

Impact of English on the Career of Engineering Students: A Brief Overview in G(local) Context

Rup Narayan Shrestha¹, Bharat Raj Pahari², Jai Raj Awasthi³

¹Department of Engineering Science and Humanities, Central Campus, Pulchowk, IOE, TU, Lalitpur, Nepal

²Institute of Engineering, Tribhuvan University, Pulchwok, Lalitpur, Nepal

³Far-western University, Nepal

Corresponding author: rupnarayan sth@hotmail.com

Abstract: The present article highlights the importance of the English language in the career of the students of engineering both in global and local contexts. The main objective of this article is to explore the impact of English language on the career of the students of engineering all over the world in general and in Nepal in particular. Based primarily on the literature review for the necessary data, it reveals the fact that the English language is a most essential language for the students of engineering not only in Nepal but it is equally relevant in the global context as well. It suggests that there is widespread application of English language in the field of engineering.

Keywords: English language, engineering, communication, g(local), medium

1. Introduction

In the present context, the English language, which was once the language of speakers of Anglo-Saxon origin in England, has been the language of the people of the entire world irrespective of their nationality, community and ethnicity. The English language has been globalized and its use has been widespread. People involved in diverse fields and professions use it as a means of communication to acquire information, clambering the ladder in their academic field, and reaching the summit of success in their endeavors, conducting researches, publishing their research findings and executing their duties in their respective areas of work.

In the field of engineering education also, the English language is being used as a common means of communication all over the world whether it is for acquiring knowledge from books or publishing their research reports, or for giving oral presentations or for presenting papers in the seminars and conferences. As Reimer [12] states:

... Communication skills are essential for an engineer who aspires to carry out his/her professional practice in the global areas. Engineering communication skills basically constitute several core elements such as the fluency in the English language and the fundamentals of visual communication (P.1).

If we think about the application of the English language in our local context also, it occupies an important position in our current education system from school level up to university level. The English language has played a role of a key to open the door of development and prosperity in our personal and professional life. In engineering education also, it undoubtedly occupies a very significant position.

The present paper is an attempt to shed light on the importance of the English language in the career of the students of engineering in global as well as local contexts. The English Language is the most important medium of acquiring information from various printed, Audio-visual or electronic media and materials. It is also of immense importance for them in publishing the findings of their research, communicating in their office and also for furthering their academic career. It suggests that the English language is indispensable for the people who have adopted engineering as their career. In this particular context, it appears to be perfectly relevant to cite the quotation from [7]:

... I am aware, though, of the ambiguity to which English as a study is being subjected in the evolving scheme of our national life. But I believe that as we open up to the ruthlessly competitive modern world politically and culturally, English should continue to serve our leading citizens as a necessary window of intellectual and cultural ventilation (P. 43).

In his view, English serves as a window of intellectual and cultural ventilation for the people and it enables them to peep out through it into the vast material, scientific and technological prosperity that our advanced distant neighbor countries have attained in the recent days and adopt their techniques to lead our nation to her ultimate goal.

As mentioned in Collins English Dictionary, 'Communication' refers to 'the art of sharing or exchanging information with someone, for example by speaking, writing or sending radio signals'. Communication is a process of exchanging messages between the source and the audience through spoken or written signals. In the modern age of science and technology, communication is possible through various means. According to [13], "The term communication has been derived from the Greek word 'communicate', which means 'to share'." It is true that communication is sharing as it involves interchange of ideas, feelings and experiences between the participants of any communicative contexts. Very often communication is a two way process.

2. Communication and Social Life

Communication is very essential for social life. All the social creatures communicate. Human beings are not an exception to this fact. Human beings, like any other social creatures, cannot survive without communicating with each other. They need to communicate for getting their everyday wants and desires fulfilled. In the words of Monippally [9] communication is as fundamental to our social living as eating is to our biological existence. We cannot even imagine our existence without the ability to communicate with each other as we need co-operation for our survival.

Not only in our social life, communication is equally essential in our professional life. We cannot be successful in our professional life without good communication skills. For solving the problems to be arisen in our professional field, we need to share our ideas, experiences and co-operate. To enable ourselves to win the support of our fellow workers, we should possess good communication skills. We need to gain mastery over the communication skills. Monippally [9] states," If we do not master communication skills, we may ruin our social and professional relationship". One needs to be efficient enough in the use of appropriate language expressions and tone to maintain good social as well as professional bond and persuade others to do what we expect them to do for us.

3. Communication in Engineering

Communication skills are fundamental requirements for engineers. No matter however qualified and proficient they might be in their academic career, they need to possess high level of proficiency

in communication. Thaky [13] claims that "lack of sufficient communication skills serves only to undermine the image of the engineer." As a professional, an engineer is required to communicate with the clients of diverse fields, academic level and nationality. If they fail to deliver their ideas appropriately and effectively, it may have a negative impact on their image as engineers.

An engineer has multi-faceted personality and multiple responsibilities on his/her shoulder, he/she is required to possess different kinds of abilities. For handling all these responsibilities, he/she needs to be perfect in communication. As Patil [11] puts it:

... Besides analytical and problem solving skills, subject specific knowledge, research and improved decision making ability, management skills, understanding of other culture, confidence and competence to work in international environment are considered the most essential qualities for engineers. However, at the bottom of these lies an effective communication skill (P.1).

4. Place of English in Engineering Communication in Global Context

In the present context of globalization when the whole world has seemingly been shrunk to a small village due to the rapid expansion of communication highway, the importance of the English language is increasing at a rapid pace as there is no alternative language as widespread as this one. English has become 'the ascendant language internationally, being the widespread'. People all over the world have begun to use this language for numerous purposes. Thaky [13] states:

... English has been widely accepted as the most widespread language in the world. It is cited as the major language of international business, diplomacy and science and professionals. It is the prime means of communication, and can often serve as the global language between two people from two different cultures, where in English is not the native tongue (P. 4).

Engineers are the people who have international job markets. The engineer who has obtained an engineering degree from the university of one country, may have an equal access to job opportunity in another country. When they go abroad, they may come across many different scientists, technologists and business experts. At this moment, they need a common language. Joshi [3] puts it:

... Today's engineer has to communicate with more number of his counterparts across the globe, A large number of ... engineers have to now travel to many continents and work away from their home country. Also, among the scientists, technologists and business experts from culturally and linguistically different communities. English has become the predominant language for communication.

The demand of effective communication is very high in the present day world in the engineering field due to the influence of globalization in every sphere. Whether it is for pursuing one's academic career in the universities abroad, or executing duty in the local companies, one needs English proficiency for communication. Konar [8] suggests, "In today's competitive and globalized world, communication has become an essential tool for everyone- be they students, academics or professionals. For technocrats and professionals, it becomes all the more necessary to acquire good communication skills as they have to communicate, effectively with all their business and professional colleagues (P.1).

In the struggle for existence that prevails in every field all over the world, one needs high caliber and communication skills to compete with one's rivals and to justify one's professional supremacy. Only those who can communicate perfectly can survive. Those who 'cannot communicate will lose out'; they get much less credit for their achievement than they deserve' [9].

English is very important for non-native English users because it is widely spoken all over the world [3]. The students of engineering whose mother tongue is other than the English language, it is more important to learn this language for academic enhancement as well as for future career. For engineering students whose mother tongue is not English, mastering English is even more important, not only for their academic life but also for their prospective career (P. 50). The main reason why the English language has such an important position in engineering is that 'the English language is the current lingua-franca of international business, technology and aviation' (P. 50).

The number of people speaking this language reaches 1.8 billion in the world and the number is still rising (P. 50). Not only for the students who have already started their engineering studies even for those who have started their engineering career and even for those who are going to start studying this subject for being engineers in the future, importance of English cannot be under estimated. Joshi [3] remarks," As an engineering student and an engineer – to be, there is no doubt that English language competence is important in both students' studies and career" (P. 50).

5. Place of English in Engineering Communication in Nepal

Nepal cannot remain aloof from the changing scenario in the global context. The impact of globalization in the international arena has also been rather visible in the engineering education in Nepal. The effect of globalization is now appearing in Nepal [10]. The quality and competence are the prime issues now. Unless Nepalese engineers prove to be capable and competent in the global market, the situation in going to be much harder for them now and after.

Right from the inception, 'the Institute of Engineering (IOE) in Nepal has incorporated English as one of the compulsory subjects in the curriculum and ever since it has been taught giving it as much value as any other subjects are given in engineering. Undoubtedly, there have been changes in the English syllabus and significant modifications have taken place in the course. But the most interesting thing is that every change has refined the English syllabus further. Every time the new syllabus has been designed, certain parts of the syllabus have been removed and replaced by some new, and more relevant teaching items have been incorporated.

Teaching of the English language in engineering in Nepal has remained equally relevant even at this moment as the use of English is widespread. It is taught as one of the compulsory subjects in engineering not because it is taught in other foreign universities but because there are strong evidences that the English language is still a very essential means of communication in both academic life and the future career of the engineers in Nepal. It deems very relevant to quote Khanal [6] who opines that the need of English language teaching (ELT) is very high in Nepal due to a number of reasons' and the importance has been increasing day by day (p.3).

The use of English is so widespread in the career of engineers that we cannot do away with English language teaching and learning in Nepal. Khanal [5] emphasizes that English is the only source language for the teaching and learning of scientific and technical skills and ideas in the prevalent situation of Nepal (p.33).

5.1 Use of English in the Classroom

English is very commonly used as a medium of instruction in the classroom of almost all the subjects in engineering in Nepal. Whether it is in the class of general subjects like physics, chemistry and mathematics, or in any other engineering subjects, the medium of instruction is English. Teachers deliver lecture and give notes on their respective subjects in English and the students take down class notes in the same language.

5.2 Use of English for Using Library

English is also the language of library in the context of engineering education in Nepal. The students have to follow catalogues written or printed in English. Almost all the books they find in the library, one of the most important resource centers for them to acquire knowledge about their respective fields by reading books, journals, reports, thesis and internet websites printed in English language. Almost all the reference books kept in their library are published in the English language. Those students whose proficiency in English is poor are incapable of acquiring the required information from the textbooks, and reference materials available in their campus/college libraries.

5.3 Use of English for Examination

As English is the medium of classroom instruction and the library use, it is obviously the language of examination as well. As majority of the students who join engineering institutes are from the English medium schools and higher secondary institutes, the working knowledge of their English is not so deplorably poor. It is generally tolerable. Even for those students whose medium of classroom instruction was not English during their school and higher secondary level study, the medium of examination is English itself. They cannot opt for other common languages.

We often have both written and oral examinations on all the subjects in engineering. No matter whether it is internal assessment or the final board examination which is held at the end of every semester, the students are supposed to take both written and oral examinations in the English medium. In all the subjects of 100 full marks, there is an internal assessment of 20 marks accompanied by viva or oral presentation.

For both written and oral examinations, the candidates need to use English as it is mandatory for them without any options. Therefore, students must try to develop written and spoken proficiency in English up to the level of working knowledge. English being the only medium of classroom instruction and examination, it is a must for the students. Those who possess working knowledge and basic proficiency of English feel much ease and comfort during the examination. On the contrary, those who lack English proficiency are compelled to improve the level of English language proficiency in order to improve their performance in both the written and oral examinations.

5.4 Use of English for Seeking Job

Even after the completion of their studies, the students of engineering need to have sufficient proficiency in English for getting involved in the process of Job seeking. The vacancies for the jobs are often found announced in English. For understanding the announcements also, they need to possess the capability to perceive what information the vacancy announcements contain.

After being able to understand what the announcement of Job vacancy means what requirements they need to meet for being legible for the vacant post. Furthermore, they have to apply for the post lying vacant in the concerned company. As they prepare themselves for applying for the job,

they need to write a very impressive letter of job application. At this moment also, the quality and standard of their English language that they have used in their letter of job applications matters much.

After the submission of the letter of Job applications also, they are required to attend both written examination and interview or group discussion. The quality of their performance in both the examinations are often gauged on the basis of the quality of English proficiency.

5.5 Use of English for Executing their Duties

Once they get a job, the students of engineering will have to communicate in the offices mostly in English whenever the need for formal or official communication arises. The language of most of the engineering companies is English. If they are working in a foreign or international company, English is the sole medium of communication in such companies.

In course of communicating officially, they need to prepare various kinds of documents. It is always expected the language of all these documents to be appropriate and sufficiently formal and polite. If they fail to maintain the required degree of courtesy, they may be expelled immediately. For avoiding this unwanted situation to occur, they need to possess sufficiently polite refined and formal language.

As an engineer, they are supposed to prepare reports, submit proposals, and prepare and present the seminar as well as working papers in different national or international seminars and conferences. At this moment, the only language they find appropriate and feel comfortable for communicating with their audience is the English language.

5.6 Use of English for Scholarship

Every engineer has an ambition to go to a country more advanced than his own winning scholarship for further studies. There are numerous foreign universities which publish their scholarship schemes with clearly stated requirements to be met by the interested candidates. The candidates have to follow various procedures from filling out the scholarship form to the face to face or online interview for winning scholarship. To prove their ability, they have to use standard and proper form of English language. In this way, the English language is used in every step in the engineering career.

6. Conclusion

The use of English language is widespread in the career of the engineering students in both the global and local contexts. English language being the sole language of communication in the international arena, there is no other alternative language that the engineers may opt for. No matter whether they are at the stage of studying engineering at a local university, or trying to seek job opportunity, or in the process of winning scholarship for pursuing their further studies in better international university in an advanced country, they need to prove that they are sufficiently capable enough to communicate in English language. They need the English language to listen to and understand the teacher's lecture and write notes, follow textbooks, use resource centers like library in a proper manner, to get involved in the process of job seeking, winning scholarship and executing their duties. For the students of engineering, English is like blood in our body. As our body cannot function without blood, the engineers cannot survive without English in the present global as well as local contexts.

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