English for Occupational Purposes: The Needs and Expectations of the Technical Instructors at A Malaysian Polytechnic

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Abstract: The paper addresses the English Language needs and expectations of technical lecturers at a Malaysian polytechnic in using English as a medium of instruction in teaching technical subjects. Five (5) higher management officers and forty (40) lecturers cum instructors from two departments were the samples to investigate their linguistic needs and wants in order to teach content subjects in English using a need analysis. Questionnaires were administered on the 40 lecturers whereas interview sessions were conducted on the 5 higher management officers to elicit information on their expectations for the lecturers in terms of using English for teaching. The findings would be able provide essential input to design and implement seemingly appropriate training programmes for the technical lecturers of the polytechnic.

INTRODUCTION

English language is a language which broke barriers both locally and internationally. English is a lingua franca. International trades, Business, Politics, Education aspects in the world use English as means of communication. English is a symbol of prestige in many societies. Case [1] states in his review on "Teaching English as an International Language" that it is estimated that by 2025 there will be more speakers of English as a second language than the speakers of English as a first language. Multifaceted technological task and access forces the language acquirers to be able to understand the importance and application of English at various bases. English is the language of science, invention, innovation and engineering. [2]

In the Malaysian polytechnic context, students in all specialties, pursue English language as a compulsory subject for three semesters in their entire course duration. Numerous empirical studies were found, that the need in using English in the higher institution in Malaysia is indeed very crucial which finds base from the Ninth Malaysia Plan 2006 – 2010 in achieving greater heights at international engagements. In accordance to that, the Malaysian polytechnic lecturers are now facing the challenge on what do they need to acquire in order to improve the current situation

in the polytechnic system where English is used quite distinctively in most areas of work especially widely in teaching. Every student deserves to be taught by an effective teacher. Ensuring an effective technical lecturer, the polytechnic system needs transformation to assess the needs and the expectations of these technical lecturers by diagnosing the conditions that support or inhibit reform and mapping a path forward based on the conditions, current context, and capacity of these lecturers. Polytechnic system can shape a course of action to address as well as fill in gaps, build on strengths, and improve the prospects for success by objectively determining a starting point.

This paper looks at an introduction of EOP, varieties of theoretical bases of needs analysis with its criticism and a real practice for needs analysis. It will consider how to discover the particular needs of people requiring English for their work purposes. What are their needs and how the needs can be analyzed? What kind of needs analysis process to be undertaken by trainers, teachers and course designers to develop a course along with its implementation?

Problem Statement

Aligned with the intention, the lecturers were sent to attend two interventions namely the Learning of Science, Mathematics and Technical subjects in English

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(PPSMTI) and English Enhancement Programme (EEP) up till 2010 to equip the teaching staff, in particular the technical lecturers, with certain level of English proficiency so that they will be able to conduct their lessons in English effectively. It brought other mass issues like apprehensions and anxieties to surface in these instructors. The issue is vital as the status and standards of any educational institution is determined by the quality of graduates they produce. Eventually, the anxiety filled and apprehended technical lecturers either blamed themselves for being incompetent or the students for not being able to understand the lessons in English.

The teaching of language through meaningful academic content can be a challenge for technical instructors which have taken its toll on many instructors in the polytechnic system. These technical lecturers are vigorously taking steps in mastering the English language with the intention to use English language in their classroom. Most research done so far focused on the school teacher's needs, attitudes and problems in the teaching of mathematics and science in English [3,4,5,6,7] but very few researches have conducted on the needs and expectations of technical lecturers on EOP needs, in the context of Malaysian polytechnics.

But yet, the situation arises where these technical lecturers who are not language specialists and from Malay-medium education, are facing a much tougher time in coping with the demand of teaching and learning of technical subjects in the English-medium. They are not proficient and not confident when it comes to teaching in using English in comparison with their older colleagues, many of whom are about to or have retired. These technical lecturers are facing even tougher times in rendering tasks such as preparing speeches, writing job-related scripts or even preparing question papers in English in their day-to-day job scope. Pandian et.al. [3] found that the older batch of lecturers who had their training in English may also find this new change in the education policy where English is used as the medium of instruction and communication, a challenging aspect as their experience largely involved the use of '*Bahasa Melayu'*.

Given this scenario, polytechnic lecturers are put through strict orders to use English in all issues pertaining to teaching and applying the content that they are familiar with using an unfamiliar language. Lecturers who have been teaching and learning in Bahasa Melayu are now expected to teach, design syllabus, venture in items building, tests construct, test items, test equating, establish cut scores, administer test as well as evaluate examination; items analysis and give feedback on content or core subjects in English. Students or learners too may experience difficulties to grasp the academic concepts through the English medium of instruction as they are still learning because their subject content teachers are incapable of assisting them to do so. [8]

In order to bring us closer to truth, this research attempts to study the needs and expectation of the technical lecturers in the usage of English for Occupational Purposes (EOP) at the polytechnic system. The seriousness of these technical lecturers using EOP in a non-language classroom is questioned and is brought to view in order to gather details on what their needs are to either improve or change. Many were revealing the fact that their effort and training needs still fall below par due to the unsupportive environment as mentioned above.

This paper hopes to present an account of the study on needs and the expectations of the non-language lecturers teaching technical subjects using the English language. English Language is the second official language in Malaysia. However, there are times when it is treated like a foreign language because of its unsupportive environment. The unsupportive environment that we are referring to is the lack of opportunity to use the language, and the lack of motivation to use the language. [9]

Purpose of Study

The purpose of this study is to find out the needs and expectations of the technical instructors in using English in their teaching or instruction and in the daily work scope in a Malaysian Polytechnic. The objectives of the study is to investigate the perceptions, the training needs of technical lecturers and the expectations of the higher authorities towards the technical lecturers in using English for Occupational Purposes (EOP).
To identify

Significance of Study

The main intention of this study is conducted to shed light on the needs and expectations of the technical instructors in teaching non-language classroom using English. Clark & Peterson [10], in a research on teachers' cognition confirms that their thought processes influence their actions in the classroom. But again, Bliem & Davinroy [11] elaborated that teachers' thinking, planning, interactive decision making (the very act of instructing and assessing their students), and implicit beliefs are aspects that have an impact in their classroom practices and teachings. Despite being taught and possess higher degrees, the technical instructors at the level of polytechnic have to be able to multi-task and must be able to face the challenges in teaching a non-language subject or technical subjects using English. Again, the needs differ from one another which lead to

expectations from the learning and teaching context, environment, superiors and the government at large. It will bring justice to all these instructors as their able to identify what are their needs in terms of training, skills and practice apply the knowledge concisely using English.

Literature Review

A 'need' can be defined as, a condition or situation in which something is required or wanted: crops in need of water; a need for affection". Hutchinson & Waters [12]; Robinson, [13]; Hyland [14] brought to attention that in order to determine what the students need to achieve through the medium of English accurately, it is imperative to carry out a Needs Analysis (NA).

Richards & Platt, [15] also mentioned in their study 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". In engineering education, specific English language skills are needed to enable engineering students to succeed in academic settings [16, 17, 18 & 19]. Therefore, this study wants to explore on the needs of the technical lecturers to match what actually they require most to excel in acquiring the language both in teaching and workplace.

The conceptions of "target needs" and "learning needs" have been widely used in English for Specific Purposes. Target needs are understood as what the learner needs to do in the target situation, and learning needs are what the learner needs to do in order to learn. Reiterating from Hutchinson and Waters [16], the analysis of target needs involves identifying the linguistics features of the target of the target situation or learner necessities, lacks, and wants. Many researchers agree to the fact that it is essential to distinguish between needs, wants and lacks. "Needs are those skills which a learner perceives as being relevant to him; wants are subset of needs, those which a learner puts at a high priority given the time available; and the lack is the difference a learner perceives between his present competence in a particular skill and the competence he wishes to achieve." [20]. As similarly Dudley, E. [21] elaborated that Need analysis is "what the learners need to do in English"

Need analysis can generally be categorized into two categories for example Product Driven Needs or Target Situation Analysis and Process Driven Needs or Present Situation Analysis and Learning Situation Analysis". [8]. Product Driven Needs involves objective needs, target needs, necessities, lacks, genres, teachers' perceived needs and sponsors' needs. On the other hand, Process Driven Needs are subjective needs, leaner perceived needs, desires, wants, grammar and skill

preference needs. Hence, this study is looking into two of the Process Driven Needs category which are perceived needs and skills preference needs of the respondents. Product Driven Needs focused on the respondents' target needs where they are required to teach in English all the core subjects in English by 2015 as designed by the Curriculum Unit of the Department of Polytechnic Education (DPE).

The need analysis model which is used in this study is adapted from Faiz Abdullah [8] and is illustrated below:
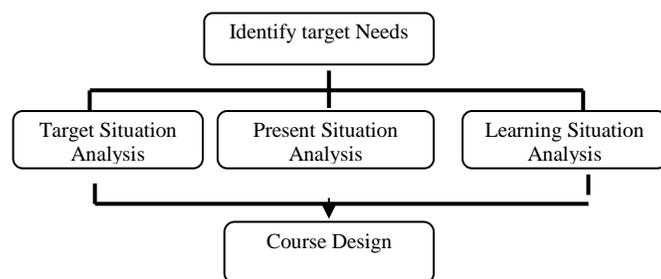

Figure 1: Need Analysis Model

The Need analysis model is used as the guideline so as to shed some light on this paper's aim. Firstly, the target needs were identified by interviewing the top management officers of the polytechnic which is based on the curriculum objectives of the institution. Present and learning situation needs were then identified with the questionnaires given to the respondents. The items identified as language proficiency, level of the respondents, current use of language and immediate needs and perceptions of the future use of English. Finally, after analyzing the target situation needs, present situation needs and learning situation needs of the respondent, a course outline would be better designed on the needs analysis.

Bosher and Smalkoski [22] conducted a needs analysis on the students at the College of St.Catherine, Minneapolis Campus to find out about why many of the ESL students enrolled in the Associate of Science degree nursing programme were not succeeding academically. It was found that communicating with the clients and colleagues in the clinical setting is students' area of greatest difficulty. Based on the finding, the Speaking and Listening Health-Care setting course was developed and it was successful in helping students learn how to communicate more effectively in clinical settings. It was implied from the study that need analysis is required before any course is designed.

Similarly, the current study would highlight that needs especially in a scenario where the polytechnic able to derive tailor-made trainings and communicative platforms for the respondents either engaging with

collaborative partners or with DPE itself. Knowing that they have the direct contact with the students, it is crucial for these lecturers or instructors to be communicating as well as handling any occupational duties in English professionally.

Belyaeva,E [23] has developed a list on the most debated concerns on dealing with EMI teachers' concerns. It shows the similarity to handle the concerns of the technical instructors in the polytechnic by looking at the potential risks, pitfalls and concerns of the target readership for this paper and the target beneficiary for this investigation - the higher education faculty members teaching their subjects and disciplines through English, which is not their native language, and working with multi-lingual students would be discussed. Below is the list of the most widely debated concerns:
a) subject content is simplified due to a limited general language proficiency and/or subject-specific English
b) classroom activities and modes limited repertoire due to the existing limitations in instructional English and interactive classroom discourse;
c) a disturbing degree of an expected „regress" when switching from one's native language to English
d) risk of loss of face; teacher personality and teaching style finding its way through the medium of English
e) multicultural classroom: dealing with tensions and unease
f) slowdown in teaching pace leading to the risk of the syllabus being not fully covered
g) inability to adjust the level of language complexity while dealing with mixed language proficiency groups of students
h) unimpressive learning outcomes
i) reduced job satisfaction and/or lack of sense of achievement.

Among the suggested ways there is peer observation, self-reflection and reflection, making the best use of the students at the advanced level of language proficiency and resourcing them in classroom. "EMI for Academics" is clearly aimed at confidence building as it gives meaningful time to discovering ways how to create positive classroom climate and how to promote successful communication in educational interactions.

Hyland and Hamp-Lyons [24] argued that EOP, ESP, and EAP implicate different teaching practices when compared to those used to teach general English. They state that the teachers have also come to acknowledge that teaching those who are using English for their studies differs from teaching those who are learning English for general purposes only. It is also different from teaching those who are learning for occupational purposes. Likewise, this paper would indefinitely highlight the technical instructors were to have different startegies planned to hamper the teaching

and learning technical subjects as the rationale is for occupational purposes.

According to Silva, Seixas & Sarmento [25], teachers suggested a wide range of practices that could be developed in their pedagogical meetings and some teachers are satisfied with their teacher development programmes, others think that they would benefit from the study of academic language and genres in order to use that knowledge into creating their materials; other teachers also mention the possibility of developing materials in the pedagogical meetings, or discussion of the tasks developed; some teachers would also like to have practical activities in the meetings like teaching to their colleagues and receiving feedback. In addition, some of the suggestions are not specifically related to the face to face teacher development, but with other pedagogical aspects of the Language without Boarder (LwB) Programme.

In a study conducted in Oman, the teachers perceive the importance of employing critical thinking skills in their teaching, yet they lack support in their implementation. It is found that both at an institutional level and in terms of professional development, there is scope for improving in terms of how in-service training and professional development is organized for teachers to sufficiently enhance their knowledge and understanding of the substantive concept of critical thinking, and incorporate it in English language classrooms across the Sultanate of Oman. The need of having the in-service training and development would enhance teaching and learning in English language classsrooms in Oman's Higher Education. [26]. In parallel, this study contributes such needs to be implemented in technical subjects teaching using English language as a medium of instruction.

METHODOLOGY
The data were collected using descriptive survey method. A total of 32 out of 40 technical lecturers responded to the survey. They were from three technical departments which are Mechanical (JKM), Aircraft Maintenance (MRO), Science and Computer Department (JMSK). The questionnaire used for data collection was adapted from studies conducted by Faiz Abdullah , Ping Duan & Weping Gu and Mahmoud A.Al-Khatib [8, 27] It was then modified to suit the context of the current study. The questionnaire included five open-ended questions in order to verify further the usage, need and language proficiency of these lecturers. Besides that, five higher authorities were interviewed to elicit information on their perception and expectations for the lecturers in terms of usage of English in classroom and for work purposes.

Descriptive analysis was used to analyse the data obtained through the questionnaires in order to get the frequency and percentage score. Interview data was analysed using thematic approach.

RESULTS AND DISCUSSION

The survey generated a total of 32 respondents from three various technical departments. More than half of the respondents were male (59.4%) and Malay was the first language for the majority of the respondents' (87.5%). Besides that, slightly more than half of the respondents were from the Aircraft Maintenance Department (56%) and majority of the respondents' were lecturers (62.5%). In terms of teaching experience, majority of them belonged to the range of one to 10 years (75%).

The respondents' current use of English. Around 72% of the respondents reported that they teach in English however, the time that that they spend teaching in English is rather low. Most of them spend from 1 to 6 hours teaching in English per week (75%) while four respondents admitted that they do not spend any time to teach in English. In addition, 28% of the respondents' use English mainly to teach meanwhile majority of them (56%) use English for both to teach and externally (e.g. outside classroom or carry out other job related tasks). The results clearly showed that the lecturers' were generally positive in teaching using English but the duration spent weekly to teach in English is limited.

Lecturers' perceptions towards English for Occupational Purposes.

Table 1: Lecturers' self rating on the importance of English language skills for Work Purposes

No	Language Skills	1	2	3	4	TOTAL
A	Listening			7 (22%)	25 (78%)	
B	Speaking			5 (16%)	27 (84%)	
C	Reading			9 (28%)	23 (72%)	
D	Writing			6 (18.75%)	26 (81.25%)	**32 (100%)**
E	Communication			7 (22%)	25 (78%)	
F	Grammar		14 (44%)	18 (56%)		
G	Vocabulary		15 (47%)	17 (53%)		

Legend: 1-Not important, 2-Quite Important, 3-Important, 4-Very Important

In terms of the importance of English language skills for work purposes, most of the respondents indicated that all the English language skills are either important or very important (Table 1). Of all the skills, speaking and writing skills are rated as the most important with 84% and 81.25% respectively. This was followed by both listening and communication skills (78%). However, it is also important to notice that almost half of the respondents' felt that vocabulary (47%) and grammar (44%) were quite important in the workplace. This implies that these lecturers' probably felt that both vocabulary and grammar are the least important skills at the workplace.

Table 2: Lecturers perceptions of the language preference at the workplace

No	Questions	English	Bahasa Melayu	Both	TOTAL
1	What language is more useful to you in the workplace?	20 (62.5%)	4 (12.5%)	8 (25%)	
2	What language do you express yourself better and more effectively?	4 (12.5%)	20 (62.5%)	8 (25%)	32 (100%)
3	What language do you prefer to use for written communication?		25 (78%)	7 (22%)	
4	What language do you prefer to use for oral communication in your workplace?		23 (72%)	9 (28%)	

Table 2 presents the technical lecturers' language preference at the workplace. Around 62.5% of the respondents believed that English is more useful in the workplace as compared to Bahasa Melayu (12.5%). The rest (25%) stated that both English and Bahasa Melayu are equally useful in the workplace. Even though the respondents felt that English is more useful, majority of them chose Bahasa Melayu for both written (78%) and oral communication (72%). In addition, they have also stated that they express themselves better and more effectively in Bahasa Melayu (62.5%) rather than English (12.5%). The results may coincide with the fact that most of the respondents' first language being Bahasa Melayu (87.5%) and the respondents' being more comfortable using their mother tongue at their workplace.

In terms of self-rating of performance in the English language skills, the lecturers' ratings reported either the level of average or good. As shown in Table 4, most of the technical lecturers' rated themselves good in both listening and reading (72%) skills while other skills are rated to be of average level. The respondents might have perceived themselves being average in skills like speaking, writing and communication as they seldom use it and prefer using Bahasa Melayu (refer to Table 3). Therefore, it can be inferred that the technical lecturers may improve the particular skills if they use English more regularly.

Table 3: Lecturers' perceived English Language skills that need to be improved

Skills	Frequency (%)
Reading	18 (56%)
Writing	25 (78%)
Listening	20 (62.5%)
Speaking	28 (87.5%)

Communication	26 (81.25%)
Oral Presentation	26 (81.25%)
Classroom instructions	25 (78%)
Grammar	20 (62.5%)
Vocabulary	16 (50%)

According to Table 3, the language skills that need improvement by most of the lecturers were speaking (87.5%), communication and oral presentation skills (81.25%), writing and classroom instructions (78%). They further reported that they need to improve their spoken English in order to perform better in their job and communicate with others effectively.

In terms of writing in English, the lecturers highlighted that they need to improve their writing skills in order to construct test items and write journals articles in English efficiently. Besides that, the lecturers also felt that they need to improve their classroom instructions in terms of handling students' queries and explaining technical terms to students. Thus, future courses could be designed to cater to the lecturers' needs in order to enhance the English language skills for workplace.

Figure 1: Percentage of lecturers who have attended in-house trainings pertaining to English language skills.

In-house English Language Training

40.6%
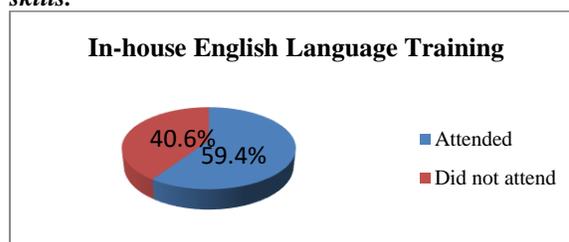59.4%

■ Attended
■ Did not attend

Figure 1 reveals that about 59.4% of the respondents have attended in-house English Language training programmes such as Teaching of Science and Mathematics in English (PPSMTI) from 2006 to 2008 and English Enhancement Programme (EEP) courses which were held in 2009. Around 13 lecturers (40.6%) reported that they have not attended any of those trainings.

It was then revealed that the lecturers who have not attended the in-house trainings were the new comers to the polytechnic and has just completed their Leadership Instructional and Androgogy Development course (KIPA). It is also important to highlight that at present there were no refresher course, workshops or seminars conducted to enhance the lecturers English language skills.

Table 4: Lecturers' perceived training needs for English for Occupational Purposes

Training/Courses	Frequency (%)
Journal Writing	27 (84.3%)
Oral Communication	28 (87.5%)
Constructing Test Items in English	25 (78%)
Academic reading and note taking	19 (59.3%)
Technical Writing	26 (81.25%)
Presentation skills	27 (84.3%)
Classroom Instruction	25 (78%)
Grammar	19 (59.3%)

This subsection presents the analysis on training needs of technical lecturers to enhance proficiency skills for workplace. As reported in Table 4, the lecturers perceived that they need training on almost all aspects of English language skills, specifically on; oral communication (87.5%), journal writing and presentation skills (both 84.3%), technical writing (81.25%), constructing test item and classroom instructions (78%). Additionally, almost 60% of the lecturers' regarded training in the aspects academic reading, note taking and grammar are necessary for them. The results clearly indicate that there is a need for training and development to enhance the lecturers' English language proficiency to enable them to perform better at the workplace. Additionally, the lecturers themselves need to make their own initiative to attend courses and workshops to enhance their English language skills.

Higher authorities' expectations for the lecturers

Findings of the interview conducted with the three higher management authorities, reported their perceptions, expectations, and aspects in using language to improve teaching and learning, communication and workplace task by these technical instructors.

The interviewees were the Head of Departments and this directly are the right authorities to be aware of aspects such as the teaching and learning and proficiency level of these technical lecturers. It is reported that the three departments' lecturers use English approximately 70% -80% in classroom. Somehow, the question and answer sessions are not thoroughly done in English by many except for the lecturers from Maintenance, Repair and Overhaul (MRO) department and indeed confidently converse in English (95%) in the classroom when they are teaching.

The level of proficiency of the lecturers was reported to be above average and some were reported to be good. Again, these lecturers are from University of Glamorgan, UK as they had a foundation of speaking in English for three years with the locals at UK compared to the balance local graduates. The higher management officers were very confident from the information given, that the lecturers whose condition which were at 'average proficiency level', would be able to progress to 'good proficiency level' when they are open to speaking- in-English platform as well corresponding in English at their workplace.

Using language extensively not only in teaching and learning but yet in communicating among the lecturers was the most highlighted issue from the interview on the expectation by the higher authorities. Opportunities to run seminars, monthly staff meetings and speakers corner were among the suggestions provided by these authorities.

English is found critical and in order to be able to grasp matters better in technology, information sharing and ideas as well as on linkages, internships and collaborations, these technical lecturers are required to communicate in English with the industry players and advisory board members. Nevertheless, they need the practice and perseverance to stand tall in communicating the language as said by these higher authorities.

One of the officer said that the training, workshops or even an English conversation day should be conducted in the polytechnic. These actions would lower their anxiety level or remove the awkwardness in wanting to speak in English. It is found that, two others higher authorities want the training to be specific in technical field not in grammar as it will not benefit much the lecturers this point of time if drilling on grammar is emphasized.

Implication for the Course design

Based on the survey conducted as well as the feedback from the higher authorities, *Oral Presentation Skills for Technical Lecturers Course* which involve lessons on Oral Communication Skills, Classroom Instructions, Presentation Skills and Micro Teaching would be designed and brought to implementation by the English Unit at Banting polytechnic to assist the technical lecturers to better use English in teaching and learning as well as at their workplace. It is hoped that suggestions given by the higher authorities to have the designed course to suit the departments' needs in terms of incorporating specific knowledge would provide the lecturers the motivation to communicate in English better.

CONCLUSION

The initiative of the polytechnic system is to offer a platform where English is nurtured and used vastly in the workplace no matter in teaching and learning or even in communication. The structured designing of the syllabuses in English is a bold move which channels everyone to communicate and dwell in the language. The finding of this study revealed that the technical lecturers use the language moderately and requires assistance in form of designed courses to cater to their lacks and needs. The finding also shows that these lecturers are seeking a set of professional skills and to perform particular job- related functions concisely. EOP meets their expectations and it particularly emphasizes on spoken and written communication skills (e.g presentation and writing proposals/agendas etc.) as specified in the finding.

Finally, the findings of this study can only be taken as an indicative of a broader issue that needs extensive and specific investigation in future studies. As this study is restricted to only one polytechnic and limited to a number of technical lecturers, it cannot claim to be an ultimately accurate one nor one that represents all the Malaysian polytechnics in general, therefore, it may not provide preciseness in findings and effectiveness in the study.

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