From 1 (most) to 4 (the least)

Smaller classes	
Adequate teaching facilities	
All students have been well trained in secondary schools	
Students are strongly motivated in learning English	
Good teaching texts are available	

23-Which of the following do you recommend your students to do in order to
achieve a good communicative competence in the English language?

Reading and reading comprehension	
General vocabulary	
Scientific or special vocabulary	
Listening comprehension	
Grammar	
Conversation	
Writing composition	

24-Have you any suggestions for making the English course more effective and
more relevant to the
students' needs in their field of study?

Yes	
No	

If yes, what are your suggestions?

………………………………………………………………………………………………

………………………………………………………………….

Thanks for your cooperation

Appendix II : Students Questionnaire

Questionnaire Administered to Computer Science Students

Dear students, you are kindly requested to answer the following questions:
(Tick one box)

Yes	no

Q1*. Do you consider English important for your studies?*

Q2*. Do you have another professional activity in addition to studying?*

Q3*. If yes, what is it?*

Yes	no

a. part-time teaching at university. ☐

b. teaching in secondary school ☐

c. working in a national institution. ☐

d. working in a private Company ☐

e. others (Please specify) ☐

…………………………………………………………………………………

Q4 do you use any language in your job?

Yes	no

Q5. What is/are the skill(s) you have most concentrated on? (Please, classify in order of importance, giving   1 for the most important to 4 for the least important)

a. listening ☐   b. speaking ☐   c. reading ☐   d. writing ☐

Q6. Would you say that, at the present time, your level in English is:

a. very low? ☐   b. low? ☐   c. good? ☐   d. very good? ☐

Q7. If you still find difficulties in using English, what are the aspects English you find most difficult? (Please, classify by order of difficulty giving 1 to the most difficult, 2 to the second most difficult down to 5 for the least difficult)

a. grammatical structures related to general English ☐
b. lexical items related to general English. ☐

c. grammatical structures related to scientific and technical English. ☐
d. scientific words and expressions written in English ☐
e. lexical items related to computer science. ☐

Q8. How would you describe your attitude towards English language learning at the beginning of your   studies:

a- favorable? ☐   b- unfavourable? ☐

Q9. Do you find the number of hours provided for English learning:

a. too much? ☐   b. sufficient? ☐   c. just reasonable? ☐ d. not sufficient? ☐

Q10. At the present time, do you use books/documentation in your own field printed in

English?

Yes ☐   No ☐

Q11. *If yes, what percentage of books or materials printed in English do* you approximately use?

25% ☐   50 % ☐   75 % ☐   100 % ☐

Q12. *Do your computer science teachers encourage you to use specific* documentation written in English?

Yes ☐   No ☐

Q13. *If yes, what are the objectives of the use of this specific* documentation:

 a. to develop your knowledge in relation with the whole programme of computer science.

☐

 b. to write summaries/essays according to computer science teachers' instructions
   (for a TP for instance).

☐

 c. to prepare computer science examinations.

☐

 d.others (Please specify) ☐   ……………………………………………………

(Tick one or more boxes)

Q14. *At the end of your studies, and in relation with your acquired* knowledge of English, you have become able to:

 a. listen to lectures presented in English.   Yes ☐   No ☐

 b. speak English fluently.   Yes ☐   No ☐

 c. read general English easily.   Yes ☐   No ☐

 d. read scientific English easily.   Yes ☐   No ☐

 e. write English correctly.   Yes ☐   No ☐

 f. listen to conferences presented by experts in. English. Yes ☐   No ☐

 g. exchange views with foreign experts in formal and.

☐   ☐

informal situations.   Yes   No

h. write reports on computer science using documentation
    printed in English   Yes ☐   No ☐

i. find a job where English is required.   Yes ☐   No ☐

j. conduct further research.   Yes ☐   No ☐

Thanks for your cooperation