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Understanding tutors use of "interactures": a comparison study of three different content-based subject areas at the Universiti of Brunei Darussalam.

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109262866

Word Count: 61536 words

IPhD Education and Communication

School of Education, Communication and Language Science

December 2019

ABSTRACT

This study adhered to the belief that interaction plays a significant role in the co-construction of new knowledge in the classroom. Though, to understand the highly complex and rapid flow of classroom interaction require a system of analysing classroom talk. Most studies conducted on classroom interaction took place in the language classroom context where the language was used not only as a means for acquiring new knowledge, it was also the aim of the subject (see Walsh, 2011). However, the context of the research does not indicate that understanding the use of verbal interaction in other subject areas was insignificant. To understand the use of the English language in a content-based classroom requires adopting a system for analysis such as the Self-Evaluating Teacher Talk framework (SETT) to assess the tutors' Classroom Interaction Competence (CIC) (Walsh, 2006; 2011). By raising the tutors' and students' awareness of their CIC, this study hopes to encourage participation and thus create a collaborative environment. In this study, a comparison was made on the tutors' and students' use of interactional features (interactures) (Walsh, 2006) using the mode from three different courses at the Universiti of Brunei Darussalam (UBD).

In line with the works of Vygotsky on socio-cultural theory and social-constructivist paradigm, this study sought to conduct a qualitative approach through the use of non-participant video observation and stimulated recall interviews. Purposive sampling was used whereby the classes were chosen according to their use of the English language as the medium of instruction and the representation of different content-based subject areas in UBD. For each class, recurring video observation of the whole lesson (around 2 - 4 hours) was conducted. The interviews conducted was within 1-3 days after the observation. Since the participants selected were voluntary, the number of students participating in the interviews varies from 2 to 12 participants per class. For each interview, a random section of the lesson was shown for 5-15 minutes, depending on the response from the participants, which pushed the interviews to last around 30-45 minutes. The interview questions were semi-structured, focusing partly around the interactures used in the lesson, and the participant's response.

Using the SETT Framework on the video transcriptions, the study compared the different ways content-based subject tutors use selected interactures as a tool in comparison to the SETT Framework. Using thematic analysis on the interview data confirmed the reoccurring themes that arose from the observation data and its reflection on the tutor's CIC. The conclusions revealed how specific interactures, such as the use of display questions and humour, could be used to encourage participation by expanding the students' answers. Furthermore, the different types of lessons, for example, the tutorial, could lead to changes in the ways the tutors' and students' use of interactures. This study also suggested that different courses and different tutors could influence the level of participation in the classroom.

ACKNOWLEDGEMENT

Praises to Allah S.W.T and his prophet Muhammad S.A.W. for the longawaited completion of this journey.

In acknowledgement of their valuable support and acceptance of my abilities, I would like to thank my supervisors particularly Professor Steve Walsh for his work on the SETT framework, which continues to influence emerging research such as this.

In acknowledgement of their long-standing encouragement and friendship in the lonely road of research, I would like to thank my friends; Thuraya and Haslinda, for motivating me through the difficult times in this journey.

Last but not least, in acknowledgement of their efforts to keep me grounded and focused, I give thanks to my one and only family.

Thank you very much.

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Chapter I: Introduction

"Learning is a social and collaborative activity where people create meaning through their interactions with one another." (Schreiber & Valle, 2013: p.396).

CHAPTER ONE: INTRODUCTION

1.1 RATIONALE FOR THE STUDY

One of the main components of learning and teaching is the ability to use language as an entity. Through language in interaction, we can co-construct knowledge, exchange information, discuss ideas, identify and solve problems, and more. However, to comprehend the highly complex and rapid flow of classroom interaction requires reflecting on the features of the interaction. Studies in classroom interaction have been known to use two primary forms of analysis; conversation analysis (CA) and discourse analysis (DA). Both can be used to uncover the social and linguistic meanings behind the use of specific interactional aspects of language use in the classroom, but to understand the relationship between language, interaction, and learning requires an in-depth view of language and the functions it performs. Understanding how language in interaction is used to perform a specific pedagogical function provides a means for teachers and learners to be competent in their use of language in interaction. The ability to use language in interaction as a tool to mediate and assist learning is referred to as classroom interactional competence (CIC) (see Walsh, 2006, 2011; Young, 2014). Through the use of the Self-Evaluating Teacher Talk (SETT) framework, developed by Walsh, teachers, and students could identify their use of interactional features (interactures) regarding their intended pedagogical goals which thus, raise awareness of their CIC and further develop their teaching and learning (Walsh 2006, 2011).

The SETT Framework has contributed to the study of interactional competence in second language classrooms not only in the United Kingdom but also in other countries (see Ghaffarpour, 2016; Aghajanzadeh Kiasi and Hemmati, 2014). However, according to these studies, the SETT Framework was mostly adopted in the language classroom because, in the language classroom, the discourse was 'taught through discourse with the students' (see Walsh, 2011: p. 19). Nevertheless, it is also important to note that language in interaction acts as the main component in the classrooms of other diverse disciplines. Thus, evaluating teacher talk using the SETT Framework across different disciplines is also a valuable aspect of second language research not only in raising the awareness of CIC in teachers across different disciplines in a diverse geographical context but also in improving the SETT Framework to accommodate different content-based subject areas. Developing the SETT

Framework to accommodate different subject areas is essential, especially for higher or further education, where participation is a crucial part of the learning environment.

This brought another point to consider, which is, although the SETT framework is conducted mainly on teacher talk to comprehend how teachers acquire and develop their interactional competence; the learners' interactional competence could also be conveyed through comparison of learners' participation in the interaction and the learners' contribution to learning in response to the teacher talk (see Young, 2003; 2008). The concept of learners' participation is especially important in the higher education sector, where learners should have acquired a higher level of cognitive skills such as reasoning and problem solving. The concept is in line with Universiti Brunei Darussalam's (UBD) vision in creating a collaborative environment by 'facilitating collaborative participation' among the learners to become a first-class international university (UBD, 2011). Thus, this raises the question of what the situation is like in Brunei Darussalam, a sultanate country, with a close-knit population of around 400,000 that is strongly subjective by its philosophy of Malay, Islamic, and Monarchy (or M.I.B.). Although the initiative on developing interactional competence and encouraging participation is in hand, a gap may remain on whether the policy is applied authentically in practice or not.

Consequently, this study sought to fill the gap in the literature by using the SETT Framework as the methodology in hopes of comparing how tutors and students use *interactures* in raising their awareness of their classroom interactional competence across three different content-based disciplines in the *Universiti of Brunei Darussalam*. Furthermore, by adopting the SETT Framework in content-based subject fields, this study hopes to expand the framework to accommodate all subject areas as a flexible form of reflective practice.

1.2 AIMS AND PURPOSE

The aim and purpose of this study are to compare and understand how tutors and students from three different content-based subjects use interactional features (*interactures*) in comparison to the SETT Framework by Walsh (2006; 2011). This study also aims to provide a platform through observation and stimulated recall interviews for critical reflective practice on the participants' use of *interactures* in an effort to raise awareness of their CIC and in encouraging participation aiming towards a collaborative environment (see Walsh,

2006; 2011). In light of this, this study also hopes to develop on the SETT Framework based on the findings from the comparison made to the different content-based subject areas.

1.3 RESEARCH QUESTIONS

To answer the initial question, this research proposed four research questions. Firstly, what are the ways tutors from three different content-based subject areas in UBD use *interactures* in comparison to the SETT Framework? Secondly, how does understanding tutor's use of *interactures* encourage students to participate in their learning? Thirdly, what are the ways can *interactures* found in content-based subject fields be accommodated into the SETT Framework? Finally, how does understanding their use of *interactures* raise the awareness of the tutors' and students' CIC?

The first question made inquiries into how the tutors use of *interactures* from the SETT Framework to achieve specific pedagogic goals and how different it is from one discipline to another. The critical point for the first question is in the tutors' awareness of their use of the *interactures*. Although the tutors may be conscious of their use of *interactures* to control the interaction, the tutors may not know the SETT Framework to be aware of the connection of the *interactures* in accordance to their pedagogic goals. The second question relates to the first question in a way that by understanding the tutors' use of interactures to reach specific pedagogical goals, we will also understand how learners are provided space to use *interactures* to contribute and participate in their learning. By comparing how both tutors and learners manage the relationship between language, interaction, and learning, it can provide insights into how tutors and students raise their awareness of their CIC. The third question hoped to clarify to what extent the tutors' and students' awareness of their CIC reflect on the data gained from the first and second question through the stimulated recall interview. Therefore, conducting the stimulated recall interviews with the tutors and learners is crucial in providing the platform for the tutors and learners to reflect on their use and understanding of the interactures following their pedagogical goals. Although the SETT Framework offers valuable metalanguage for understanding classroom interaction, it has been mostly applied to second language classrooms. Therefore, the fourth question seeks to find ways of using interactures and its pedagogical goals in the different content-based subject fields in UBD to expand the SETT Framework to accommodate all subject areas.

1.4 SIGNIFICANCE OF THE STUDY

This study offers a practical, conceptual, and methodological contribution to the study of a second language classroom. The practical implication of this study is that it provides a platform for reflection on the teachers' and students' awareness of their classroom interactional competence using the SETT Framework in three different content-based disciplines in the Brunei Darussalam's higher education sector context.

Taking into consideration Brunei's values and culture, which is different from where the SETT Framework was developed, this study offers a way to develop teaching and learning practices that focus on the sociocultural and social-constructivist perspectives of interaction in the classroom. The conceptual contribution lies in the use of the SETT Framework not only in raising awareness of the participant's CIC but also in developing teaching and learning practices, which aims to encourage participation and create a collaborative environment as envisioned by UBD.

This study also seeks to expand on the SETT Framework by focusing on different content-based disciplines and reflecting on their use of *interactures* that differ in function and meaning to those in the SETT Framework. By using the SETT Framework on the observation data and stimulated recall interview as a methodology for reflective practice, this study also provides a methodological contribution in ways of conducting reflective practice for the development of teaching and learning.

1.5 THESIS OUTLINE

The first chapter is an introduction to the background of this study and the rationale for conducting this study. This chapter provides the four research questions that this study sought to answer and explains the significance of conducting this study. The second chapter explores the context of this study, i.e., Brunei Darussalam, which include Brunei's geographical background, and the language used in Brunei. The second chapter mainly concerns the history behind the language use and the language policy in Brunei. Thus, the chapter explores Brunei's adherence to the country's philosophy of 'Melayu Islam Beraja' (M.I.B.) and the country's long-term plan in regards to the education system in the Brunei Vision 2035. The second chapter also reviews the language education in Brunei and the education system, especially surrounding the context of this study, i.e., the Universiti of Brunei Darussalam.

In the third chapter, the literature review will start with a view into the importance of interaction in the classroom, especially on the issue of the second language classroom and the English medium of instruction (EMI) as this relates to the context of the study, i.e., Brunei Darussalam. Aside from the more commonly used Conversation Analysis and Discourse Analysis, the literature will also explore other approaches to studying classroom interaction such as the Culture-Language Integrated Learning (CLIL), Dialogic Teaching, as well as studies and frameworks on participation in the classroom such as the concept of collaboration. The socio-constructivist and socio-cultural approach, which is the basis for the SETT Framework, will also be explored in this chapter to understand the concept of interactional competence and the origins of the SETT Framework. This chapter will also explore the use of the SETT Framework as a method for reflective practice and the requirements of multiple methods of reflective practice to accommodate Brunei's M.I.B. ideology.

The fourth chapter is on the methodology whereby the method of data collection and data analysis will be explored regarding the research questions and the theoretical framework of this study. This chapter will also explore the reliability, validity, and ethical considerations that this study has taken into account. The chapter will then proceed with an in-depth explanation of the methods of data collection through the theoretical justification for the choice of methods, the sampling type conducted and the methods itself, i.e., the non-participant observation and the stimulated-recall interview.

In the fifth chapter, the analysis of the findings will be conducted by comparing the data from the pilot study to test the method of data collection and to identify any changes made in the research design. This chapter will mainly focus on the findings of the data collected in comparison to the SETT Framework. This chapter will look at the different *modes* and *interactures* found in the data in correlation to the pedagogic goals as compared to the SETT Framework using selected transcripts from the observation data. The findings are then compared across the three different disciplines to uncover reoccurring or different meanings derived from the three disciplines. This chapter will also investigate the use of other *interactures* mentioned in the SETT Framework. The meanings derived from the three subject areas will then be reflected with the data collected from the stimulated recall

interviews to investigate the awareness of the participants' CIC and how it encourages participation in the creation of a collaborative environment.

The last chapter discusses the findings of the study in regards to the reviewed literature. The chapter will also be used to review the research questions posed by reflecting on the themes that arise from the findings of the data with the literature touched in chapters two and three. This chapter will also provide a conclusion in the form of a summary of the research, the research findings, and the recommendation for future study.

Chapter II: Background of Study.

"Even when English is specified as the medium of instruction, the reality of classroom varies" (Ishamina and Deterding, 2017).

CHAPTER TWO: BACKGROUND ON BRUNEI DARUSSALAM

2.1 GEOGRAPHICAL BACKGROUND OF BRUNEI

Brunei Darussalam (also referred to as Brunei), which means 'the abode of peace' lies on the North-western coast on the island of Borneo in Southeast Asia (Noor Azam and McLellan, 2014: p.486). The South China Sea bordered Brunei and surrounded the Malaysian state of Sarawak. The total land area of Brunei is 5, 765 sq. km divided into four districts; Brunei-Muara, Tutong, Kuala Belait, and Temburong District (Anon., 2017). Brunei was once a "large maritime empire" and one of the main trading post during "the reign of Sultan Bolkiah (c1485-1528ce)" holding over most of northern Borneo and the south of what was known as the Philippines (Noor Azam and McLellan, 2014: p.487; see also Salbrina and Deterding, 2013). Due to civil wars and corruption in the mid-19th Century, a British adventurer, James Brooke, was asked by the Sultan to put out the rebellion (Salbrina and Deterding, 2013: p.2; Noor Azam and McLellan, 2014: p.487). However, besides achieving the objective, Brooke was also successful in establishing himself as the 'Rajah of Sarawak' and extended his and his successor's influence over most of the coast of North Borneo (Salbrina and Deterding, 2013: p.2; Noor Azam and McLellan, 2014: p.487). Although Brunei became a British Protectorate in 1888, Brooke was able to continue his expansion to Limbang and thus, dividing Temburong from the other three districts of Brunei (Salbrina and Deterding, 2013: p.2). By 1905, Malcolm McArthur, a representative from the British Empire, wrote a report ensuring Brunei's ability to "continue as an independent sultanate under the guidance of a British resident" (Salbrina and Deterding, 2013: p.2). The discovery of oil in 1929 along the coast of the Belait district became the main source of income for Brunei (Salbrina and Deterding, 2013: p.2). The Japanese invasion in 1941 to 1945 reduced the British authority in Brunei, but after the Second World War ended with the return of the British, there was a push for independence in Brunei, which resulted in the implementation of the 1959 Constitution, (Salbrina and Deterding, 2013). By 1967, Sultan Omar Ali III abdicated his throne to his successor, Sultan Haji Hassanal Bolkiah Mu'izzaddin Waddaulah, the 29th Sultan, and the current Sultan of Brunei (Salbrina and Deterding, 2013: 4). On January 1984, "Brunei gained full independence from Britain and remained a small but wealthy independent state" which became a member of the Association of South-East Asian

Nations (ASEAN), the United Nations, the Commonwealth of Nations, and the Organisation of the Islamic Cooperation (Salbrina and Deterding, 2013: p.4; Noor Azam, et al., 2016: p.10).



Figure 1: Map of Brunei Darussalam (Maps of the World, 2016)

The population in Brunei was estimated at 436, 620 as of July 2016; consisting of 66% Malay, 11% Chinese, 3% other indigenous groups and 20.6% other non-indigenous groups such as expatriate workers (temporary residents as of 2011) (Noor Azam and McLellan, 2014: pp.486-487). The *puak jati* (native people) of Brunei consists of seven subgroups; the Brunei Malay, Kedayan, Murut (Lun Bawang), Bisaya, Dusun, Belait, Tutong, (see Martin and Sercombe, 1996; Salbrina and Deterding, 2013). The majority of the population lives in the Brunei-Muara district, where the capital; Bandar Seri Begawan (BSB) was also located while some lives in the medium-sized town of Belait district, which "primarily engaged in the off-shore oil drilling industry" (Salbrina and Deterding, 2013: p.1). Besides the seven subgroups, some Iban people who migrated from the neighbouring Sarawak also settled in the deep parts of the Temburong district (Salbrina and Deterding, 2013). There was also a small group of Penan people, "traditional forest people of Borneo,"

based in "longhouses in the village of Sukang on the Belait River" (Noor Azam et al., 2016: p.10-11, Martin and Sercombe, 1996: p.303, Sercombe, 2007). Among the Chinese community, many have lived in "Brunei for generations but have not been granted Brunei citizenship," most came for south China or Taiwan (Salbrina and Deterding, 2013: p.5). With the discovery of oil in 1929, the rapid economic development, and the progress of education in Brunei, an increasing number of expatriates was employed from the Philippines, Indonesia, Malaysia, Thailand, and Bangladesh as well as from more distant places such as the UK, USA, New Zealand, Canada and Australia (see Salbrina and Deterding 2013, Noor Azam, et al., 2016).

2.1.1 MELAYU ISLAM BERAJA (M.I.B.)

The national philosophy and ideology adopted in Brunei 'during the declaration of independence of Brunei Darussalam on 1st of January 1984' were called *Melayu Islam Beraja* (Malay, Islamic, Monarchy or M.I.B.), 'which incorporates the three core elements central to the identity of Bruneians' (Noor Azam, et al., 2016: p.9-10; Haji Awang Asbol, 2019: p.1). 'Malay' refers to the use of the Malay language, which refers to the national language in Brunei and also a recognition of the Malay identity, race, and culture (see Noor Azam et al., 2016; Haji Awang Asbol, 2019). Before the introduction of the bilingual education system, the Malay language was the "language for knowledge" especially used in 'arts,' 'literature,' Islamic knowledge, and in the government's administration (Haji Awang Asbol, 2019: p.15). The Islamic element refers to the "respect for the Islam religion," which could be traced from the first sultan of Brunei, Sultan Alak Betatar, whose Islamic name was Sultan Muhammad Shah (see Noor Azam et al., 2016: p.10; Haji Awang Asbol, 2019). The Islamic religion also brought with it the first formal education conducted within places such as the 'palace,' 'mosques,' 'homes,' 'small prayer halls,' and 'religious assembly halls' (Haji Awang Asbol, 2019: p.28). Furthermore, the Malay language used Jawi inscriptions with some adaptation from the Arabic characters before it changed to the 'Romanised characters' due to western influence (Haji Awang Asbol, 2019: pp.15-16). The third core element was the representation of Brunei's as a monarchy and the people's 'loyalty towards His Majesty, the Sultan of Brunei' (Noor Azam et al., 2016: p.10). Before education was made available to the people, it was "centred [on] the palaces or home of the elite" (Haji Awang Asbol, 2019: p.28). Those involved in the government's bureaucracy were selected from the elite, namely those from good lineage or those with high education background (see Noor Azam et al., 2016). Thus,

the understanding of M.I.B. was imperative in discerning how the language and education policy works in Brunei.

2.2 LANGUAGES IN BRUNEI DARUSSALAM

Due to the various cultural backgrounds, as mentioned in section 2.1 above, a 'linguistic diversity' could be seen in the use of language in Brunei. Although the official language of Brunei is Standard Malay in accordance to MIB, the dominant lingua franca is the Brunei Malay, which is "a variety of Malay that was substantially different regarding its pronunciation, lexical and syntax" (Salbrina and Deterding, 2013: p.5; see also Clyness, 2011; Ishamina and Deterding, 2017). Another increasingly dominant language in Brunei was the English language, which was introduced in Brunei around 1888 as a 'language of the protector/ coloniser' (O'Hara-Davies, 2010: p.408). Besides the indigenous languages and English, other languages used by locals and foreign workers includes Chinese, Tagalog, Bahasa Indonesia (Indonesian Malay), Thai, Bangladesh, Pakistan, and Urdu (see O'Hara-Davies, 2010; Noor Azam et al., 2016). Another language used in Brunei especially as a medium of instruction in *Ugama* (religious) schools and universities focusing on Islamic knowledge or as a subject itself was the Arabic language, although this was rarely mentioned due to low usage outside of the education context (see Noor Azam et al., 2016).

As for the Chinese community in Brunei, the most spoken dialect would be 'Hokkien,' but other dialects include "Hakka, Cantonese, some Hainanese, Teochew and Foochow" (Dunseath, 1996: p.284; cited in Salbrina and Deterding, 2013: p.5). Although, recent years have seen a move towards the use of Mandarin, which also the situation found in Singapore (Vaish et al. 2010: p.175) and this resulted in the younger generation having only "passive knowledge of their grandparents' language" (Salbrina and Deterding, 2013: p.6). Besides Mandarin, the younger generation of the Chinese was also fluent in Malay and English, but their written Malay may not often be useful (see Salbrina and Deterding, 2013: p.6).

Below is a table, adopted from Noor Azam and McLellan (2014), on the different languages that could be found in Brunei:

Language	Description, status
Brunei Malay	Majority L1; lingua franca
Standard Malay	National and official language
Kampong Ayer Malay	Indigenous dialect of Brunei Malay
Kedayan Malay	Indigenous language
Belait	Indigenous language
Dusun/Bisaya	Indigenous language(s), closely related
Tutong	Indigenous language
Murut (Lun Bawang)	Indigenous language
Iban	Immigrant language, indigenous to Borneo; lingua
	franca in some rural areas
Penan	Immigrant language, indigenous to Borneo
Arabic	Foreign language, used in Islamic religious and
	educational domains
Mandarin (+ other Chinese languages)	Minority languages of Chinese Bruneians, used
	in business domains; Mandarin also in education
Brunei English	Second and foreign language, nativizing; lingua
	franca in urban areas
Standard English	Foreign language, used in educational and other
	formal domains (e.g., legal)

Figure 2: Languages used in Brunei (adopted from Noor Azam and McLellan, 2014: p.488)

Besides Brunei Malay, the other six indigenous groups in Brunei; Kedayan, Murut (Lun Bawang), Bisaya, Dusun, Belait, and Tutong have their languages which also reflects their ethnicity and culture, and this also goes to the Iban and Penan community (see Salbrina and Deterding, 2013; Noor Azam, et al., 2016). Studies have noted the similarities of indigenous languages found in Brunei; Brunei Malay could be said to be similar to Kedayan

"with the lexical cognates of 94% (Martin and Poedjosoedarmo, 1996: p.7; cited in Salbrina and Deterding, 2013: p.5). While the Dusun language could be said to be similar to that of Bisaya "with the lexical cognates of 82%", and this also goes with the Belait and Tutong districts' languages (Salbrina and Deterding, 2013: p.5). The language of the Murut people in Temburong was the same as the *Lun Bawang* language spoken by the people in Sarawak, just over the border of the Temburong district (Salbrina and Deterding, 2013: p.5). Nevertheless, some of the minority languages were currently in danger of completely dying out, such as Belait and Tutong, which was under threat even though there were efforts made by an enthusiast to maintain the use (see Salbrina and Deterding, 2013). One of the reasons was due to the dominant languages; Malay and English (see Noor Azam et al., 2016). Although, the Murut language has a more assuring status due to the support gained from the neighbouring Malaysian state, Sarawak, through the use of 'radio broadcasts and printed materials' (Salbrina and Deterding, 2013: p.6; see also Noor Azam et al., 2016).

The introduction of a unified bilingual education system, dwibahasa in 1885, and the SPN21 in 2009 witnessed the increasing dominance of the English Language (see Salbrina and Deterding, 2013, Noor Azam, et al., 2016). According to Ozog's (1996) observation, the English language was seen as the 'language of knowledge' while the Malay language was seen as the 'language of the soul' (Noor Azam, et al., 2016: p.12). Although Standard Malay was considered to be the national language, it was only used for official and formal contexts and as the medium of instruction in education while the Brunei Malay occurs in informal situations such as in conversations between friends and family (see Noor Azam, et al., 2016; Salbrina and Deterding, 2013). Thus, this removed the Standard Malay's role as an identity marker instead Brunei Malay replaces this. Brunei Malay was spoken mostly by Malays, who traditionally originated from Kampong Ayer, the water village on the Brunei River, and it was similar to Kedayan Malay, the original land-dwellers of Brunei. Salbrina and Deterding (2013) provided an example of the difference between the Standard Malay, which has six vowels: /i, e, a, o, u, ∂ / and the Brunei Malay, which has only three: /I, a, u/ and while /h/ can take place at the beginning of the Standard Malay word such as hutan, it was not pronounced in Brunei Malay (2013: p.5). Another variation of Brunei Malay and Brunei English was the Kampong Ayer Malay, which was seen as a dialect of Brunei Malay (see Noor Azam and McLellan, 2014). Nonetheless, with the development of English as the medium of instruction, the educational division may threaten the use of the Malay language. Though, the use of Malay language as the medium of instruction in Ugama (religion) schools for seven years

during the students' primary years of development have provide means to practice and use Malay language and thus "cementing the Malay's position as the 'language of the soul'" (Noor Azam, et al., 2016: p.264).

The distinction between the Standard Malay and Brunei Malay reflected how the Standard English language was used in Brunei in comparison to the Brunei English variety (see O'Hara-Davies, 2010). Studies have shown slight variation albeit unclear distinction between English in Brunei and the Standard English and some have called it Brunei English instead of Standard English in Brunei, which appeared as a variety of English (Salbrina and Deterding, 2013: p.6; see also Noor Azam et al., 2016). Salbrina and Deterding (2013) show that through the influence of American English, rhotic variation in phonology, syntax, and lexis of Brunei English could distinguish it from other varieties of English (see Salbrina and Deterding, 2013; Noor Azam and McLellan, 2014; Noor Azam et al., 2016). The variation in the use of English in Brunei was influenced by not only the speakers' 'educational background and attainment' but also on depending on other factors such as age, gender, profession, and ethnicity. Thus, there was no clear line on what factors influence the variation of English in Brunei (Salbrina and Deterding, 2013: p.7). However, the features of Brunei English have also been observed in Englishes of neighbouring countries in Southeast Asia and the difference in between Brunei English and Standard English was only realised by the speakers themselves although the exact distinction was not precisely clear (see O'Hara-Davies, 2010; Salbrina and Deterding, 2013; Noor Azam et al., 2016)

By adopting Schneider's (2003, 2007) 'five-phase model of post-colonial Englishes,' Salbrina and Deterding (2013) implied that Brunei English undergoes the third phase of an evolution of the English Language (see Salbrina and Deterding, 2013: p.117). Thus, we must acknowledge that like any other developing variation of a language has the challenge to 'qualify as a distinct variety' with identifiable features, and yet too much deviation from the standard language could lead to incomprehensibility (O'Hara-Davies, 2010: p.416). Another possible variation called the *Poklen* English (spoken by Bruneians living at Kampong Ayer) remains to be seen as a sub-variety of Brunei English (see Noor Azam and McLellan, 2014).

2.3 EDUCATION SYSTEM IN BRUNEI DARUSSALAM

Traditionally in Brunei, the Malay society's education solely focused on "reading, understanding, and memorising the Quran [taught] by the *Ulama* (religious scholars) [at] the

Surau (Islamic prayer halls)" (Gunn, 1997: p.68, cited in Salbrina and Deterding, 2013: p.13). The first formal education was only established in 1912 in the form of a Malay-medium primary school while the Chinese-medium school was created in 1916 by the Chinese community using Mandarin as the medium of instruction (see Salbrina and Deterding, 2013: 13; see also Ishamina and Deterding, 2017). The first English-medium education was provided in the form of 'missionary schools' outside of the Brunei borders, i.e., 'Labuan English School' (Gunn, 1997: p.79, cited in Salbrina and Deterding, 2013: p.13). Nonetheless, the difficulty of travelling prevents Bruneians from seeking out education elsewhere. Thus, not many families were keen to send their sons to schools as they see it as a waste of time in comparison to helping out their fathers with skill works such as fishing or farming. By 1929, a law was passed "(Enactment No.3 1929), which required all male children between the age of seven and fourteen to attend school within a two-mile radius of where they lived" (Noor Azan and McLellan, 2016: p.255). Before the world war in 1941, there were 32 schools in Brunei, with 24 Vernacular Malay Schools, three private English schools, and five private Chinese schools (MoE, 2001, cited in Noor Azam, et al., 2016: p.255). There were no secondary schools offered in Brunei until the 1940s, but the importance of education was made aware of due to the Japanese invasion, who "recognised the importance of education for social engineering even more than the British" (Gunn, 1997:98, cited in Noor Azam, et al., 2016: p.255). As a result, an awareness of the importance of education was raised in Brunei.

The growing income from the oil and gas industry, the rapid increase in population, and the country's desire to build the nation allow Brunei to expand on their education. In 1959, a constitution was written to ensure the status of the Malay language as the official language in Brunei while the English language was only used officially for another five years before Brunei's independence(Noor Azam, et al., 2016: p.255). Along with this, a five-year development plan was made to improve education in Brunei by "creating the infrastructure for [what is today known as] the Ministry of Education" (Noor Azam et al., 2016: p.255; see also Salbrina and Deterding, 2013). Due to this, by the end of the five-year development plan there were "a total of about 15,000 students enrolled in 52 Malay primary schools, 3 English schools, 7 mission schools, 8 Chinese primary schools, and 3 Chinese secondary schools" and these numbers increases as time passed (Salbrina and Deterding, 2013: p.14). The report made by Aminudin Baki and Paul Chang in 1959 on Brunei's 'general education policy and principles' resulted in the creation of the National Education Policy of 1962, which also

stresses the use of Malay language as the primary medium of instruction in primary and secondary schools (Noor Azam, et al., 2016: p.256). However, due to the deterioration of political and diplomatic relations between Brunei and Malaysia where most students and teachers were sent to train and study, a radical move was made to create a bilingual system of education; i.e. *Dwibahasa* (Bilingual) education policy in 1985 (see Salbrina and Deterding, 2013; Noor Azam, et al., 2016).

The National Education Policy enacted in 1992 also stressed the importance of Malay as the official language the 'official language' without neglecting the English language (Noor Azam, et al., 2016: p.270). The policy also aims to 'cultivate and inculcate the values of M.I.B.' especially concerning the 'teachings of Islam' and the 'loyalty to the Monarch' in order to instil the qualities of harmony and unity, to build the confidence for creativity, innovativeness, and the 'ability to adapt to changes', and to create a 'responsible manpower resources' (Noor Azam, et al., 2016: p.270). Although, there have been changes to the National Education Policy whereby in the Ministry of Education Strategic Plan 2012-2017, instead of the stated aims as observed above, the Ministry of Education in Brunei work towards a vision, mission and core values (Noor Azam et al., 2016: p.271). The vision of the ministry was "quality education towards a developed, peaceful and prosperous nation" while the mission was "provide holistic education to achieve the fullest potential for all" and the core values were "accountability, integrity, leadership, honesty, respect, and teamwork" (Noor Azam et al., 2016: pp.271-272). What the vision, mission and core values mean to education in Brunei was the ministry's intention towards generating an education system, which was 'well-rounded and balance' in accordance to the M.I.B. philosophy, capable of competing with the standards of international education while also inspiring 'life-long learning' thus providing a peaceful and "politically stable society" with capable human resources (Noor Azam, et al., 2016: p.272).

The latest *Strategic Plan 2018-2022*, brought about slight changes in the vision and mission of the Ministry of Education in Brunei (see MoE, 2019). Currently, the ministry of education's vision is to develop "quality education" to create a "dynamic nation", which focuses on "equipping citizens with knowledge and skills in adapting to the changing environment in the 21st century" and thus, "develop positive and responsible citizens" for a "stable and sustainable economic, social and political development" (MoE, 2019: p.12). Although, the mission of the ministry of education still focuses on "providing holistic

education system", nevertheless, emphasis is placed more on the 'delivery' by "creating meningful curriculum and relevant educational programmes through a series of key developmental stages" to achieve a society with "strong foundation values and the ability to contribute to the nation" (MoE, 2019: p.13). To ensure the success of these vision and mission, the ministry devised three strategic objectives which aims to "organise human resources towards a performance-driven culture", "provide equal and equitable access to quality education" and "enhance shared accountability with shareholders in the development of teaching and learning" (MoE, 2019: p.9). This vision and mission was the centre of the *Sistem Pendidikan Negara Abad ke 21* or The National Education System for the 21st Century (SPN21) education system.

2.3.1 SPN21 & VISION 2035

In recognition of the Brunei Vision 2035, in 2009, the Government of Brunei Darussalam promoted and adopted the new education system SPN 21 (*Sistem Pendidikan Negara Abad ke 21* or The National Education System for the 21st Century). The new education system was created to fulfil the strategic themes as outlined in the Ministry of Education's Strategic Plan (2007-2011), which were a professional, accountable and efficient organisation, quality education, and teaching and learning excellence (MoE, 2007: p.13). One of the aims of SPN 21 was to meet the social and economic challenges of the 21st century by realising the Ministry of Education's vision and mission and encouraging 'lifelong learning' (Salbrina and Deterding, 2013: p.17; see also MoE, 2019). Through this new system, the Ministry seeks to provide students with the flexibility to choose a suitable educational path according to the students' achievements (Salbrina and Deterding, 2013: p.17). By enabling students to be actively involved, SPN21 also seeks to create new curriculums that were in line with the needs of the 21st century, such as "emphasising project work," "teaching skills in information technology," (Salbrina and Deterding, 2013: p.17).

At the Primary level, SPN21 altered the policy for the medium of instruction from the Malay language to the English language for mathematics and science to increase the "level of proficiency in the English language" (Salbrina and Deterding, 2013: p.18). Different from the previous policy, the reform allows students to avoid a significant shift in the medium of instruction from Malay to English in their fourth year of primary school (Noor Azam et al., 2016; Salbrina and Deterding, 2013). Other changes made by SPN21 were evident in the Secondary level through the introduction of 'express stream' whereby students were able to

take the "GCE 'O' Levels after four years instead of five" (Noor Azam et al., 2016: p.274). Furthermore, new subjects were introduced in the lower secondary (Years 7 and 8) such as entrepreneurship, business and technology (including design and technology, home economics and agriculture) and the upper secondary level (Years (9, 10, and 11), students were allowed to take new elative subjects such as music, food and nutrition, and design and technology, which were all taught in English-medium (Noor Azam et al., 2016: p.263). The SPN21 system also gave more "emphasis on making the classes student-centred rather than teacher-centred" by "creating a classroom environment where the child has the opportunity to explore and question rather than learn by note" (Noor Azam, et al., 2016: p.273; see also Ishamina and Deterding, 2017).

Although SPN21 could provide a positive impact on the future generation, some criticisms made on SPN21 were that apart from "new subjects, new methods of assessment, and new approaches to teaching," it could only be considered as only 'cosmetic change,' and the 'heavy' use of English language as the medium of instruction was in contradiction to the national philosophy; M.I.B. (Noor Azam, et al., 2016: p.263). To implement SPN21 was also thought to be costly, and it may place a burden on parents from lower-income to buy the new textbooks provided. However, in terms of developing the English language competence while maintaining the use of the Malay language, Kirkpatrick (2010) notes that "the bilingual education system in Brunei is considered as the most successful among the member states of the Association of Southeast Asian Nation (ASEAN)" (cited in Ishamina and Deterding, 2017: p.283). Aside from the primary and secondary level, higher education institutes in Brunei were allowed to regulate their policy as long as the policies were in line with the ministry of education's vision and mission in realising the Vision 2035 (see MoE, 2019; Ishamina and Deterding, 2017).

2.3.2 HIGHER EDUCATION SYSTEM & POLICY IN BRUNEI

Currently, there were three main institutions for higher education in Brunei Darussalam; *Universiti Brunei Darussalam* (UBD), *Universiti Islam Sultan Sharif Ali* (UNISSA), and *Universiti Teknologi Brunei* (UTB) (MoE, 2019). UBD was the first higher education institution to offer bilingual disciplines, which range from science and engineering to business, language, and social sciences (see UBD, 2011). *Universiti Teknologi Brunei* (UTB), established in 1986, used to be known as ITB (Institut Teknologi Brunei) before it was upgraded to a university in 2008 (UTB, 2017; see also Ishamina and Deterding, 2017).

UTB was a university that specialises in disciplines such as engineering, business, and computing (UTB, 2017). UNISSA was developed in 2007, and this university offers courses in Arabic and English languages focusing on Islamic teachings, including Islamic virtues, co-curriculum, ICT, and entrepreneurship and industrial training (UNISSA, 2017). Another higher education institution aiming at providing teachers for Islamic religious schools in Brunei was *Kolej Universiti Perguruan Ugama Seri Begawan* (KUPUSB) (see Ishamina and Deterding, 2017).

In 2012 SPN21 also implemented a programme not only to provide students who have "completed upper secondary" with a variety of options for higher education but also to "address the socio-economic demands", and "support and promote the development of human resources" in the form of Technical and Vocational Education and Training (TVET) programme (MoE, 2013: p.91). In line with the Ministry of Education's strategic objectives particularly in "enhancing shared accountability for the development of teaching and learning with stakeholders", higher education were encouraged to prepare students with the skills and knowledge in preparation of the challenges of the 21st century and the fourth industrial revolution (R.I. 4.0) (MoE, 2019). The TVET programme was introduced in institutions such as Politeknik Brunei (Polytechnic Brunei or PB), and Institut Pendidikan Teknikal Brunei (IBTE) to fulfil the strategic objectives by reorganising the structure of their governance and reinforce their collaboration with stakeholders (see MoE, 2013; Ishamina and Deterding, 2017). PB started its operation in January 2010 to take over the role of offering the 'Higher National Diploma (HND)' level technical programmes on business, ICT, nursing, and science and engineering from UTB (PB, 2016). While IBTE was an autonomous post-secondary educational institution developed in May 2014 in response to the need to restructure and establish a new system of technical and vocational education along with professional training (IBTE, 2016).

Although most of the higher education used either English language or both English and Malay medium of instruction for the courses offered, the SPN21 education system ensures the use of Malay language as a medium of instruction through the compulsory M.I.B. course (see Noor Azam, et al., 2016; Ishamina and Deterding, 2017). Therefore, the higher education institutions in Brunei could be said to offer bilingual or multilingual courses. Subsequently, there is no specific policy for universities set by the Ministry of Education, in terms of the medium of instruction, "the higher education institute determines their system" (Ishamina and Deterding, 2017: p.285). The focus of this study is at *Universiti Brunei Darussalam*, where it was known for the oldest bilingual institution in Brunei.

2.3.2.1 UNIVERSITI OF BRUNEI DARUSSALAM (UBD)

For this study, the *Universiti of Brunei Darussalam* (UBD) has been chosen as the context because it was the first bilingual university in Brunei that roots date back to 1985 (see Noor Azam et al., 2016; Salbrina and Deterding, 2013, Ishamina and Deterding, 2017). In their attempt to become the Top 50 universities in Asia, UBD has come up with five quantum initiative to move forward. Some of these were to create a 'desirable culture' that "intends to develop and inspire UBD community into a committed team player by empowering the future-leaders" and to "facilitate collaborative participation" through "innovative education and enterprising research, driven by national aspirations and guided by the values of Malay Islamic Monarchy (MIB)" as stated in their mission (UBD, 2011; UBD, 2019). By 2009, UBD developed a curriculum called GenNext, which aims to "provide students with a variety of knowledge from different disciplines" in pursuit of "a flexible choice of career" (Ishamina and Deterding, 2017: p.285).

Through the GenNEXT system, UBD's core values consisting of "people, expertise, aptitude, relevance, and leadership" were integrated into the development and organisation of their "academic faculties" and "support centres" including the research centres (UBD, 2019). Students are required to take both Malay-medium and English-medium courses (aside from language classes such as Korean and French) even though there were more English-medium disciplines; thus, this necessitates the students to get at least a grade C in English 'O' level or a grade 6.0 in IELTS to enter (see Salbrina and Deterding, 2013). To reinforce the institution's collaboration with external stakeholders (such as external institutions, public and private sectors, local and abroad), a programme called "discovery year" was introduced in the GenNEXT curriculum, which was made mandatory for students in their third year (UBD, 2019). Similar to the SPN21 education system's aspiration, the GenNext has designed courses that use the English language as the medium of instruction; revealing the extent of English language used in the education system in Brunei (see Ishamina and Deterding, 2017).

2.3.3 THE DEVELOPMENT OF ENGLISH LANGUAGE AS MEDIUM OF INSTRUCTION IN BRUNEI'S EDUCATION SYSTEM

The rich and diverse linguistic landscape in Brunei was proof that multilingualism exists in Brunei, and this translates into the education system. Through the implementation of Dwibahasa in 1985, the English language act as the medium of instruction not only for the elite, as seen in the 1930s but across the different schools in Brunei (see O'Hara-Davies, 2010: p.408; see also Ishamina and Deterding, 2017). The purpose of studying the English language changed from understanding the language of the 'protector or coloniser' to the required knowledge to keep up with the growing economic status (O'Hara-Davies, 2010: p.408). Evidence of the change in the status of the English Language was seen from the increasing use of English as the medium of instruction and the increasing supply of expatriate teachers and the provision of scholarships for Brunei students to English speaking countries such as UK and Australia (O'Hara-Davies, 2010: p.408). Thus, the implementation of dwibahasa, SPN21, and GenNext, which used the English language as the medium of instruction, was at odds with the 1959 Constitution, which stressed the importance of the Malay language as the official language in Brunei (Salbrina and Deterding, 2013). The English language was deemed to be necessary for 'utilitarian and economic' purposes, especially with the growing oil and gas industry (O'Hara-Davies, 2010: p.408; See also Salbrina and Deterding, 2013).

According to the *Dwibahasa* system, at first, most of the subjects were taught in Malay in the first three years of primary school, except the English language as a separate subject. One of the disadvantages of this was that the students have to learn vocabulary in Malay at the beginning and "relearn the same vocabulary in English in their fourth year" (Noor Azam, et al., 2016: p.13; see also Salbrina and Deterding, 2013). However, the changes brought by SPN21 have ensured that "there was no longer a sudden switch in the medium of instruction in the fourth year of primary school," especially for mathematics and science (Ishamina and Deterding, 2017: p.284). Due to the SPN21 system, primary students have to take Malay-medium subjects such as Malay language, Islamic religious knowledge, Malay Islamic Monarchy (M.I.B.) and Physical Education; and English-medium subjects such as English language, Mathematics, Science, Social studies (includes History and Geography), ICT, Music and Drama, which caused the English language to become the medium of instruction for most technical subjects (Noor Azam et al., 2016: p.263; see also

Salbrina and Deterding, 2013). The purpose of using Malay language for core subjects such as M.I.B., Islamic religious knowledge, and history, was to maintain the use of Malay in the essential subjects and as the 'language of the soul' while the English language for the technical subjects parallel to its function as a 'global lingua franca' (Salbrina and Deterding, 2013: p.15). As a result, depending on the teachers, it was noted that Malay was also often used in English-medium classes to 'explain the concepts properly' (Wood et al., 2011: p.62, cited in Salbrina and Deterding, 2013: p.15). As for the higher institutions, as mentioned above, the oldest bilingual institution was the *Universiti Brunei Darussalam* (UBD), which offers most English-medium courses and Malay-medium courses for the Malay language, Malay literature, and the compulsory M.I.B. courses (see Ishamina and Deterding, 2017). The UTB, PB, and IBTE institutions offered only the M.I.B course in Malay-medium while the rest of the courses offered were in English-medium instruction while UNNISA also offers courses in Arabic-medium (see Ishamina and Deterding, 2017).

There were two concerning issues on the subject of bilingual education; firstly, on how exposing children to western language may affect their traditional values and result in the loss of their identity (Jones, 2007: p.251, cited by Salbrina and Deterding, 2013: p.16). Secondly, on how the children could cope with the 'demands of a bilingual education system' since their mother tongue was Brunei Malay, they were expected to learn both Standard Malay and Standard English (Jones, 2007: p.251, cited by Salbrina and Deterding, 2013: p.16). Despite these issues, Jones (2007) has argued that these concerns were non-existent as it would result in a marginalised Malay culture while Western culture dominates" (cited in Ishamina and Deterding, 2017: p.283). Instead, changes made in SPN21 and GenNEXT have brought about a linguistic and educational division, especially for those students with a lower proficiency level in English (see Ishamina and Deterding, 2017).

2.4 LINGUISTIC DIVISION IN BRUNEI'S EDUCATION SYSTEM

Looking into Brunei's education system, it shows evidence of linguistic division for English language learners in Brunei. The linguistic division concerns the use of English as the medium of instruction for the most subject in the schools (as discussed above). The breakdown of the subjects above illustrates that English was the dominant language as the medium of instruction for most subjects at SPN21, be it for primary level and secondary level, and even in higher education level. Although the English language was useful in raising the proficiency and academic achievements, adopting the English language was a contradiction to the national ideology of emphasising the use of the Malay language as the official language of Brunei. Nevertheless, the Malay language was still used as the staffs' and students' lingua franca even though most were skilled in English (see Salbrina and Deterding, 2013; Noor Azam et al., 2016). Some authors have also suggested that there was a high level of code-switching occurring among the local teachers and students, and this depends on the dominant language they use outside of the classroom context (see Salbrina and Deterding, 2013; Noor Azam et al., 2016). A study on UBD shows that female undergraduates tend 'outperform' the male undergraduates and in relation to English, "40.7% of the female respondents and only 19.3% of the male respondent' claimed to use English with their friends 'all the time' or 'often' (Jones, 1997: p.22, reported in MoE, 1993, cited in Salbrina and Deterding, 2003: p.20). The results suggest that even among the different genders, be it in the classroom or privately, there was a linguistic division on the use of the English language.

The linguistic divide could be observed in conjunction with the level of proficiency found not only in private schools in comparison to public schools but also within the rural areas in comparison to urban areas. The increase in private schools brought out concerns about the linguistic division in Brunei. According to the records form the Ministry of Education (2011), there were 85 private schools in comparison to 173 government schools and about 32,190 students in private schools in comparison to 79, 730 in government or public schools (MoE, 2011, cited in Salbrina and Deterding, 2013: p.19). As a result of this most students coming from private schools acquire a higher proficiency level in English than those coming from public schools and although some students in public schools achieve good results, those who come from "less 'fashionable' schools often struggle to pass English 'O' Level examinations" (Salbrina and Deterding, 2013: p.19). The proficiency level of Brunei students in English has also increased more within the urban areas than in the rural areas of Brunei (see Salbrina and Deterding, 2013; Noor Azam et al., 2016). A study made by Wood et al. (2011) has revealed that students with a good command of English in the capital (BSB) have shown improvements in Year 3 to Year 5, but those in rural areas such as Temburong District "show little or no improvement" (cited in Noor Azam, et al., 2016: p.14).

Thus, this raise the concern on the suitability of using the 'Cambridge 'O' level exam' (an examination which has been abandoned in some parts of UK) for the Brunei students as it was made explicitly for 'first-language speakers of English' and may not be appropriate for students with 'limited ability in English' (Salbrina and Deterding, 2013: p.20). Concerns on the linguistic division were also between those 'who have access to good schools, the internet, satellite television with a range of channels in English, and plenty of books and other reading material' and those who cannot access it (Jones, 2007: 256, cited in Salbrina and Deterding, 2016: p.16). Due to the linguistic division, Ożog observed that the "English language was seen as the language of knowledge" and the "Malay language as the language of the soul," which leads to code-switching commonly seen among educated Bruneians (Noor Azam et al., 2016: p.13).

2.5 SUMMARY

Although Brunei is only a small sultanate country, linguistic diversity is wideranging. Including the seven *puak jati* (native people), there were also languages spoken by the localised Chinese, the Iban people who migrated from Sarawak, the Penan people and expatriates workers from Philippines, Indonesia, Malaysia, Thailand, Bangladesh, UK, USA, New Zealand, Canada and Australia (see Salbrina and Deterding 2013; Noor Azam, et al., 2016). However, due to the dominant influence of Brunei Malay and Brunei English, some of the indigenous languages have almost extinct. Through Brunei's national philosophy, Malay, Islamic, and Monarchy (M.I.B.) in 1985, a bilingual education named Dwibahasa was implemented, which divides the subjects taught into Malay-medium in the first three years and English-medium in the last three years. Later on in 2009, a new system known as the SPN21 has been implemented, to improve the Dwibahasa system. Due to the difference in the level of proficiency in English between public and private schools, between genders, and between the numbers of English-medium subjects compared to Malay-medium subjects, a linguistic and educational division could be observed (Noor Azam et al., 2016). As a result, the "English language was seen as the language of knowledge" and the "Malay language as the language of the soul," which leads to code-switching commonly seen among educated Bruneians (Noor Azam et al., 2016: p.13).

Chapter III: Literature Review

Since interaction is central in the language classroom, teachers may be able to use "language as a tool to access new knowledge, acquire and develop new skills, identify problems of understanding, deal with 'breakdowns' in the communication, establish and maintain relationships and so on" (Walsh, 2011: 2).

CHAPTER THREE: LITERATURE REVIEW

With the rising importance of the English language in Brunei's educational system as the 'language of knowledge,' the need to understand and become competent with the language was a priority (See Noor Azam et al., 2016). This chapter looks into the use of the English language as the medium of instruction adopted in Brunei's education system in comparison to other learning systems such as the Content Language Integrated Learning (CLIL). One of the main aspects of the educational systems (such as EMI or CLIL) is in its reliance on language in the co-construction of knowledge; hence, it is essential to understand how language works in classroom interaction. By exploring the social-constructivist and sociocultural perspectives, this chapter also seeks to shed light on how this study used these theoretical perspectives to approach the co-construction of knowledge through language use in learning and teaching. For teachers to develop their ability to use language effectively, there is a need to consider the interactional competence (IC) or in particular, the classroom interactional competence (CIC) of teachers and students concerning learning and teaching (Walsh, 2006; 2011). However, within the classroom context, the interaction is fast-paced and performs many functions; thus, it requires a data-led system for analysis and reflection (Walsh, 2011; 2013). One of the ad hoc (designed for a specific purpose but without planning) tools to evaluate teacher talk is the Self-Evaluation of Teacher Talk (SETT) framework introduced by Walsh (2006), which will be discussed in this chapter (see Mann and Walsh, 2017). This study also uses the SETT Framework along with multiple methodologies to achieve a data-led, dialogic, and collaborative form of reflective practice, which is an essential aspect of learning and teaching development.

3.1 ENGLISH AS THE MEDIUM OF INSTRUCTION (EMI)

Reflecting on Brunei's education system in Chapter 2, the changes in the education system from *Dwibahasa* to SPN21 highlights two areas of interest. Firstly, the introduction of new subject areas such as Design and Technology, Home Economics, Agriculture, Food and Nutrition, Entrepreneurship, and Music reflects the essential skills and knowledge to cope with the 21st Century (See Noor Azam, et al., 2016; Ishamina and Deterding, 2017; MoE, 2019). Secondly, the education system emphasises the use of the English language as the medium of instruction for most main subject areas resulting in the linguistic division between
the language of knowledge, i.e., English language and the language of the soul, i.e., Malay language (See Noor Azam et al., 2016). Due to the requirement of including M.I.B. as a Malay-medium course for all higher education institutions, a bilingual or multilingual education system was adopted, such as in UTB, where the main course offered was mainly English-medium (see Ishamina and Deterding, 2017; MoE, 2019). Following the Vision 2035 and the to face the challenges of the Industrial revolution 4.0 (I.R. 4.0), the TVET programme introduced under SPN21 pushed institutions such as PB and IBTE towards improving the skills and knowledge of students by introducing English-medium courses (see Ishamina and Deterding, 2017; MoE, 2019). Even an Islamic institution such as UNISSA offers Englishmedium courses aside from the Arabic courses following global Islamic development (see MoE, 2019). Even in a bilingual institution such as UBD, the GenNEXT programme has shown a rise in the courses offered in English-medium in comparison to the Malay-medium, which consists of the Malay language and linguistics, Malay literature, and M.I.B. courses (see UBD, 2019). The SPN21 education system for primary and secondary schools, TVET, and higher education system adopted in different institutions "reflected an increasing role of EMI education" in Brunei (Ishamina and Deterding, 2017: p.286).

EMI defines a way of "teaching subjects using the English language without explicit language learning aims" and often conducted in a country where most "do not use the English" language, but this definition of EMI give rise to some controversial issues (cited in Fenton-smith et al., 2017: p.5). Critical reasons for the rise of the EMI education system include the "geopolitical status of English," the "expansion of higher education," and the increase in "large-scale internalisation education policies" (Fenton-smith et al., 2007: p.1). One of the significant issues involved 'what' or 'whose' English, which in this study's case would refer to the Brunei English used in informal context or the Standard English taught in textbooks (Fenton-smith, et al., 2017: p.6). Another issue concerns the "negative impact" of EMI on the local and official language, which in this case refers to the Standard Malay language and Brunei Malay, resulting in incorrect use of the language, code-switching or even the loss of a language (see Ishamina and Deterding, 2017; Fenton-smith, et al., 2017). Furthermore, depending on the context, the English language used by students may differ, and due to this, students may resort to using the English language they commonly used, including using informal languages and slangs for their English language tasks.

On the other hand, to macro-stakeholders such as the government or institution, EMI has the benefit of providing "quality education" for students with proficiency in "English language," which provided them with "marketing opportunities" that increases their 'financial' value (Fenton-smith et al., 2017: p.7). Although by adopting EMI, macrostakeholders could be said to have prioritised the "presumed economic advantages" rather than one of the primary purposes of education, i.e., "gaining academic knowledge" and skills (Fenton-smith et al., 2017: p.7). Thus, by adopting EMI to gain skills and knowledge to cope with the challenges of the 21st century and the Industrial Revolution 4.0, the current education system in Brunei view education as a "by-product" to gain knowledge but at the cost of the language itself (Fenton-smith et al., 2017: p.5; see also Taguchi, 2014). Teachers of contentbased classroom expect "the students to absorb the particular ways of disciplinary literacies" with little regard of "the ways in which language is employed in meaning-making", which reflects how although EMI implies language learning objectives, there are more content learning objectives used (Escobar Urmeneta, 2019: p.8; see also Richter, 2019). Therefore, to implement EMI effectively requires the knowledge and skills of the discipline and the ability to use the English language effectively (see Fenton-smith et al., 2017).

3.2 CONTENT AND LANGUAGE INTEGRATED LEARNING (CLIL)

The implication of language competence in EMI reflects the importance of learning a language in the pursuit of making meaning in content-based classrooms. It is vital to take into account that the chances for teachers and students to develop their interactional competence are limited to the extent of their focus on delivering the content of the discipline or subject (see Richter, 2019). An approach was introduced in Europe to achieve multilingualism alongside content-based subjects was termed as the Content and Language Integrated Learning (CLIL) (see Wannagat, 2007). The notion behind CLIL was that "languages are not learned first and then used but that they were learned by being used," as explained by Cenoz (2015) (cited in Escobar Urmeneta, 2019: p.9). CLIL was defined by Escobar Urmeneta (2019) as a "plurilingual approach to learning and teaching in formal context" using the second language (L2) as a medium of instruction to teach contents from different disciplines to students by "creating a space" aiming to develop language proficiency (2019: p.8-9). Wannagat (2007) also explains that the pedagogical goals of CLIL are not limited "to improving proficiency [in the language and content] by teaching the contents using L2" but also in providing space for students to participate in their learning (2007: p.664). The

difference between CLIL and EMI was that by using EMI, the 'speech distribution' showed a higher proportion of teacher talk and shorter student talk; whereas using CLIL exhibited teachers allocating turns to students in the turn-taking process, which involves means of holding, passing, taking or giving turns (Wannagat, 2007: p.699; see also Walsh, 2011). The turn-taking process adapted in a CLIL classroom proves the possibility of "planning the approach to language and content" (Wannagat, 2007: p.679).

While CLIL is beneficial in improving proficiency while improving the academic level and providing space for interaction, some of the downsides involved the "risk of academic standards in content disciplines" will decrease due to "students' poor command" of the L2 (Escobar Urmeneta, 2019: p.13). Adopting the CLIL approach also require teachers who are experts or proficient in using the L2, which may result in a shortage of teachers in comparison to EMI, where teachers are not required to be experts in L2 (see Escobar Urmeneta, 2019; Richter, 2019). Students may also face particular difficulties due to the pressure of achievement and competence of the L2 not only from themselves but also from the "assumptions of teachers and the institution" (Escobar Urmeneta, 2019: p.13). Adopting CLIL's approach also has the potential to restrict the use of the first language (L1), especially for students who are not proficient in L2, which results in confusion and misunderstandings (see Escobar Urmeneta, 2019: p.14). Depending on how teachers plan the lessons, chose their strategies, and how teachers developed the students' disciplinary literacy skills, there is a possibility of an "unbalance treatment of content and language" (Escobar Urmeneta, 2019: p.14). Furthermore, if school leaders or the stakeholders have an "inadequate understanding" of the stakes of plurilingual education and low commitment" due to "insufficient information" and "planning," an authentic adaptation of CLIL may not occur (Escobar Urmeneta, 2019: p.14). Therefore, there is much to deliberate before adapting the CLIL approach.

Both the CLIL and EMI embody the constructivist perspective on learning as an active process where individuals construct meaning derived from using language in interaction (see Wannagat, 2007; Escobar Urmeneta, 2019). However, the amount of exposure or contact with the L2 differentiates the effectiveness of CLIL and EMI in achieving proficiency in L2 and bilingualism. Therefore, there is a need to look at other approaches derived from the Second Language Acquisition (SLA) theory, "the study of how people learn languages in addition to their native language/s" (Richter, 2019: p.28), such as

Content-Based Instruction (CBI) or Language Immersion or Sheltered Immersion or Bilingual (or Trilingual) Education (see Escobar Urmeneta, 2019). CLIL itself has a number of variation depending on the context, process, and focus such as Content-Driven CLIL, which place more focus on the contents of the disciplines or Content-Rich Language Learning (CRLL), which is more focus on the language in interactions or Integrated Content and Language in Higher Education (ICLHE), which is a programme offered at tertiary or higher education aiming towards "professional competence" in a specific discipline and interactional competence using L2 in a "specific professional context" (Escobar Urmeneta, 2019: p.16). All these approaches point towards the importance of using language to produce effective teaching and learning in acquiring the second language, the value of understanding classroom interaction in encouraging the co-construction of knowledge, and accepting that to adopt these approaches successfully requires the development of language competence.

3.3 CLASSROOM INTERACTION

Acknowledging that language can become an interactive tool to promote effective teaching and learning pushes us to understand how communication, which refers to how "language is used to promote interaction," plays a big part in the classroom (Walsh, 2011: p.3; see also Churches, 2010). One of the main ingredients for teachers to become more efficient is excellent communicating skills (see Churches, 2010). There are two forms of communication; verbal communication, which "involves transmitting messages to another person or group using speech" (Butterfield, 2010: p.2) and non-verbal "communication that took place other than through words" (Hall, Hellerman, and Doehler, 2011: p. 3). One method of deciphering communication taking place is by looking at it in a form of discourse, which refers to a "visual representations that characterise a topic, an era, or a cultural practice" that also shows meanings and may specify the effects of language on individuals or groups whose views have dominated at a specific point in time (Grbich, 2012: p. 245). However, explicitly 'discourse' could be viewed as a "system of statements" that targets or focuses on a specific object, which could be abstract or concrete (Braun & Clarke, 2013: p. 189). Walsh (2013), however, defines discourse as a "written or spoken texts, which are produced in a particular context to serve a specific purpose" (Walsh, 2013: p. 23). Although this definition of discourse differs, one main similarity is the knowledge that discourse focuses on a specific aspect for a purpose. Bernstein, however, categorises discourse into 'horizontal discourse' and 'vertical discourse' (Bernstein, 1999: p.159). Horizontal discourses

refer to discourses revolving around 'common-sense knowledge,' which applies commonly to different speakers (Bernstein, 1999: p.159). Vertical discourses, on the other hand, refer to discourses, which are 'coherent, explicit, and systematically principled structure,' thus requiring knowledge on 'a series of specialised language' (Bernstein, 1999: p.159). By understanding Horizontal and Vertical discourses, we can distinguish how the knowledge structure is acquired, the forms of 'grammar' required, and the subject field found surrounding the communication that took place (Bernstein, 1999: p.159).

Although communication takes different forms in conveying one person's thoughts, it could take place without any actual interaction occurring, for example, a person could initiate a conversation without any direct response from anyone within the group (see Kumpulainen and Wray, 2012). Thus, interaction in communication is crucial within the classroom to perform several functions such as "accessing new knowledge, acquiring and developing new skills, identifying problems of understanding, dealing with breakdowns in the communication, establish, and maintaining relationship" and primarily interaction is required to promote learning and teaching (Walsh, 2011: p.2). A traditional and generic form of interaction consists of a three-part-interaction-exchange structure called the Initiation, Response, and Feedback (IRF) to express the process of teaching and learning as a 'collective meaning-making process' whereby; teacher initiates a speech, the student responds, and teacher give feedback (see Kumpulainen and Wray, 2012). Nevertheless, classroom interaction, which refers to the fast-paced turns, involving several participators who are focusing on different things, and conducting several functions at once, is far more complex (see Firth and Wagner, 2007; Walsh, 2011).

One way of understanding the workings of interaction within discourse is by looking into the distribution of power and prestige. According to Bernstein, power, and prestige are reflected in either 'public language' or 'formal language' (Bernstein, 1960: p.314). 'Public language', refers to "a mode of communication marked [...] by the rigidity of its syntactical structure and the limited and restricted use of structural possibilities for sentence organization" while 'formal language', refers to a system in which "the structure and syntax is potentially less predictable for any one individual" (Bernstein, 1960: p.314). Bernstein further characterised these forms of languages into 'restricted codes' and 'elaborated codes' (Bernstein, 1960: p. 135-6). "Public languages" abide by a more "restricted code" where the speakers of the public language have a mutual understanding of the interaction since the

structure and complexity of the interaction are predictable to the speakers, as found in the interaction between families and friends (Bernstein, 1960: p.315-6). "Formal language," however, adopts a more "elaborated code," whereby the speakers are open to choose from a variety of alternatives (Bernstein, 1960: p.315-6). Bernstein's concept of codes provides a form of language to describe the transmission and acquisition process generated in the meanings produce depending on the distribution of power in each context. Though, the social aspect of understanding interaction, i.e., the relationship between discourses, meanings behind what was transmitted, the social actions intended, and the principle of construction in diverse contexts, was not analysed in-depth. To make sense of how interaction works would also require understanding the social aspect of interaction because individuals adopt an unusual way of interacting with another depending on the receiver, the context, and one's social background. By looking at interaction as a two-way collaborative process, which is affected by different factors, we may be able to see how language can be used more effectively in interaction.

Changes in the theoretical perspective of teaching and learning have led to changes in classroom interaction even though the traditional teaching methods, where the teacher has full control of the classroom interaction, is still relevant to an extent (see Kumpulainen and Wray, 2012). Nevertheless, to create a productive learning environment, the teachers require the co-operation of the students as "successful learning environments should be more studentcentred, active and contextually based" to provide space for students to take part in their learning (Gayle, 2006: p.36). On the one hand, there are several risks in adopting studentcentred concepts in the classroom, whereby agreement to implement student-centred learning may only be on the surface, especially for a non-democratic country where the power relation leans more towards the teachers (see Rudduck, 2006). Furthermore, providing the students with too much control over their learning may result in slow learning progress. The main point is to avoid viewing Student-Centred learning (SCL) as part of imposition by the government or institution. There are diverse ways of adopting SCL, but what differentiates them is the "amount of guidance and structure provided by the teacher during the learning process, and with the degree of autonomy demanded of the learners" (Westwood, 2008: p.27). The most fundamental part is to try and meet the SCL core conditions, which are "congruence of facilitator, acceptance, or respect towards the students, and empathic understanding of the students and their feelings" (Nejdl and Tochterman, 2006: p.333). By working around these core conditions, teachers may be able to provide a more collaborative

environment where teachers and students work together to co-construct knowledge. On this note, if one of the primary purposes of education is to prepare the younger generation for the unknown future, then there is a need to empower and collaborate with the students for indepth knowledge of what may be required to face the challenges in the future. Through the process of gradual empowerment, the students have "the responsibility for their behaviour, participation, and learning" (Brandes & Ginnis, 1986: p.12; see also Mason and Rennie, 2006). However, this does not imply that teachers have no role in their learning. Napoli (2004) encourages the notion that students need to participate and collaborate with teachers to "select learning goals and objectives based on authentic problems and students' prior knowledge, interests and experience" (2004: p.4). Thus, the teacher's primary responsibility is to be the "facilitator" in helping the student "access and process information" (Napoli, 2004: p.4, see also Walsh, 2011, 2013).

Although collaboration is essential in the co-construction of knowledge, nonetheless how do we know students are authentically participating? A study conducted on the use of questions by the Brunei teacher's perspective as a means for the opportunity to talk in the Mathematics lesson. Using the method of video observation on Year 8 mathematics classrooms, as well as interviews with four Bruneian teachers, this study found that interaction was "largely dominated by teachers," and they tend to "rush through an hour lesson" going through the critical part of the lesson. The findings revealed that most students prefer 'code-switching,' and teaching in English only inferred that many of the students had realised the importance of learning mathematics in English (Nur Hafeezah & Masitah, 2014: p.17). This study implies not only that teachers control most of the interaction in the classroom, which may restrict the space for learning to occur but also their preference to use code-switching may hinder authentic participation and interaction between teachers and students especially for teachers who are not fluent in both language nor have any experience with the values and customs. Students may also be restricted to use only one language for one subject, which in this case is English and for students who are not confident with the use of the language may not feel encouraged to participate in the interaction. The form of interaction produced may contain mostly the traditional IRF format.

Accepting that it is essential for the teacher to encourage students to participate through interaction, we have to comprehend the extent that students' participation is successfully encouraged, especially in content-based classrooms. Participation here basically

means students "taking part" in an event or project and collaborating with the teacher (Corver, 2005: p.13). Students' participation is crucial in bringing about a collaborative environment; therefore, teachers are required to provide space for participation, collaboration, and learning (see Walsh, 2011; 2013). Therefore, teachers need to understand how to encourage students to participate, create space for learning, and collaborate to achieve a productive learning environment. However, the students themselves should also take the opportunity to understand their learning style, become more aware of the learning strategies, and actively take part in their learning (see Xhafer and Xhafer, 2011). According to Kramsch (1986), the classroom discourse is "institutionally asymmetric, non-negotiable, norm-referenced, and teacher controlled" thus, it requires "interpretation and negotiation of intended meanings" to achieve interactive social skills (Kramsch, 1986: p.369). Thus, for teachers and students to participate in a collaborative environment, there is a need to achieve interactional competence (see Walsh, 2013). Developing interactional competence requires the skills of understanding the use of language in the creation of interaction for learning, especially the language classroom; nevertheless, in the content-based classroom central to learning is also the use of language to co-construct knowledge. Therefore, we need to first look into some of the theories of learning, language acquisition, and the social aspect of learning.

3.4 SOCIAL-CONSTRUCTIVIST & SOCIOCULTURAL THEORY

While acknowledging that the role of communication (language used to promote interaction) plays in the classroom is essential, it is also vital to understand how learning comes about through the use of language. According to Palincsar (1998), the earliest form of teaching is by using the behaviourist principles is in the form of 'direct instruction teaching' where the teacher controls the learning through "instructional procedures such as modelling" (1998: p.346-347). However, the notion of instructional teaching suggests that "higher cognitive skills such as reasoning and problem solving," does not come into play, which is not the case for most learning environment (see, Palincsar, 1998: p.347). Interest in cognitive processes has spark researchers to examine how knowledge is acquired and organised individually in comparison to in a group, and how the creation and use of language promote learning in a specific context. Piaget's cognitive constructivism displays the growth of children's cognitive through developmental stages set within specific ages (see Piaget, 1952; Lourenço, 2012). However, Piaget's theory not only points out the child's autonomy in

learning but also that learning occurs only internally rather than externally (see Amineh & Asl, 2015; Louvigne', 2018).

Although the stages of cognitive development have provided a way to chart the development course and its validation, Piaget's cognitive constructivism perspective was fist established around 70 years ago, and because of this, it was bound to have different interpretations and concerns around the relevancy of today's world (see Lourenço, 2016). One such issue concerns the individual differences of children, whereby changes in environment or context may affect the indicator of development, i.e., age. In a study conducted by Watanabe (2017) on the 'conservation concept' found in the concrete operational stage of Piaget's stages of development, the study questioned the reliability of the indicator in identifying the cognitive development of a child at a certain age (2017: p.68). The children were tested by using Piagetian tasks on length and numbers for 6-years-old on 4-years-old children. Given the tasks were indicated for 6-years-old children, the result should indicate a failure to finish the tasks, but this was not the case. Instead, what Watanabe's surveys showed was evidence of an 'accelerated cognitive development' by children younger than 6-years-old (Watanabe, 2017: p.72). Watanabe's study shows that Piaget's stages of cognitive development were not accurate in indicating the development of children in a specific context. Although the formal operational stage, which reflects the 'dependency' to context (Lourenço, 2012: p.285), occurs in children from age 11 to adulthood, Watanabe's accelerated cognitive development theory provides evidence of how context may influence the development even at an early age. Thus, revealing the importance of considering the relevance of context to cognitive development.

An approach that slightly differs from Piaget's cognitive constructivism is 'socialconstructivist' and the sociocultural theory (SCT) by Lev Vygotsky, a Russian born psychologist (Smith, 2010: p.22; see also Lantolf & Thorne, 2006 cited in Compernolle, 2014: p.1). Following the Piagetian theory, Vygotsky's social constructivist also agrees with the internal process of cognitive development in individuals but conducted through their external experience (see Smith, 2010; Lourenco, 2012; Schreiber and Valle, 2013). Vygotsky's approach views cognitive development as collectively co-constructed using symbolic actions and *semiotics* through social and cultural processes (: p.351. see also Vygotsky, 1987; Bruner, 1997; Smith, 2010; Lourenço, 2012). The social-constructivist perspective highlights the social "role of culture, [collaborative] learning attitude, and behaviour in the cognitive process" (Louvigne', 2018: p.133). Concerning this, the sociocultural approach also focuses on the transfer of knowledge or the "transmission of culture" from external to internal as interdependent behaviour mediated through symbolic tools (Palincsar, 1998: p.348; see also Compernolle, 2014; Mann and Walsh, 2017). Unlike Piaget, Vygotsky's perspectives also aid in "future independent problem-solving activity," which is why it was still used in contemporary learning theories and has relevancy and value when applied to the higher education context (Palincsar, 1998: p.353; see also Louvigne', 2018). Thus, development occurs when a child could use the concepts and principles learned through social to apply to new tasks and problems individually (see Palincsar, 1998; Louvigne', 2018).

Vygotsky's emphasis on the social and individual planes and acknowledgement of individual development due to 'disparate knowledge levels' reveals how development occurs first from the social (interpsychological) and afterwards in the child (intrapsychological) (Palincsar, 1998: p.351). Thus, the goal of education should align with the Vygotsky's concept of cognitive development, introduced as the Zone of Proximal Development (ZPD) (see Schreiber and Valle, 2013; Louvigne², 2018). The concept of ZPD measures the distance between what a child can learn independently compared to what a child can learn with guidance from experts or capable peers (see Vygotsky, 1978; Palinscar, 1998; Smith, 2010). ZPD offers a dynamic indicator not only in understanding children's cognitive development but also in providing a method to evaluate a child's 'intellectual abilities' through the mediation of instructions and scaffolding practised in teaching and learning processes (see Turuk, 2008: p.248). Bruner (1990), also argued that a critical "construct in SCT is that of 'scaffolding,' used to refer to how linguistic support is first provided by a tutor and then removed (Mann and Walsh, 2017: p. 197). Thus, to accomplish fruitful development, interaction practices, and learning should be in advancement towards students' ZPD (see Palincsar, 1998, Moskal, et al., 2016). Granted that ZPD does not offer practical guidance to apply in the classroom and no hierarchical or sequenced level of development, such as Piaget's stages of cognitive development (see Turuk, 2008). Nevertheless, for teachers to create an effective teaching and learning practices through social-constructivist and sociocultural theories that geared towards students' ZPD, they require the understanding of the concept of 'mediation' and the concept of 'scaffolding' through interaction (Turuk, 2008: p.250; see also Young, 2014; Walsh, 2013). By mediating the social relationships using symbolic tools and using scaffolding to provide linguistic support and reduce ambiguity in

the learning from an expert to an inexperienced child, a collaborative, interactive coconstruction of knowledge could be achieved (see Mann and Walsh, 2017).

3.5 CLASSROOM INTERACTIONAL COMPETENCE (CIC)

Central to accomplishing a successful collaborative interaction in the co-construction of knowledge requires the participants to attain interactional competence (see Kramsch, 1986). Interactional competence was derived from studies on 'communicative competence' devised by Dell Hymes (1972), which examines the speakers' techniques when using "linguistic, semantic, discourse, pragmatic, and strategic resources to convey meaning" (Walsh, 2013: p.46). However, the study of communicative competence focuses mostly on the individual speaker rather than a collective outlook of the interaction, which does not cover all of the aspects of communication as it requires a collaborative performance (see Walsh, 2013; Sun, 2014). Furthermore, to focus solely on the linguistic, semantics, pragmatics aspects, and fluency does not guarantee an understanding of the speakers and listeners ability to mediate through the local context, clarify meanings, and use features of interaction (see Markee, 2008; Young, 2014; Walsh, 2013).

Although it was necessary to focus on the relationship between linguistic and interactional resources, Kramsch (1986) also emphasises the need to include the "construction of shared internal context or sphere of inter-subjectivity [...] constructed through collaborative efforts of the interactional partners" (1986: p.367). Young expands on the theories of competence by including the 'participant's identity,' 'linguistic resources' such as register and modes of meaning' and 'interactional resources' such as speech acts, turn-taking, repair, and boundaries (Young, 2008: p.71). Therefore, considering the various aspects and resources of interaction in a specific context, interactional competence encompasses the participant's skill and knowledge to use their abilities in bringing about effective interaction (see Kramsch, 1986; Young, 2008; Walsh, 2013).

In the classroom context, teachers and students illustrate their ability to use "interaction as a tool for mediating and assisting learning" called the 'classroom interactional competence' (CIC) (Walsh, 2011: p. 132). CIC requires teachers and students to investigate the *interactures* used in their interactions in the classroom in-depth and apply them in their professional practice (see Sert, 2019). However, it is not enough for us to acknowledge the fact that teachers can change the way they interact without emphasising the main point of

acquiring interactional competence; is to 'enhance learning' create an environment for 'learning opportunities' (see Walsh, 2012). Thus, teachers need to become aware of their language use to be able to mediate language in providing space for interaction to occur in order to co-construct knowledge in the classroom (see Sert, 2019). By focusing on the development of teachers' CIC, not only will teachers be able to become aware of the *interactures* used but also can maximise the space for interaction, shape students' contributions, effectively use elicit and obtain a language for instructions (see Sert, 2019). However, tools or methods of observation, evaluation, and analysis are required to develop CIC.

3.5.1 DATA ANALYSIS

Developing CIC requires more than just an observation of the classroom *interactures*, and although most studies on CIC have used qualitative methods of collecting data, there are also several methods of analysing the data (see Sert, 2019). Conducting data analysis means making sense of the data, which takes the form of transcribed texts in this case. According to Brown and Rogers (2002), there are "over 200 different observation instruments existed" at that time, and Chaudron (2002) has noted around twenty-six systems for analysing interaction in the second-language classroom (cited in Ghaffarpour, 2016: p.211; see also Walsh, 2013). Three of the prominently used form of analysis for classroom interaction is the interactional analysis, conversation analysis (CA), and discourse analysis (see Ghaffarpour, 2016; Seedhouse; 2004; Walsh, 2006).

Interaction analysis involves the use of "observation instruments or coding systems" to allow an observer to record what they see or think happened at a specific moment (Walsh, 2013: p.97). Conducting observation involves a system, "an instrument with fixed categories pre-determined by extensive trials form different classroom context," for recording or marking off the objective at a specific time, making it a reliable form of 'objective' recording (Walsh, 2013: p.97). Adopting a pre-determined categorised system reduces the need to create a new system that lessened the need to validate as it involves a used system, compared with other systems, and usable during the observation or after the recording (Walsh, 2013: p.97). However, a reflective system with fixed, pre-determined categories may hinder the reflection in a context where external and internal factors influence the participants. Other than system-based interactional analysis, there are also *ad hoc* approaches, which provide a

more 'flexible instrument' by focusing on a specific field or problem of a specific context, which makes it more 'realistic' and significant (Walsh, 2013: p.98).

While interactional analysis has a more rigid structure by assigning utterance into specific categories, conversation analysis has a more natural approach (see Ghaffarpour, 2016). Conversation analysis demonstrates the need to look in-depth into the minutest features of discourse to achieve effective interaction. Conversation analysis illustrates that even in a well-organised conversation, social and human interaction are influenced by "feelings, thoughts, and attitudes" at a micro-level or by "sociocultural and economic contextual factors" at macro-level (Ghaffarpour, 2016: p.211). In conversation analysis, the sequence and organisation of the interaction are central to its meaning and context; thus, an interaction is context-shaped and context-renewing (Walsh, 2013: p.100. See also Seedhouse, 2004). Context-shaped and context renewing refers to how the input from one speaker depends on the one before and, subsequently, produces a new context for future interaction (see Walsh, 2013). The means by how the utterance relates and connects to another show how the interaction is organised (Walsh, 2013). Conversation analysis is advantageous for those who seek to justify the 'structural organisation of interaction' that the participants predetermined (Walsh, 2013: p.101). To conduct conversation analysis requires the use of empirical data where the patterns derived from, a participating observer, a dynamic and coconstructed context, 'goal-orientated' interaction, and 'multi-layered' data analysis (Walsh, 2013: p.101). Conversation analysis also applies to other forms of analysis, such as corpus linguistics, to seek an in-depth view of language from the use of words or phonetics or many more (Walsh, 2013). Walsh also sees the similarities of CA to "institutional discourse conversation analysis," where the intended goals and actions of participants are related and controlled by the institutional business side (Walsh, 2013: p.101).

Discourse analysis is the study of "spoken or written texts as a means of understanding their internal and external structure or logic (Walsh, 2013: p.23. See also, McCarthy, 1992; Gee, 2005). Discourse analysis follows a 'structural-functional' course in analysing data (Walsh, 2013: p.98; See also Sinclair and Coulthard, 1975). However, one of the arguments for this view of discourse analysis lies in the fact that "an utterance can perform multiple functions," which leads to categorising "naturally occurring interaction by referring to a discourse hierarchy" (Walsh, 2013: p.99. See also Stubbs, 1983; Levinson, 1983). However, sociocultural discourse analysis differs from linguistic discourse analysis for

being more concerned with the content, function, and the ways shared understanding is established than the organisational structure of verbal language (Kumpulainen et al., 2009: p.34). In a social-constructivist view, 'discourse' refers to how we use language to the co-construct knowledge of the world, people, and ourselves (see Paltridge, 2012). Therefore, the term discourse analysis refers to a way of understanding how knowledge is co-constructed through patterns of collective utterance and statements from spoken, written, and visual illustrations, which looked at specific features or objectives concerning its historical, cultural, and social relationships.

Discourse analysis has been known to have two different versions; discourse analysis (DA) and critical discourse analysis (CDA) (see Lichtman, 2010). The standard type of discourse analysis is referred to as Foucauldian's 'discourse analysis' (DA) as it emerges from the works of Michael Foucault and it works by "tracking changes and challenges historically in the mapping of the creation and maintenance of power-laden discourses" (Grbich, 2012: p.245-246). Although Foucault has a great interest in the workings of power relations in the discourse, he views the critical elements of discourse analysis regarding identifying the discourse that shaped how people see the world. Discourse analysis approaches the study of language by looking at patterns of the language across texts in addition to the social, historical, and cultural contexts where the texts occur (Paltridge, 2012: p.1). On the other hand, Fairclough introduced the critical discourse analysis (CDA), which seeks to view how the use of discourse in societal structures "secure and maintain power over people" (Grbich, 2012: p.245). Although there are minor differences between DA and CDA, one of the main points that differentiate the two techniques of analysis is that CDA relates the causes and effects of language use, which has a more significant relation to quantitative data (see Strauss and Feiz, 2013). Choosing the right method of data analysis goes back to what the study or research seeks to find, and thus, it is essential to consider the aims and purpose of the study before choosing which type of analysis would suit the study best.

3.5.2 SETT FRAMEWORK

One of the ways we can demonstrate CIC was using tools such as a self-evaluation of teacher talk framework (SETT) that considers the use of *interactional features* (*interactures*) in the teachers' talk (see Walsh, 2011; 2013). Walsh (2006) introduced a framework, which allowed teachers to evaluate and relate their use of *interactures* with the pedagogical goals intended at a particular *mode* in a moment in time (2006; 2011). In addition to the aspects of

interactures mentioned above, Walsh highlights the relevance of acquiring a 'clear idea of the learning context' and make specific the 'goals' intended for the interaction is in line with the interactional and linguistic resources, thus the *interactures* could be associated with sets of pedagogic goals that represent a micro-context called '*modes*' (Walsh, 2013: p.51; 2011). Using these as a basis, Walsh created the SETT Framework (Self-Evaluating Teacher Talk) that would allow teachers to identify and reflect on their use of *interactures* and develop their CIC for effective teaching and learning. The SETT Framework compromises of four *modes*; *Managerial*, *Materials*, *Skills and Systems*, and *Classroom-Context* and fourteen *interactures* called '*interactures*' (Walsh, 2011: p.110). The SETT Framework could be seen below:

Mode	Pedagogic Goals	Interactional Features
Managerial	To transmit information; To organise the physical learning environment; To refer learners to materials; To introduce or conclude an activity; To change from one mode of learning to another	A single, extended teacher turn which uses explanations and instructions; The use of transitional markers; The use of confirmation checks; An absence of learner contributions
Materials	To provide language practice around a piece of material; To elicit responses in relation to the material; To check and display answers To clarify when necessary; To evaluate contributions	Predominance of the IRF pattern; Extensive use of display questions; Form-focused feedback; Corrective repair; The use of scaffolding

Skills and Systems	To enable learners to produce correct forms; To enable learners to manipulate the target language; To provide corrective feedback; To provide learners with practice in sub-skills; To display correct answers.	The use of direct repair; The use of scaffolding; Extended teacher turns; Display questions; Teacher echo; Clarification requests; Form-focused feedback
Classroom Context	To enable learners to express themselves clearly; To establish a context; To promote oral fluency.	Extended learner turns; Shorter Teacher turns; Minimal Repair; Content Feedback; Referential questions; Scaffolding Clarification requests

Figure 3: Self-Evaluating Teacher Talk Framework (Walsh, 2006: p.66).

As seen from above, the four *modes* consist of *interactures*, which relates to the pedagogical goals the teachers seek to achieve in the classroom. The *managerial mode* focuses on the aspect of classroom discourse where the teachers use language to instruct the students or to move to another area of the learning goals. In this *mode*, the teacher has complete control over the students' actions and discourse. The *materials mode* consists of teacher talk that surrounds the materials for learning. In a traditional classroom, this *mode* can be found more often than other *modes* due to the perception that the teacher controls the classroom interaction. Although teacher talk is valuable in the process of teaching and learning, the input gained from students is the basis of learning. Therefore, the collaboration of teacher talks and students talk valuable in producing effective teaching and learning (see Kumpulainen & Wray, 2012). The *skill and systems mode* focus on the form of an utterance and the sentence structure. Even though the teacher has more control over the interaction, the

focus is on the students' sentence structure; thus, input from the students is necessary. The final *mode* is the *classroom-context* mode, where most of the learning occurs through collaboration and co-construction of knowledge. In this *mode*, the teacher provides space for students to participate by minimising teacher talk. The local context determined the organisation of the *classroom-context mode*. Thus in the *classroom-context mode*, genuine interaction is observed, and the teacher's role is to take a 'back seat,' where they listen, support, and provide the learners with an interactional space. (Walsh, 2011: p.113).

One of the ways of understanding the organisation of interaction is through the participants' use of turn-taking, where it involves how the turn to speak is being "held, or passed or taken or given" (Walsh, 2011: p.221). It is one of the *interactures*, which indicates that speakers can take control of their interaction. Turns are taken once a speaker has finished their turn, which is also called "turn completion," or turn could be extended depending on who takes control of the interaction (Walsh, 2011: p.4-5, 179-180). In aiming to encourage students' participation, there is a need for tutors to extend the learner's turn and shortens the tutor's turn. Overall, the SETT Framework provides an outline for teachers and students to reflect on their use of language in interaction by relating the interactures used to their own intended goals for that particular moment. A deeper understanding of this SETT Framework would allow teachers and students to use the SETT Framework to reflect on their interaction but also to use language as a tool in creating effective interaction during the intended moment. The focus of the SETT Framework concentrates on the teacher's talk, but this does not mean students' talk is neglected. It is an acknowledgement that teachers control the interaction in the classroom and have the ability to provide space for students to interact with themselves. Space for interaction can be provided or created primarily within the *classroom-context mode*, however, how the *mode* is used and organised effectively during the lesson depends on both the teacher and students as participants of the interaction. Thus, it should be considered for teachers and students to adopt the SETT Framework as a form of individual or collective reflective practice to improve on their ability to use language as a tool for effective interaction, (Walsh, 2013).

Although the SETT Framework was developed with the language classroom in mind, it also includes characteristics of content-based subjects. For content-based subjects such as science, the "learners answer questions, respond to cues, follow the teacher's initiative, avoid interrupting and so on" much like the *managerial, materials, and skills and systems mode* but

with some differences in *interactures* used and the intended goals (Walsh, 2013: p.21). An example would be instead of using form-focused feedback as in the *materials and skills and systems mode*; the teacher would like more likely focused on using content feedback. However, this does not mean the *classroom-context mode* has no use in content-based subjects; in fact, the use of the *classroom-context mode* would show the teachers the ability to plan the lesson to provide space for students to participate in their learning. Furthermore, using the SETT Framework to analyse data by relating *interactures* to the intended pedagogical goals at the moment is also a form of reflective practice (see Walsh, 2006; 2011; 2013).

3.6 **REFLECTIVE PRACTICE**

The SETT Framework raises fascinating issues of reflective practice and teachers' development. By understanding the organisation of interaction in the classroom, we also develop teaching and learning, and reflective practice as the central part of professional development. For most, reflection is a general term for conscious cognitive process of identifying the problems and finding solutions not only in pushing teachers to improve towards becoming an expert but also in incorporating their perspectives on teaching and learning (see Copeland et al., 1993; Calderhead & Gates, 1993). However, this definition of reflection seems to suggest that it is a compulsory routine process enforced upon individual teachers. Instead of finding problems in their teaching, Boud et al. (1985) emphasise on the concepts of action and criticality, which explains the need to have a systematic tool and dynamic outlook of a specific aspect of the classroom with an objective, critical view of teaching and learning (Walsh, 2013: p.113). Zepke (2003) view reflection as a collaborative process of "learning from our own and others' experience" and applying the new knowledge into our actions (cited in Mann and Walsh, 2017: p.18). Mann and Walsh (2015) adopted Dewey's (1993) more flexible view of reflection as the method to "escape from the purely impulsive or purely routine action," which showed the importance of the experiential form of learning and thought in reflection (cited in Mann and Walsh, 2015: p.351; see also Mann and Walsh, 2017). Aside from the need for a flexible reflective tool, Butler (1992) also mentioned that reflection is as "an evaluative dialogue that enriches the self and enhances professional practice," which suggests through collaborative dialogues new knowledge is shared and applied to practice (Butler, 1992: p.223). In agreement with Dewey (1933), Mann and Walsh also argued for the need to provide concrete evidence as a stimulus for reflection and

conducted through dialogue with experts or peers (Mann and Walsh, 2017: p.4; see also Walsh, 2013). From these definitions, we can decipher that reflection should involve gaining new knowledge through collaboration and dialogues, which are backed up or led by empirical evidence collected using appropriate tools (see Mann and Walsh, 2017).

Institutions have commonly adopted the written type of reflection as it provides a record of the reflection, which could be used as references and for further research (see Mann and Walsh, 2017). The act of writing is 'parallel' to reflection (Mann and Walsh, 2017: p.131). However, reliance on the written form of reflection without accurate data and empirical evidence may result in on-the-surface reflection, which loses the authenticity of the reflection, which is especially the case for the "checklist and Pro-forma" form of written reflection (Walsh, 2013; Mann and Walsh, 2017). In some cases, the focus of attention is on the writing rather than the reflection and thus resulting in 'faking it' as argued by Hobbs (2007) (Mann and Walsh, 2017). Reducing 'surface' reflection can be achieved only by providing a grading system for reflections but also by encouraging the use of dialogic written reflection thus, promoting teachers to become more proactive in their professional development (Walsh, 2013; Mann and Walsh, 2017). The grading system for reflection should correspond to teachers' development stages such as the staging system introduced by Zeichner and Liston (1987), which moves from 'technical reflection' to 'critical reflection' (Hill, 1997: p.193) or the five stages identified by Butler (1996), which begins at the 'novice' stage and moved up to 'advanced', 'beginner', 'competent', 'proficient', and finally to 'expert' through a meaning making process (1996: p.279). Though, there are some risks especially in the over-use of one model of reflective practise (RP) in an institution resulting in a reduction of its usefulness and may reduce practitioners to focus only on finishing the task and may lead to practitioner feeling put off since they are unable to explain their view (Walsh, 2013; Mann and Walsh, 2017). There is also the danger for the institution to lose its objectives when a specific model of reflection becomes a requirement and the 'focus of reflection' rather than the 'professional development' of teachers (Walsh, 2013: p.115). Consequently, using varied 'multimodal' approach according to the different stages and providing reflective task or challenge for systematic progression is essential in providing assessment for written reflection (Mann and Walsh, 2017: p.217). With a "structured, purposeful and well-supported" written reflection, institution could adopt a method of reflection that is not too complicated so 'budding reflection' is not 'stifled', used variation of forms and tools specified according to the stages and course content so as to avoid becoming

a mandatory 'institutionalised' activity leading to 'superficial and inauthentic' reflection (Mann and Walsh, 2017: p.20).

To provide varied forms of reflection and avoid viewing reflection as an individual process, Mann and Walsh (2017) encouraged the use of a "dialogic approach to reflective practice," which not only encompasses spoken reflection but also a 'collaborative' approach (2017: p.41). The dialogic approach to reflective practice arises from the socio-cultural theory (SCT), which stresses the "social, dynamic and collaborative" aspect of learning using language as a tool in mediating the interaction such as using scaffolding to provide a space for critical discussion (see Mann and Walsh, 2015; 2017). The blend of written and spoken reflection enhances the practitioner's critical thinking skills through collaboration and discussion of transcripts, digital media, "symbolic tools, and artefacts" (Mann and Walsh, 2017: p.189). However, spoken reflection is still underrated even though the conversation is an essential part of teaching and learning and the symbolic tools and artefacts in spoken reflection can act as a stimulus or catalyst for a more 'systematic,' purposeful, and "focused professional dialogue" (Mann and Walsh, 2017: p.189).

Another aspect of reflective practice emphasised by Minnis (1999) concerns the values of the local context of reflective practice. Reflective practice is also one of the primary elements of 'teacher training' in Brunei Darussalam as taught in the 'Institute of Education at *Universiti of Brunei Darussalam*' (Sim, 1996; 1997; Cited in Minnis, 1999: p.172). However, since teachers and educators have educated with western perspectives namely the constructivist approach of knowledge as "personally empowering and fulfilling and through individual enlightenment, society is enriched," teachers were expected to be more active (Grundy & Hatton, 1995: p.217; cited in Minnis, 1999: p.173). Minnis (1999) argued over the importance of filtering teaching and learning strategies "through the local culture if they are to be successfully adopted" (Minnis, 1999: p.176). Thomas (1997) also agree with the need for 'culture-sensitive pedagogy' for developing countries such as Brunei Darussalam where the "day-to-day behaviour patterns at home and in the school integrated into the curriculum and teaching methods" thus developing a "culturally grounded pedagogy", which is "relevant to students' understanding" (cited in Minnis, 1999: p.173).

The people of Brunei Darussalam abide by the ideology of *Melayu Islam Beraja* or Malay Islamic Monarchy (M.I.B.), and the principles were ingrained into their values and behaviour. The evidence of "high power distance and low individualism found in Brunei" infers the aversion in confronting any issues from those with authority (Minnis, 1999: p.180). Therefore, the concept of teacher as *agents of change* would deem inappropriate for Brunei teachers (see Cannella & Reiff, 1994; Minnis; 1999). Minnis (1999) emphasise the importance for Bruneian teachers to "find their rightful place in the school [to] not only confirms their place in the larger society but brings with it respect, status and a sense of oneness with society" (1999: p.180). However, it is worth noting that in the classroom itself, teachers have control over the activities and interactions in the classroom. Although the power of teachers in the classroom does not extend to the higher management of the school, reflecting and improving on their practice in the classroom has a valuable impact on the teaching and learning process, which is central to education. On the other hand, teachers who exhibit 'consumer mentality' are at odds with the "intellectually curious, assertive, and eager" behaviour of a reflective practitioner (Minnis, 1999: p.181. See also Gunn, 1993; Minnis, 1998).

Although the "culturally conservative nature of Brunei society and their ideology does not readily [accept] the wholesale transfer of western teacher education concepts", it should not be considered as impediments as it "could establish the foundation of a conceptual and programmatic framework that attempts to establish the limits and possibilities of reflection" (Minnis, 1999: p.179-182). On the one hand, the Bruneian values emphasised in Minnis's (1999) study may have changed in the past 19 years as more foreign teachers were employed, and more students were sent overseas for their education. The changes in values stipulate the need to use a flexible and interchangeable framework such as the SETT Framework, whereby it adheres to the sociocultural perspective of emphasising the concept of learning as a social and cultural activity and, therefore, should not impede on the Bruneian values.

For the reflective practice to be efficient and effective, it must be 'data-led,' where precise and detail forms of data were collected, such as through recordings of classroom interaction (Walsh, 2013: p.116). Although reflective practice is an individual task, there are more advantages in conducting a collaborative dialogic reflection that make use of critical reflective practice through dialogue (Walsh, 2013: p.117). Furthermore, the additional use of appropriate tools such as an '*ad hoc*' instrument like the SETT Framework would provide a 'context-specific snapshot' of a specific feature in the teaching practice and produce a task that allows for progression (Walsh, 2013: p.125). Mann and Walsh (2017) have also argued for a more data-led, and 'one of the most powerful means' of collecting empirical evidence is

through teachers' video recordings of their classrooms and use it as a stimulus for collaborative professional dialogue (2017: p.37). Conducting video recordings of the classroom interaction and using 'snapshots' of the video as a 'springboard' is referred to as 'stimulated recall' (Mann and Walsh, 2017: p.112, 116; see also Walsh, 2013). Stimulated recall not only provides the scope for clarifying, questioning, and commenting on the classroom interaction as it happened and thus, eradicating any misunderstandings, but also allow for clear commentary post-observation feedback, which provides the opportunity to cross-check the 'reality' of the data (Walsh, 2013: p.67). Since the opportunity to repeat and playback the stimulus is available by using multiple methodologies, there is also a substantial possibility for 'fine-grained analysis,' which then raises the participants' awareness of their use of interaction (Walsh, 2013: p.67). Aside from stimulated recall, other tools such as 'untranscribed recording' could reduce time and energy, which is advantageous for individual teachers who aim to collect short recordings that extract shorter and precise transcriptions (Walsh, 2013: p.66). In the case of SCT, data are processed in the form of transcripts and analysed through conversation analysis (CA) although Sert (2019) suggest the need to go beyond only CA and make use of other tools for a more qualitative data collection and analysis (Sert, 2019: p.222). For a 'micro-analytic approach' of the data, a preferred method includes the use of Ad hoc instruments for analysis as it is "designed by and for teachers" for a specific 'context' and with a particular purpose such as the SETT Framework introduced by Walsh (2006) (Mann and Walsh, 2017: p.204). The SETT Framework allows for an "up-close understanding of professional practice" even without any knowledge of reflective practice or creating transcriptions of the interactions (Mann and Walsh, 2015: p.357). The SETT Framework could be build up further by conducting multiple methodologies such as stimulated recall, which seeks to not only provide multiple perspectives but comprehensive detail representation of the context. Another multimodal method, which includes the use of the SETT Framework was through a series of steps involving the "introduction of CIC to teachers, micro/initial-teaching experiences, dialogic reflection on video-recorded teaching practices with the help of a mentor/supervisor/trainer, another round of teaching observed by a peer and teacher collaboration for peer-feedback (IMDAT)" (see Sert, 2015; 2019).

3.7 SUMMARY

The adaptation of the English language as the medium of instruction (EMI) embedded in the SPN21 generates a linguistic division in the language of the soul (Malay language) and the language of knowledge (English language). Although EMI provides quality education and opportunities for marketing and international relations, aside from linguistic division, the downsides also involve incorrect use of language, which leads to code-switching or the loss of the L1. If we consider that language is "learned by being used," then the focus of learning should be both on the language and the contents of the subject as in the Content Language Integrated Learning (CLIL) (Escobar Urmeneta, 2019: p.9). However, unequal treatment of both language and content may reduce the academic standards; thus, CLIL requires teachers who have skills in both the language and the content. Changes in the theoretical perspective of teaching and learning have led to changes in the study of classroom interaction. Although traditionally, the classroom has consisted of a primarily teacher-centred, successful learning environment has been known to be more student-centred and collaborative, with the teacher as the facilitator (Gayle, 2006; Napoli, 2004).

The concept of cognitive development through collaboration recalls Vygotsky's social constructivist and sociocultural theories, which focus on the act of learning as a social and cultural process where the symbolic tools and artefacts are used to reach the Zone of Proximal Development (ZPD). Vygotsky encourages learning to move towards ZPD, where it refers to the distance between what a child can learn on their own and what they can learn with the help of a professional guide (Smith, 2010). Although Vygotsky's theory offers a view of the importance of looking at learning both an individual and a collaborative effort, to ensure effective collaboration and co-construction of knowledge requires looking into not only the structure, function but also the meaning of an utterance in interaction as emphasised by the sociocultural and social-constructivist theories. Learning is thus viewed as socially constructed (interpsychological) and internally processed (intrapsychological) (Palincsar, 1998: p.351). To make sense of how language is used in the fast-paced and multi-functional classroom interaction requires adopting a system or tool for analysis. Some of the commonly used method of analysis includes the interactional analysis, which use coding systems for observations, the conversation analysis, which looks not only the micro-level of social interaction but also the macro-level, and discourse analysis, which used spoken and written texts to understand the internal and external aspects of meaning-making in the coconstruction of knowledge (see Walsh, 2013; Ghaffarpour, 2016).

One of the ways CIC is demonstrated is by using tools such as a self-evaluation of teacher talk framework (SETT) introduced by Walsh, which considers the use of interactional

features (*interactures*) in the teachers' talk and relating it to their intended pedagogic goals (see Walsh, 2011; 2013). The SETT Framework could act as an *ad hoc* method for teachers in language classrooms who taught discourse through discourse to reflect their use of *interactures* in micro-context called *modes* about their pedagogic goals (see Walsh, 2006; 2011). Although the SETT Framework was introduced with language classroom in mind, it is also essential to consider other subject areas as ensuring the development of CIC is the first step towards a collaborative classroom. Thus, it is imperative for a study that we consider the use of the SETT Framework in content-based subjects where "learners answer questions, respond to cues, follow the teacher's initiative, avoid interrupting, and so on" using language in interaction (Walsh, 2013: p.21). The framework is also working as a form of reflective practice for teachers and students to critically reflect on their use of language to improve their teaching and learning by developing their classroom interactional competence.

Although written reflection has been the go-to form of reflection for institutions as it provides a record for future references and research, Mann and Walsh have argued for a more data-led and dialogic approach to reflection as it reduces surface and inauthentic reflection (Mann and Walsh, 2017: p.20). The SETT Framework provides a tool for teachers' self-reflection by micro-analysing interactures (Walsh, 2013: p.110) aiming to develop tasks for 'progression' (Walsh, 2013: p.125) and applying new knowledge gained from collaborative dialogues. Taking into consideration the cultural and social aspect of Brunei Darussalam in upholding the M.I.B. ideology requires a culture-sensitive pedagogy (Minnis, 1999). Therefore, to conduct reflective practice requires a data-led observation, through dialogue between peers, culturally grounded, using snapshots of the classroom, could be conducted by individuals or collaboration, the use of *ad hoc* instruments and the ability to actuality teach how to conduct reflection. The flexible and dynamic form of the SETT Framework allows for its use in multiple methodologies, such as with the use of video recordings as a 'springboard' as in stimulated recall dialogues (Mann and Walsh, 2017: p.116). Using stimulated recall provides the scope to clarify, question, and to comment on their use of classroom interaction. However, the determining factor in choosing the methodology and data analysis requires looking back to the research questions and aims if the research.

Chapter IV: Methodology

"Deciding to intervene or withdraw in the moment by moment construction of classroom interaction requires great sensitivity and awareness on the part of the teacher, and inevitably teachers do not 'get it right' every time." (Mann and Walsh, 2017: p.13).

CHAPTER FOUR: METHODOLOGY CHAPTER

This chapter will outline the research design and research methods used for this study in regard to the purpose and aims, research questions, and theoretical framework. This study seeks to compare and understand how tutors' and students', from three different contentbased courses in Universiti of Brunei Darussalam (UBD), use *interactures* as compared to the SETT Framework by Walsh (2006; 2011). At the end of the research, this study hope to use a multi-method reflective practice to raise awareness of the participants' CIC, provide additional aspect of SETT Framework that are found in content-based subjects, and to encourage participation aiming towards creating a collaborative environment, and thus, improve the teaching and learning development in Brunei Darussalam.

This study emphasised on the knowledge that language can be used or organised by the speaker depending on external or internal factors such as the context, situation, the respondent, and the speakers' background influencing their speech, for example, one would speak differently to a teacher than to a friend. By realising the ability to modify the language, tutors and students should be capable of raising the level of participation in the classroom by ensuring 'that learners feel safe and included, which gives them the confidence to participate in the interaction' (Walsh, 2011: p. 10). Thus, by looking at the naturally occurring interaction between tutors and students, not only will this study reveals tutors' and students' CIC but also the level of participation displayed in the classrooms.

Previous studies have shown that understanding verbal interaction in the classroom is vital for language tutors who 'teach discourse *through* discourse with the learners' but this study highlighted the importance of discourse for tutors of content-based subject fields (Walsh, 2011: p. 19). Classroom interaction in content-based subject areas reveals not only the students' understanding of the subject matter but also in the ability of the tutors to manipulate language, encourage participation, and thus creating a collaborative environment. The main argument of this study is how interaction differs in the content-based classroom as compared to the language classroom by looking at how the *interactures* found in the SETT Framework and *interactures* found in content-based classrooms. Furthermore, this study also supported the use of multi-methods reflective practice aiming towards raising awareness of CIC and encourage participation in the creation of a more collaborative environment. This

study also hopes to develop the SETT Framework with findings from the comparison made with content-based classrooms in UBD.

The research questions are divided into four; firstly, what are the ways tutors from three different content-based subject areas in UBD use *interactures* in comparison to the SETT Framework? Secondly, how does understanding tutor's use of *interactures* encourage students to participate in their learning? Thirdly, what is the ways can *interactures* found in content-based subject fields be accommodated into the SETT Framework? Finally, how does understanding their use of *interactures* raise the awareness of the tutors' and students' CIC?

4.1 THEORETICAL PERSPECTIVES

The knowledge behind the research questions reflects Vygotsky, a Soviet psychologist's theoretical perspective on knowledge acquisition, whereby this study also adheres to the theory that knowledge is socially constructed and that language acts as the interactional medium in the process of teaching and learning (see Smith, 2010; Elder-Vass, 2012; Walsh, 2013). Vygotsky also emphasises on the need for learning to move towards the Zone of Proximal Development (ZPD), which explain the gap between the child's actual potential performed independently without the support and the child's accomplishments when they learn with the support of an expert (see Smith, 2010). ZPD could be observed in this study through students' use of *interactures* with their tutors as compared to among themselves.

As a sociocultural theorist and social-constructivist theorist, Vygotsky demonstrates the need to co-construct the subjective meanings and functions of language, which vary according to specific contexts through a social and cultural process such as learning (see Creswell, 2009; Palincsar, 1998; Walsh, 2011; 2013). The goal of researching a social constructivists' view is to "rely on the participants' natural views of the situation" in order to interpret the meanings created by the humans through social and cultural means (Creswell, 2009: p. 8). Thus, this study's goal is to use the natural setting to interpret the meanings of verbal interaction strategies co-constructed between tutors and students during teaching and learning in the classroom.

The emphasis on social interaction as one of the primary ways in which we coconstruct knowledge adhere to Vygotsky approach whereby a person will only be able to improve by involving themselves with "various forms of social interaction" using socialnatured 'tools' (such as pencil and computer) and 'signs' (such as language and mathematical formulas) (Lourenço, 2012: p. 282). By focusing on the communications produced through collective interaction between tutors and students in the classroom and the crucial role of tutors in facilitating space for the co-construction of knowledge using language as tools and signs, the study observes Vygotsky's theory. According to Lourenço, Vygotsky's "constant subordination of the individual to what comes from the exterior and transcends, as it were, the individual" displays how Vygotsky sees that the development of knowledge requires the existence of an external social structure (Lourenço, 2012: p. 284). Thus, the tutor plays an essential role in helping students "reach their greater potential through learning in a social context" (Smith, 2010: p. 22). The role of tutors as facilitators of knowledge development may be seen more clearly in the context of higher education, where the students should have acquired higher thought order cognitive skills such as reasoning and problem-solving.

Following the social-constructivist and socio-cultural theories, this study also adheres to the idea that language is a vital component in the classroom, and understanding the use of language requires looking into the participants' classroom interactional competence during the social and cultural processes of teaching and learning. Conducting this research in a country, which has a focused and integrated ideology requires a flexible yet specific focus methodology and analysis. This study incorporates social constructivist and socio-culturalist theoretical frameworks regarding its approach to knowledge as a socially co-constructed understanding gained through interaction. Therefore, with the use of SETT Framework, which not only relates to the sociocultural theory by providing a system of looking specifically into the features of the interaction and its relation to the social process of learning but also in providing a flexible system for reflective practice (see Walsh, 2013).

Some components of this study drive it towards a qualitative method of research and these are; an interpretivist paradigm, researching about people, the use of natural setting, the crucial role of the researcher, in-depth study of the situation in its entirety, the move from specific to general, and the subjectivity of the study. As a subcategory of qualitative research, Interpretivism, highlights the importance of "analysing meanings people convene on their actions [and] accepts that reality is virtually shaped by various forces" (Lichtman, 2010: p. 20). Elements of interpretivism are mirrored in the study's purpose by reflecting on teachers and students use verbal interaction through stimulated recall while accepting that various

factors could influence their use of verbal interaction. Since this study deals with people as the subject of the research, there is bound to be some inconsistency and unpredictable situations that could occur while or after conducting the research. Thus, there is a need to be more flexible regarding the research design especially when we seek to look into the natural setting without making any significant changes that could affect the participants in any way as mentioned by Lichtman (2010) qualitative research comprises "studying things as they exist" instead of engineering "artificial situations or experiments" (2010: p. 15).

Another aspect of conducting a qualitative study is on the subject of in-depth study. It is critical for qualitative research to "look deeply at a few things [but as a] whole in its entirety," which could be conducted in different ways (Lichtman, 2010: p. 18). Thus, every small detail from the data is considered relevant and important evidence (see Seedhouse, 2004). The approach to the area of research should be using 'inductive reasoning,' i.e., "from specific to general" (Lichtman, 2010: p. 5). The focus of this analysis is, therefore, on comparing snapshots of the use of interactures in the classroom as an approach to understanding how promoting a collaborative environment in content-based subject areas allows for a reflection of the tutors' and students' classroom interactional competence. Thus, to ensure the study acquires critically in-depth data requires a qualitative approach towards data collection, such as the use of observation and interviews.

4.2 CONTEXT & SAMPLING

Sampling conducted in the form of purposefully selected sampling within three different content-based courses, i.e., Geology, Biology, and English Language and Linguistics departments in the Universiti Brunei Darussalam (UBD). The classes will entail 'formal groups' (a stable group with the same people) of a tutor and several students who use the English language as a medium for teaching and learning (Lichtman, 2010: p. 167). Although the term of the *lecturer* is preferred in the UBD context, for this study, this study will be using the term *tutor* to refer to the lecturers in higher education who provides lectures, seminars, and tutorials facilitate learning and have a flexible and open approach to teaching (see UBD, 2011). It is important to discern the term tutor because while the term lecturer has a more limited view of the teachers as someone who controls all of the discourse in the classroom, the term tutors, however, provides a more flexible view of teachers as one who guides and facilitates the interaction towards learning.

The video observation was conducted not once but at least three times to provide a representative of the sample. The classes involved will consist of undergraduate or postgraduate students from the GenNext programme in UBD above the age of 18. Conducting this study in UBD provides scope to accomplish the goals of the GenNext programme, which approaches education in a "student-centric style and lays the foundation for life-long learning while also seeking to equip students with essential skills [such as] critical thinking, reasoning, and communication" (UBD, 2011). Furthermore, the University itself is currently developing initiatives to create a community that encourages students by "facilitating collaborative participation" (UBD, 2011). Thus, to reach this aim, there is a need to look into areas where actual learning and teaching take place, i.e., through interaction. Although most studies on verbal interaction in the classroom cover the study of second language acquisition in the language classroom, this study, however, focuses on how different content-based subject courses are also able to provide a collaborative environment.

For this research, one class from each three content-based subject fields are selected voluntarily according to the requirements of the study. Each class was headed by one tutor and up to 50 students. Most of the sample consists of Malay students and tutors who will be using their second language (English language) as the medium for teaching and learning with some insertion of the first language (Malay) where necessary. For each class, reoccurring video observation and interviews will be conducted depending on the schedule of the course and availability of the tutors for at least three times. The study will be conducted in three to four months, depending on the availability of the participants. Access to the participants was gained through the assistant register of the university and the assistant registrar of each faculty three months before the commencement of the fieldwork. However, contact of participants who volunteer for the study was provided through the Dean or Assistant Dean of the faculty who will inform the participants and their students. The researcher then proceeds by contacting the tutors to ask for their scheduled classes at that time, and the observation schedule will be arranged and agreed with the tutors. Students participating were also asked if they are willing to participate in the study by signing on the signed permission form. If students are unwilling to participate, they are not forced to sign, and their faces will not be recorded in the video observation.

The research will be conducted around the premises of the Universiti of Brunei Darussalam during office hours of 8:00 a.m. until 5:00 p.m. The researcher will conduct the

interview alone in a safe, noise-free room within the faculty building at the *Universiti of Brunei Darussalam*, which will be provided by the faculty administration officers.

4.3 METHODS

The research adopted multiple methodologies in two stages (observation and stimulated recall) to ensure full coverage of the various aspects of the research, to answer the research questions, and to collect in-depth qualitative data. The first and primary part of the research inquiries into how the different tutors use of verbal interaction by utilising the SETT Framework as a basis for features of interaction within the language classroom. An observation of the lessons using video recording is crucial to provide data, which focuses on participants' discourse about the tutors' and students' pedagogic goals. For qualitative research, participant observation is preferable to acquire an in-depth understanding of the meanings behind the participants' actions. However, to record naturally occurring interaction in its natural setting, it is more effective without the influence and intrusion of the researcher. Thus, it is best for the researcher to be present but remain unobtrusive in the students' activities. Conducting a non-participant observation would allow the researcher to reflect on how the tutors use of *interactures* in their natural setting without any disruption and thus, reducing the Hawthorne effect (see Masitah and Clarke, 2014). Therefore, it is beneficial for the researcher to attend the classes as a silent observer without participating in any activities conducted.

4.3.1 OBSERVATION

The first stage of this research is a non-participant observation using a video recording of the lecture or tutorial or practical classes in three different courses at the *Universiti of Brunei Darussalam*. This type of observation allows for an understanding of how classroom interaction is organised by tutors by the actions accompanying them (see Wilkinson and Birmingham, 2003). The researcher will be attending the lessons as a silent observer without actually participating in any activities conducted to preserve the natural setting. Before the observation started the researcher will place a camera facing the tutor at the back of the classroom or in between the students depending on the size of the room to ensure that tutors voice could be captured along with the students. The videos taken will then be used in the stimulated recall interview with both the tutors and students. The video will

run through the entire lesson to ensure that no valuable data is lost. However, only selected parts of the video will be shown during the interview to reduce the time taken.

The researcher will place herself at the back or at the corner of the class, away from the students to have a better view of the session and so as not to obstruct any activities conducted by the class. The researcher will start by taking note of the surroundings and describe the setting and participants when they arrive to ensure that a detail description of the setting could be explained and any external factors that may influence the interaction of tutors and students could be detected. The researcher will ask for a few minutes to explain in brief basically what the researcher intends to conduct, and signed permission forms will be given out. Students are allowed to decline their participation in the study, in which case the students will not be covered in the video recordings. No mention of any technical terms or a detailed description of the study will be made, as this may result in reactivity among the participants.

By silently observing, the researcher will be using the SETT Framework to focus on the tutors' use of *interactures* and its' relation to the tutors' and students' pedagogical goals intended by the tutors. The definitions of the *interactures* found in the SETT Framework could be seen in appendices 16. The researcher will be using a timeline to note down and code where or when the tutor uses these *interactures* and how effective is it used regarding the response of students' and tutors' pedagogical goals. Using a timeline will also help the researcher to pinpoint the time where the use of *interactures* is in line with the SETT Framework or where it differs or where the interaction is worth reflecting on during the stimulated recall interview. The use of the timeline was added due to changes made from the pilot study, where the length of the video recording makes it harder to pinpoint where exactly evidence of the use of specific interactures could be found.

The second part of the research is a follow-up of the first part, which consists of a stimulated-recall interview using the observation videos and focuses on critically reflecting on the meanings behind the tutors' use of *interactures* in the reflection of their classroom interactional competence (see Walsh, 2013). Adopting multiple methodologies such as the stimulated recall interview may pose as an intervention of the natural interaction setting. Nevertheless, the stimulated recall serves the research's purpose regarding offering scope for an in-depth clarification and critical reflection of the meanings, functions, and organisation of the participants' use of verbal interaction (see Walsh, 2013). Regarding validifying the research, the stimulated recall allows for cross-checking any comments with real evidence

that has been used as a stimulus (see Walsh, 2013). By doing so, the researcher is providing a platform for the participants to understand their use of verbal interaction and develop their interactional competence without any specific instruction on how to conduct this by the researcher. In a qualitative study such as this, the researcher plays a crucial role in designing the research, collecting the data, conducting the analysis, and interpreting the meanings of the data. Due to the high proportion of the researcher's involvement in the study, there is a risk that the validity of the research could be compromised. Thus, it is crucial for qualitative researchers to be aware of their role in the research and to keep a separate note for self-reflection while doing their research (See Lichtman, 2010). Conducting stimulated recall would also provide a platform for reflection on the researcher's part concerning the approach to interviewing the participants concerning the videos.

The video collected from the classroom act as a stimulus in the stimulated recall semistructured interview, an introspective method of recalling thoughts of participants in an interview through verbal or audio recordings (see Gass and Mackey, 2013). By using stimulated recall interviews, not only will the researcher understand the meaning behind the tutors' use of verbal interaction in the classroom and how the tutors encourage students to participate but also how the tutors could develop in their interactional competence and thus improve on the teaching and learning development.

Before the research is conducted, a three-day pilot study at a different institution, Brunei Polytechnic School (*Politeknik Brunei*), will be conducted. The research will consist of three days of observation and stimulated-recall interviews on a class of Malay students from the technical school. The participating class will be chosen randomly among the volunteers. Students and one teacher will be interviewed according to their availability and willingness to participate. Since videos will be taken, a permission letter must be attained from the Ministry of Education and the Director of Studies of the Polytechnic school. A letter of consent provided for the students obtains their permission to participate voluntarily in the research. The purpose of conducting this pilot study is to test the methods of data collection. Thus, the instructions and the researcher's role will be the same as in the original study. However, changes may be made depending on the circumstances on the context and the results of the pilot study.

4.3.2 STIMULATED-RECALL SEMI-STRUCTURED INTERVIEW

The participants for the stimulated recall interviews are voluntarily chosen among the tutors and students in the video observation, depending on their availability. The interview will be conducted within 2-3 days after the observation, depending on the availability of the participants and their willingness to participate in the interview. The reason for interviewing within two to three days is that "the less recent an event, the more likely expectations, rather than memory will be used for interpretation" (Gass and Mackey, 2013: p. 22). An interview schedule will be asked from each participant in each class where their contact information, date, time, and place of availability will be agreed upon between the researcher and the participants. The researcher will also require equipment to display the videos, i.e., using a laptop or projector if it is available in the interview room. Each participant is interviewed once to allow other participants who are unable to interview during the first session to be interviewed in the second or third session. The setting for the interview will be a room on the campus where it is accessible to both tutors and students. The room must be private and quiet to allow for a clear recording of the conversation. The interview will be recorded using a voice recorder. The interview will mostly use the second language (L2), English, but where it is necessary to help ease the participants in the first language (L1), Malay, will be used.

Snapshots of the videos will play for the participants before the interview or in between the interview where evidence of the interaction could be seen. The videos will be tested and reviewed before the interview can be conducted to avoid any problems during the interview. To identify and understand the participants' cultural and social background, the researcher will have to identify some "demographic areas of the participants," such as adults, marital status, and more. (Lichtman, 2010: p. 144). This information can also be used to ease the participants before the real interview took place by asking some starting questions, which could be either 'personal' (referring to themselves), 'concrete' (referring to a situation in relation with the participants) or 'feeling questions' (referring to their feelings on certain things around the participants) (Lichtman, 2010: p. 144). Although the researcher may use their own experience as a starting point for the interview, it is also important to note the amount of personal information revealed to the participants.

Another way of starting the interview is by 'developing a rapport,' i.e., "talking in general about neutral topics" such as weather or traffic. Lichtman (2010) also mentioned

some of the 'preliminary information' that the researcher has to keep in mind before conducting the interview, these are; the reason for being there, the purpose of the researcher, what to do with the information the researcher obtain, how will the researcher use the information and how much time will the interview go on (p. 144). Realising these tactics will help the researcher to realise what and how much is required from the participants during the interview. Another point to consider is the code-switching of L1 and L2 in the introduction to point out to the participants that they can use a mixture of L1 and L2 where it is necessary to explain their point and help them feel at ease. Gass and Mackey (2013) emphasise the importance of helping the participants unwind during the stimulated recall by showing that what they are asked to do is "not something very difficult or unnatural, and by helping the participants recall comments without any challenge, notion of appropriateness and without leading them" (p. 61).

It is also critically ethical for the researcher to obtain written permission from the participants before starting the stimulated recall interview. The written permission will also cover the purpose of the study, permission for the interview, permission for the use of voice recordings, the confidentiality of participant's personal information, and how the data obtained will be used. The next step would be for the researcher to explain the use of the video for the stimulated recall and how to operate it. The researcher will allow the participants to pause the video when they need to show an example of their use of the particular use of the interactional feature. However, the challenge of participants talking over the video recordings and the participants becoming engrossed in the video. Thus, the control of the video should be given to both the researcher and the participants.

Due to the use of video as a stimulus, the best option for this study is to use a semistructured interview where "a general set of questions" will be prepared for the first half of the interview for every participant focusing on the structure of the lesson, the tutors' interaction and the students' learning (Lichtman, 2010: p. 141). The second part of the interview will then cover open-ended questions covering topic areas concerning the participants' use of the *interactures*. By noting down the tutors' use of the selected *interactures*, the researcher seeks to understand how the tutors use the *interactures* in regards to the tutors' and students' pedagogic goals at that time and the students' responses to tutors' initiation. As for the students, the prepared questions will focus more on their understanding of the tutors' use *interactures* how they are motivated to participate in their learning. Depending on the participants' answers in the second half of the interview may also cover the tutors' and students' interactional competence, and the students' participation outside of the classroom. As a reflection of the study, during the interview, the researcher would also ask questions about how the development of the tutors' interactional competence and students' participation would improve their teaching and learning. What the data will bring is an indepth view of the workings of the tutors' interaction with the students in an environment that encourages the students' potential.

Regarding providing details of the study, the researcher must have extra care not to give out direct suggestions as to what specific *interactures* to use in order to achieve the intended pedagogic goals. However, the researcher may, for example, the question as to whether the tutors have ever felt the need to use any specific *interactures* and why if they do not. It is the tutors' choice in choosing to adopt the *interactures* or not. However, it is best for the researcher to keep in mind the meaning of using the chosen *interactures* concerning its pedagogic goals and the *interactures* uses in encouraging participation, as seen in Figure 1. Besides using voice recording, notes will also be taken during the interview. To avoid disrupting the flow or removing the researcher's focus from the participants' comments and answers, Lichtman (2010) cautioned that the researcher should not try to "take complete notes" or interrupt the participants but instead "concentrate on listening" to the participants' explanations, take notes of the questions and comments, and "plan the next question to ask" (2010: p.145).

At the end of the interview, the researcher should ask if the participants have anything to add and show their appreciation to the participants by thanking them. Lichtman (2010) also suggests that the researcher take time to arrange their notes, note down the length of time the interview took, mark the recording tapes, and write down any afterthoughts as a reflection (2010: p.145). It is an excellent practice to do a self-reflection at the end of the interview to make sure that all the areas are covered before going to the next interview and to minimise any bias feelings the researcher may have in the interview. The data gained from both the video observation and interview recordings will be kept by the researcher in a hard drive, but a copy is kept on a disk and a laptop for security sake. All the videos, voice recordings, and personal information of participants will be kept confidential, and only the researcher will be allowed to make copies of the data collected.
4.4 TRANSCRIPTION SYSTEM

Once the data has been collected, the videos will be coded using the *modes* and *interactures* (refer to figure 1 above) from the SETT Framework, while the voice recordings will be coded using the themes that arise from the observation data. Thus, there is a need to go through the whole video once for an "unmotivated looking" with the sole purpose of uncovering "patterns or phenomena" or themes that arises from the data. Then the researcher will pinpoint where in the video, the selected *interactures* took place to make it easier to choose the selected parts to transcribe. The videos will be presented according to the different subject fields so that a comparison could be made. As for the interview data, the themes that arise from the observation data will be used to code and pinpoint which part of the interview data is essential to transcribe.

Before conducting any form of analysis, the first step is deciding how to transcribe the data, which may take different forms. What is meant by transcribing is that the recorded data must undergo "the process of conversion into the text", which is necessary in order to procure the meanings and understand the data deriving from both the observation and interview (King and Horrocks, 2010: pp.142-143). In the case of this study, when verbal interaction plays a big part, it is far more valuable to conduct a 'verbatim' (word for word) transcription, especially for the observation data (King and Horrocks, 2010: p. 143). Although the interview data does not require detail and narrow form of transcription to answer the research questions, nevertheless, in keeping with the qualitative element of this study, it is best to use the same form of transcription as with the observation data but with a more straightforward format.

However, there is a need to consider the level of contextual features (such as nonverbal communication, paralinguistic aspects, and non-linguistic utterance) that are required in the transcription as this study focuses more on the use of *interactures* especially on turn-taking, repair, questions, scaffolding, feedback and clarification requests (see King and Horrocks, 2010). Due to the focus of the study on the use of *interactures*, it is thus not necessary to include any non-linguistic utterances such as laughter and sighs. Though, there may be some paralinguistic aspects such as voice intonation and non-verbal communication on the students' parts that represents the *interactures* and an indicator of participation, which is critically important if we would like to understand and interpret the meanings behind their use of verbal interaction, which takes us to the type of transcription system should we adopt. Choosing a type of transcription system will require taking into account some issues such as

how to organise the transcription, what to include in the transcription, e.g., gestures, pauses, intonation, and many more., and how much to transcribe. For this study, it is essential to arrange the transcription in a way that shows the turn-taking between the tutors and students, a narrow but not so detailed verbatim transcription, which may include some contextual features such as non-verbal interaction and paralinguistic aspects where it is necessary. Thus, this leads us to choose a system adopted by Walsh (2013: pp.145-146), as seen in appendices 17. This transcription system not only provides clear symbols to indicate the turn-taking of each participant but also includes symbols that indicate how the selected *interactures*, which are used to encourage participation, are organised. To reduce the time taken by transcribing the data, only selected parts of the video are transcribed according to where the chosen *interactures* could be found. The transcribed data must be checked with the original data to make sure that no mistakes are made.

4.5 SETT FRAMEWORK & THEMATIC ANALYSIS

4.5.1 PRIMARY DATA: SETT FRAMEWORK.

Conducting data analysis means making sense of the data, which takes the form of transcribed text, in this case. Concerning qualitative research, the process of analysis is an ongoing process of reflecting the data while collecting, making interpretations, and writing reports of the data (see Creswell, 2009). In line with the inductive reasoning of the qualitative research, the analysis moves from the specific to the general as urged by Creswell (2009: p. 184). Due to the two different methods of data collection, it is also crucial to have two different methods of analysing the data. In the case of the observation data, this study seeks to reflect, identify, and distinguish how tutors from different subject fields use *interactures* from the SETT Framework as a tool for reflective practice in the content-based classrooms. Another aspect of the analysis is in the use of codes in identifying specific parts of the recordings or transcription, which will be valuable for the analysis especially when the interaction is the focus of analysis, such as specific metalanguage is required to explain the meaning and function of the dissected parts of the interaction. For this study, the *interactures* found in the SETT Framework (see figure 3) are used as the metalanguage for the utterance used in classroom interaction. By doing this, patterns and organisation of the interaction concerning its pedagogic goals and function are revealed and understood. As for the data from stimulated recall interviews, codes are in the form of themes arising from the

observation data. By doing this, patterns arising from the observation data are clarified and understood.

4.5.2 SECONDARY DATA: THEMATIC ANALYSIS

In the case of the stimulated recall interview, however, the study sought to clarify and understand the meanings, function, and organisation of these *interactures* to help raise the participants' awareness of their classroom interactional competence. The stimulated recall also seeks to find the difference in the use of *interactures* found in content-based subjects as compared to language classrooms and the possibility of expanding the SETT Framework to fit diverse subject areas as a system for reflective practice and thus, improve teaching and learning development. Thus, a thematic analysis would be suitable in presenting patterns or phenomena on the development of interactional competence, expansion of the SETT Framework as a system of reflective practice, and the expansion of teaching and learning practices.

Thematic Analysis (TA) is a standard method used in qualitative research to identify "themes and patterns of meaning across a dataset in regards to a research question" (Braun & Clarke, 2013: p. 175). Braun and Clarke (2013) have identified four types of thematic analysis; firstly, it is the inductive thematic analysis whereby its purpose is to analyse the data "from the bottom up" without using any existing theory (Braun & Clarke, 2013: p. 175). Secondly, is the theoretical thematic analysis, which is the opposite of inductive thematic analysis as it uses an existing theory or theoretical perspective (see Braun & Clarke, 2013) Thirdly, is the experiential thematic analysis, which only investigates the participants' views and their experience (see Braun & Clarke, 2013). Fourth is the constructionist thematic analysis, whose focus is "on how topics are constructed and how accounts construct the world" (Braun & Clarke, 2013: p. 175). This research, however, seeks to understand how the use of SETT Framework on content-based subject fields could raise tutors' and students' awareness of their CIC and how language is used and arranged through the participants' use of *interactures*. Thus, the thematic analysis for this study would follow along with the lines of either theoretical thematic analysis or the constructionist thematic analysis.

Before going through the process of thematic analysis for this study, it is essential to understand what we mean by the term 'theme.' According to King and Horrocks, theme comprises of 'a repeated issue' that is 'distinct' but with some 'overlapping' due to 'blurred boundaries' between themes but it is up to the researcher to make the necessary choices concerning the identification of themes (King and Horrocks, 2010: p. 149). There are two ways of approaching the selection of themes; firstly, it is by using pre-assigned themes from the main theories of the research, which will be matched with the themes arises from the data, and secondly, themes are developed from the data itself. In this case, due to the qualitative element of the research question, which does pinpoint the themes to look into, the 'thematic coding' will be selected according to the findings of the data from the interview (see Braun & Clarke, 2013). However, it is essential to be precisely clear what each theme means so that there are no changes in meanings. Clarifying the themes is conducted by keeping a note of the codes and their definitions in a separate coding book. Once the themes have been identified and coded for all the transcribed interview data, it is essential to go through a similar process of reading the whole data once to get a sense of the general idea and rereading the data to specify which codes should be used for a specific quotation.

By using the SETT Framework conducted on the observation data, any phenomena or patterns that arise will be pieced together in the form of themes, which will be discussed about the participants' answers during the interview to understand the meanings behind the phenomena. A common method of arranging a report on the findings using thematic analysis is to "describe and discuss each of the overarching themes, in turn, referring to examples from the data and using direct quotes to help characterise the themes for readers" (King and Horrocks, 2010: p. 165). However, there is a disadvantage of using this method of reporting in a way that it is "difficult to gain much sense of how individual accounts are shaped," especially when all the findings are not separated case by case. (King and Horrocks, 2010: p. 165-166) This study also seeks to compare the uses of verbal interaction through selected *interactures* in three different subject fields. Thus, it is important to show the themes that arise from each dataset from each subject, and then the themes would be cross-checked to see any similarities and differences gained from the data. Each theme will then be reconsidered with the answers provided by the participation to ascertain the meaning behind their actions.

4.6 VALIDITY & RELIABILITY

Although qualitative research is usually most associated with validity rather than reliability, Creswell (2009) adopted Gibbs's (2007) definition of qualitative reliability in providing ways for qualitative studies to become more reliable, which this study will try to adopt as far as possible (see Creswell, 2009). Qualitative reliability is, therefore, defined as

how the researcher's consistency, concerning their approach to the study, with other research in similar fields (see Creswell, 2009). Thorough checks on the transcribed data were conducted mainly on the use of the transcription system and the similarity with the original data. A thorough check is also required on the meanings of codes, the use of the correct codes on the appropriate data, and cross-checking the codes with another researcher, especially for the interview data.

Qualitative validity, however, refers to how the researcher "checks for the accuracy of the findings" by using certain techniques (Creswell, 2009: p. 190). The first step towards validity has been taken in this study through the adoption of the stimulated recall interview, which seeks to understand the meanings of the participants' use of verbal interaction through in their own words. However, the stimulated recall must be done within three days to avoid participants using their expectations of what the researcher seeks to find rather than their actual memory of the event. Secondly, this study is allocated three to four months with the participants, which would give time for the researcher to understand the workings of the university and the participants involved. The stimulated recall interviews conducted for this study also allows the researcher to reflect on their chosen methodology and the purpose of the study, which could be used for the second and third observation and interviews. Another way of maintaining the validity of the study is by using an external observer's opinion on the study to minimise any bias that the researcher may bring to the study. A rich-detailed description of the findings would also help in showing the readers how it feels to be there during the observation and the interview thus, taking notes of the environment before conducting the observation and interview could assist the researcher in providing a complete description of the environment (see Creswell, 2009).

4.7 ETHICAL & PRACTICAL CONSIDERATION

Some of the more common practical concerns that arise when it comes to using observation as a method are cost, time, and energy, especially for naturalistic observation. Due to this, the researcher selects parts of the data to transcribe according to the *modes* found through selected *interactures* about the tutors' pedagogical goals (see Walsh, 2006, 2011, 2013). The number of observations conducted will vary concerning the number of lessons with the same group of students available within the time frame set (three to four months), wherein estimation there would be around no more than three sets of observations and interviews for each class. The observations will also cover several types of lessons from

lectures to laboratory lessons to tutorials providing the researcher with more variation of data and time for the researcher to analyse the data further before the next round of observation and interviews. Although transcribing the video will take time and energy. Nevertheless, it is worthwhile to do regarding having concrete evidence to refer to. Wragg (1999) also mentions that "transcripts does allow much more detailed analysis of the events," which will be important when it comes to the second part of the research where the videos will be used as a stimulated recall (Wragg, 1999: p. 14). Furthermore, the transcript will not compromise the whole lesson but only fifteen to forty-five minutes where the *modes* take place the most.

Some of the ethical concerns besides access to the samples would be the use of video-recording as not everyone likes to be videoed for many reasons. Thus, it is essential to attain written permission from each of the participants on their voluntary agreement to participate in the study. Through the signed permissions, the participants have also ensured the anonymity of their personal information in the thesis by presenting the data in the form of transcripts without any names mentioned. Students who were not willing to participate (those that do not sign) are provided with anonymity by not being included in the videos. Although the videos are mostly focused on the tutors, it is also essential to pinpoint what we need to look for in the observation and to have an idea of where the camera will be positioned. In the case of this study, cameras are position at one corner of the class, or in between the students at the back, depending on the capacity of the room, to ensure that the camera captures the interaction between tutors and students and to ensure that the tutors and students' voices could be heard from the camera.

Even though this study is much more focused on verbal interaction rather than nonverbal, nevertheless, it is important to note not only the "variation in the voice" but actions accompanying with it to understand fully why such actions are associated with the spoken interaction conducted (Wragg, 1999: p. 12). Furthermore, the students may respond to tutors' initiation by using non-verbal interaction, which goes to show the value of using a video to observe. Furthermore, the use of videos itself in an environment that deals with young people may be unethical without a consent form. There is also a need to explain the importance of using videos to the participants, which may cause the Hawthorne effect to occur if done wrong (see Masitah & Clarke, 2014). Therefore, it was considered conducting taking a few minutes before conducting the study to allow for a brief explanation of the importance of the video for the research with the chosen classes. Another significant ethical concern lies in the storage of the data. The data collected were in the form of soft copy; thus, the data could be easily stored and copied on the hard drive and computer for security in the case that some of the data got lost. The data are presented in the form of the transcript with no names or personal information attached.

4.8 **RESEARCH CONTRIBUTION**

By doing this research, this study hopes to provide a view of classroom interaction in different subject fields and how understanding the use of interaction could raise the tutors' awareness of their classroom interactional competence. Developing their classroom interactional competence would provide a way for tutors to develop on their teaching practices by improving on an aspect of teaching that they have been using without the need to adopt new multifaceted teaching methods. I also hope to understand how the use of specific interactures by tutors at the Universiti of Brunei Darussalam could encouraging students to participate in the classroom thus, help realise their potential by becoming more involved in their learning. This research could provide a step towards realising the University's initiatives in creating a community that encourages students by "facilitating collaborative participation" (UBD, 2011). By using the SETT Framework and stimulated recall, this study also hopes to introduce a different approach to conducting reflective practice in Brunei Darussalam. Furthermore, using the SETT Framework on content-based subject fields would benefit from expanding the framework to fit other subject areas. Finally, this study hopes that this research will be a stepping stone in realising the vision of Brunei's Ministry of Education in developing skills needed to cope with the social and economic challenges in the 21st century.

Chapter V: Analysis

"Effective change does not have to be time-consuming, in fact, it can take less than a minute and is often simply a question of knowing where to tap (Wiseman, 2009: p.6)

CHAPTER FIVE: ANALYSIS

5.1 INTRODUCTION

This chapter composes an analysis of the observational data and interview data collected for this study at the *Universiti of Brunei Darussalam* and the pilot study in a polytechnic school in Brunei. This chapter aims to provide a detail study and interpretation of the data collected in comparison to the different structures of sessions such as lecture or tutorial or seminar and the different courses such as ICT, Biology, Geology, or English Language and Linguistics. The interpretation will be backed up by the analysis of the interviews conducted with the participants. The approach to the analysis is made in the form of a bottom-up and interpretive approach where the data are used to extract any patterns, theories, or phenomena on the organisation or order of *interactures* in the university classroom in Brunei Darussalam aiming towards encouraging students' participation. Before starting the analysis of the data, it is essential first to recall the aims, purpose, and research questions of this study.

This study aims to compare and understand how the English language is used as a tool by tutors from three different courses at the *Universiti of Brunei Darussalam* in encouraging students to participate in the classroom. The purpose of this research is thus to provide a platform through recurring video observation and stimulated recall interviews for tutors to reflect on their interactional competence through their use of *interactures*. The research questions seek to answer; firstly, what are the ways tutors from three different content-based subject areas in UBD use *interactures* in comparison to the SETT Framework? Secondly, how does understanding tutor's use of *interactures* found in content-based subject fields be accommodated into the SETT Framework? Finally, how does understanding their use of *interactures* raise the awareness of the tutors' and students' CIC?

To answer the research question, two sets of data that has been collected; the observation videos and the voice-recorded interviews. For the observational data, the SETT Framework will be used to compare the different use of *interactures* from different courses by the order in which it is used and produced. As for the interview data, a thematic analysis

will be used on the voice recordings to provide further explanation or evidence to the theories that arise from the observational data. The primary data, which consists of reoccurring video observation of one class from three different courses, will be coded using the selected *interactures* from the SETT Framework, which aims to encourage participation (Walsh, 2006). Only snapshots or selected parts of the data, which aims to promote students' participation in the three different courses will be transcribed and used for the analysis. Only selected data will be analysed because the purpose of this study focuses on how tutors in content-based classroom use language as a tool to encourage interaction and participation.

The chosen extracts will be transcribed, compared, and presented according to the different contexts, i.e., lecture, practical, or tutorial. For each course, two sets of lectures have been collected and a set of either practical or tutorial. The secondary data will be coded using themes arising from the similarities and differences found in the three different subject areas with the use of SETT Framework as a system of analysis, and the chosen transcribed interview extracts will be used as evidence to explain any phenomena and theories that arise from primary data. The analysis will start by looking into the data collected during the pilot study, which was done to test the method of data collection.

5.2 PILOT STUDY

The first part of the analysis will cover the pilot study, which was conducted to test out the method of collecting data on other courses besides the language classroom. The pilot study took place at a polytechnic school in Brunei, which caters to students who have finished their GCSE O or A levels. The school offers a total of 11 Advance Diploma from four departments, i.e., the Department of General Studies, School of Business, School of Information and Communication Technology, and the School of Science and Engineering (PB, 2017). This study had the opportunity to be able to conduct video observation on one class from the School of Information and Communication Technology and Interviews with one tutor and six students from the same class.

The video observation was held in a medium-sized, air-conditioned, and brightly-lit classroom that could hold up to 20 to 30 students. There were around 16 students present on the day with a mixture of 10 girls and six boys. The language used in the classroom is mainly a variation of the English language. The tutor presented his lecture on a flat-screen television (smart TV) connected to his laptop. However, there were also instances where the tutor used

the whiteboard to demonstrate his point or a place for students to present and demonstrate their answers. Students sat facing the front of the classroom in rows of chairs with a small foldable table on the side. The lecture lasted around three and a half hours with a 30 minutes' break in between. The first half of the four-hour lecture consists of a review of the previous lecture, including detail feedback on the student's group task from the previous tutorial. The second part, however, was used to impart new information to the students while making a connection with previous lectures. The tutor himself is a Master's Degree holder who has taught in the school for two years. The tutor is a local Bruneian Chinese descendent. The course taught is in Information and Communication Technology (ICT). Due to the nature of the pilot study where only one class was observed, a comparison of two different classes cannot be made. Since the pilot study was only conducted to test the data collection method, observation of one lecture and seminar on a content-based subject was prepared to find out whether the method of data collection, i.e., observation and interviews, could answer the research questions.

5.2.1 PILOT STUDY – OBSERVATION 1 (TUTORIAL)

At the start of the tutorial lesson, the tutor recalls back a task set from the previous class, which he delegates to a representative from one of the chosen group to draw their version of the assignment on the whiteboard. The task, which consists of a mind map detailing the structure of an organisation or institution, has been completed by the students in their perspective groups. The tutor used this opportunity to present to the other students what has been done by the chosen group and whether there were any corrections that the tutor could point out. The process of copying their work to the board takes more than 10 minutes, which leads to the tutor assisting the student. Providing time for students to present their tasks allows for feedback to be given directly to the task and for students to become more involved in the lesson as it is based on their work.

Similar to the SETT Framework, the tutor used the *managerial mode* at the start of the lesson to instruct students to transmit information, to refer learners to materials, and to introduce an activity. The activity set by the tutor in extract 0.1 of appendices 1 seeks to recall the students' knowledge of previous lectures. The pedagogical goals found in the extract 0.1 below concerns the introduction of the content of the tutorial, the transmission of new information, and referring to the presentation shown on the TV monitor to the students.

Another pedagogical goal that could be found, which is not part of the pedagogical goals mentioned in *managerial mode*, was recalling prior knowledge, as seen below in lines 3 to 5:

Appendices 1: Extract 0.1

1.	Т:	All right (.) so good morning, everyone so today
2.		we are going through (2)(um) database design
3.		two (.) normalisations (2) so (1) last week
4.		(.) we have cover database design one (2)
5.		actually (.) ER diagram (2) right? (.)

The *managerial mode* in extract 0.1 shows the similar use of *interactures* as in the SETT Framework whereby not only there was a single extended tutor turn but also the use of confirmation checks and transitional markers were evident. However, the confirmation checks in lines 5 and 10 have a different purpose:

Appendices 1: Extract 0.1

1. T:	All right (.) so good morning, everyone so today
2.	we are going through (2)(um) database design
3.	two (.) normalisations (2) so (1) last week
4.	(.) we have cover database design one (2)
5.	actually (.) ER diagram (2) right? (.) so this
6.	is the (.) second part (.) there are many (.)
7.	ways to design your database (2) the first one
8.	is going through (.) your diagram (.) the
9.	second, going through (2) normalisation (3)
10.	okay? (.)

The first confirmation check on line 5 was used to recall and confirm the students' understanding of prior knowledge. The second confirmation check on line 10 was used to confirm that the student understands the new information. There is a fine line between the use of transitional markers and confirmation checks. There is also a tendency to use the word

"so" as a transitional marker throughout the utterance, but not all indicate the transition from one *mode* to another, some are used to indicate a change from one content to another.

Some differences with the *managerial mode* that could be detected in extract 0.1 of appendices 1, was in the presence of display question in lines 23-24, teacher echo on line 26, and content feedback in lines 26-29 as seen below:

Appendices 1: Extract 0.1

23.		(.) we do have (.) data redundancy (.) what is
24.		redundant? (2) data redundancy. (3)
25.	S1:	(ah::) same thing (uh) =
26.	Т:	same thing (.) correct (.) repeated (.) data
27.		(2) then (.) data dependency (2) level of (.)
28.		normalisations (.) there are few level (.)
29.		which you have to go through (.) one by one
30.		(.)okay?

The display question signals the tutor's attempt to provide practice on students' subskills in the content knowledge. The display question focused on prior knowledge of the content. The display question could be found in the *materials mode* and *skills and systems mode* of the SETT Framework; this shows the tutor's attempt to shift the *mode*. The teacher echo on line 26 was used to confirm the students' contribution as the correct answer, which was emphasised by the word "correct" uttered after the teacher echo. Teacher echo was another *interacture* used in *the skills and systems mode* of the SETT Framework adopted in the extract 0.2. Content feedback was used in lines 26-29 to provide corrective feedback on students' content knowledge. Although content feedback could only be found in the *classroom context mode* of the SETT Framework, the use of content feedback in a contentbased classroom was to provide corrective feedback instead of promoting oral fluency. The changes in the use of *interactures* in extract 0.1 showed the tutor's attempt to change the *mode* from *managerial mode* to *skills and systems mode*. However, the use of content feedback showed an extended tutor turn, which shifted the *mode* back to *managerial mode*. In extract 0.2 of appendices 1, similar pedagogic goals to the *skills and systems mode* in the SETT Framework regarding providing corrective feedback and displaying the correct answer. However, there were also differences in the *skills and systems mode* whereby the focus is on the content and not on the language form. Thus, the pedagogic goals also involve enabling learners to produce the correct answer and provide space for learners to practice their knowledge of the content. The *skills and system mode* was seen to go on for an extended period as the tutor continuously assess the students' knowledge of the content. Although the students were provided space to talk, there was still a longer tutor turn. However, the tutor continuously uses *interactures* that could be found in the *skills and systems mode*. The extract 0.2 of appendices 1 shows that the tutor's pedagogical goals were to test the students' knowledge by using display questions as in 4 to 6, 18 to 19, 27 to 28, and 37 to 38.

Appendices 1: Extract 0.2

4.	Τ:	See what is it (2) okay so (2) before
5.		(.) creating and using a database (.) what
6.		should we do?

Appendices 1: Extract 0.2

18.	Т:	То	crea	te f	irst,	, r	ight	? (.)	So	(.)	before	you
19.		cre	eate	what	(.)	do	you	do?				

Appendices 1: Extract 0.2

27.	Т:	from	there	(.)	what	do	you	do	(.)	after	you
28.		analy	yse? (2	2)							

Appendices 1: Extract 0.2

37.	Т:	as	(.)	what	are	they?	(2)	What	is e	ntit	zy?	(.)
38.		can	you	give	me	(.) (um) or	ne exa	ample	of	ent	ity=

The questions in lines 4-6 and 37 imply that the students have prior knowledge of the answer. By conducting this type of display question, the tutor seeks to start a discussion by referring to the students' prior knowledge. Instead of focusing on the forms of utterance

produced by students, the tutor focused on the content of their response to indicate their understanding of the subject. The display questions in lines 18 to 19 and 27 to 28 were used for scaffolding the students answer by modelling a situation and assess the students' knowledge of the next step. The focus of these display questions was also on the content on the subject. The multiple uses of display questions produce IRF forms and act as a scaffolding to extend students' contribution.

Similar to the Skills and systems mode, the clarification request produced by the tutors in extract 0.2 was also used to clarify the students' contribution, as seen in lines 13 to 15, 20 to 22, and 29 to 31.

Appendices 1: Extract 0.2

13.	SS:	plan the, (3) ((2)) [SS talk among themselves]
14.	Τ:	Sorry? =
15.	SS:	[SS talking among themselves]((2))=

Appendices 1: Extract 0.2

29.	SS:	<pre>plan/planning/((2))</pre>
30.	Т:	(hm?) (2)
31.	S1:	plan (2)

The clarification request on line 14 was brought about by the students' unclear response, as seen in line 13. However, in line 21, the clarification request was also used to expand and reformulate students' contributions as scaffolding as seen below:

Appendices 1: Extract 0.2

20.	S3:	analysing((2)) =
21.	Т:	analyse? So:: (2) analyse and then? (2) you
22.		analyse the business rule (.) right? So you go

The additional function of the clarification request in line 21 may be due to the unexpected response received from the students. Line 21 also showed tutors' use of teacher echo as clarification request revealed from the raised intonation indicating a question posed

to allow students to clarify and expand on their answer as also seen in lines 9, 12, and 32 of extract 0.2 of appendices 1. This is confirmed on line 12, whereby the tutor expanded on the teacher echo by rephrasing the students' answer with a question; "How do we initialise?" or on line 21 where the word "so" was elongated and a pause was issued for about 2 seconds before the tutor scaffold with "analyse and then?". However, for line 12, the teacher echo elicits a response from the students, albeit in the form of unclear chatter while in line 21, there was no response, and after two seconds, the tutor continues to clarify what he meant. Although there is no evidence of direct repair, the use of teacher echo and short wait time shortened student's turn and expanded the teacher turn instead, as seen in lines 21, 41, and 43 of extract 0.2 in appendices 1. Therefore, aside from repeating students' contribution, the teacher echo has also been used as clarification requests with the intention of scaffolding to extend or reformulate students' answers.

Some of the differences between the SETT Framework and the *skills and system mode* found in extract 0.2 of appendices 1 were in the lack of direct repair and the use of content feedback instead of form-focused feedback. The use of content feedback, as seen in lines 15-18, 20-26, and 31-38, also acts as scaffolding was used to extend the students' answers with the correct answer and as corrective feedback focusing on the content.

Appendices 1: Extract 0.2

15.	SS:	[SS talking among themselves]((2))=
16.	Τ:	before you actually start (.) creating(2)of
17.		course before you:: start using (2) you have
18.		To create first, right? (.) So (.) before you
19.		create what (.) do you do?

20.	S3:	analysing((2))=
21.	т:	analyse? So:: (2) analyse and then? (2) you
22.		analyse the business rule (.) right? So you go
23.		to the organisations (.) and the organisations
24.		will say (.) please do database for us (.)

25.	then	you	see	what	they	actually	(.)	do	(.)	how
26.	they	(.)	how	the	(.) tł	ne procedu	ire	okay	? (.)

Appendices 1: Extract 0.2

31.	S1:	plan (2)
32.	Т:	you plan (.) you? (2) design okay? So (.) you
33.		design (.) so:: from there (.) the business
34.		plan itself (.) business rules (.) we learn
35.		about(2) entity (.) attribute your
36.		relationship (.)cardinality ratios (.) so such
37.		as (.) what are they? (2) What is entity? (.)
38.		can you give me (.)(um) one example of entity=

Unlike the *skills and systems mode* in the SETT Framework, this *mode* differs in the use of content feedback and lack of direct repair. The content feedback also serves as a build-up to the display questions. Although the purpose of using content feedback in the SETT Framework was to promote oral fluency and thus extend the students' turn, this was not seen in the extract 0.2 of appendices 1. The feedback in extract 0.2 showed the tutors' focus in the content as opposed to using form-focused feedback in the *materials mode* and *skills and systems mode* of the SETT Framework. Although the use of content feedback encourages oral fluency and enables students to express themselves in the SETT Framework, this was not the case in the extract 0.2 due to the use of display questions. Content feedback was primarily used for students to display the correct answer or provide hints in the form of scaffolding, such as in lines 16-19 or 32-38 above.

16.	Τ:	before you actually start (.) creating(2)of
17.		course before you:: start using (2) you have
18.		To create first, right? (.) So (.) before you
19.		create what (.) do you do?

Display question and content feedback were produced by the tutor in extract 0.2 as an extension scaffolding of the students' answer thus, extending the tutor's turn in comparison to the students' turn as seen in lines 19 and 38 above. Tutor's use of modelling form of scaffolding provided a context for discussion, but the use of content feedback with hints of the correct answer and display questions restricted the students' contribution. Thus, the scaffolding was not effectively used, resulting in short students turn in some parts of the interaction as in lines 20 and 39, where there was only a short period of wait time where the students only provide short answers before the tutor continues with another display question.

Similar to extract 0.1 and 0.2, the extract 0.3 of appendices 1 featured *interactures* from both the *materials mode* and the *skills and systems mode*. The whole lesson in extract 0.3 below showed shifts between *materials mode*, to provide feedback and elicit a response to the materials, and to provide practice for student's sub-skills on the content-knowledge, as seen from the extracts 0.1 and 0.2. Although opportunities for *classroom-context mode* was conducted by using modelling scaffolding, clarification requests, and content feedback but the *classroom-context mode* was restricted by the use of display questions, which was also seen in extract 0.2.

The extract 0.3 of appendices 1 started with the tutor's use of content feedback on the task drawn by a selected student on the whiteboard to reflect on the material and elicit a response from students. By using content feedback, the tutor establishes a context for discussion, but the use of display question at the end of the feedback was seen restricting students' response to displaying only the correct answer as in extract 0.2. However, due to the tutor's mistake in reading the task, an extended student's turn was found in lines 5 and 8 to 10, where students were showing where the answer could be found in the task.

4.	Τ:	so how we link?]=
5.	SS:	ada jua tu (.) di sana = [SS pointing at TV
6.		monitor]
7.	Т:	where?
8.	SS:	tu:: sana
9.	S1:	tu:: di atas

10. S2: top (.) top right [laughter]

Similarly in the SETT Framework, clarification request was used in extract 0.3 of appendices 1 to ascertain and clarify where the students contribution of the correct answer to the display question was as seen on line 7, where the students' pointed out the answer to the display question in line 4 by referring to a place in the material. Although the use of clarification requests was not intended by the tutor, it allows the students to expand their contribution especially with the use of L1.

Although another attempt to extend students' answers through modelling scaffolding were found in lines 16 to 20, the use of display question restricted the students' response. The use display question in lines 18 to 20 thus, led to an extended unintelligible utterance found on line 21, where students discussed the answer amongst themselves.

Appendices 1: Extract 0.3

16.	patient is admitted to (2) ward, right? (.)if
17.	I'm a patient (.) I come in I tell you my name
18.	(2) I tell you my name (2) how do I know (.)
19.	which ward am I go to? (2) because there's a
20.	link here (.) how do I know?
21. SS:	((2)) [SS talk among themselves]

Display questions found in lines 14 and 18 to 20 were used to provide practice by focusing on the content of the task and checking the students' understanding of the content. The display questions in lines 18 to 20, however, were also used as part of the modelling scaffolding to provide a context for discussion on specific content.

14. T:	(.) patient, and what? (3) okay here (.) look
15.	here (.) [T point at TV monitor] you see (.)
16.	patient is admitted to (2) ward, right? (.)if
17.	I'm a patient (.) I come in I tell you my name
18.	(2) I tell you my name (2) how do I know (.)
19.	which ward am I go to? (2) because there's a

In extract 0.3, the two types of scaffolding were used, the modelling scaffolding and extension scaffolding. By conducting modelling scaffolding, the tutor established a context for discussion by using an example; thus, providing the students with practice on students' knowledge of the content and providing corrective feedback on the material. The modelling scaffolding could be seen in lines16-20 above. However, the tutors also used extension scaffolding to extend students' contributions, as seen in lines 22-28, and although the students' contribution was unclear, the tutors' use of extension scaffolding here was to provide the correct answer and confirm the students' understanding of the explanation for the correct answer as seen below:

Appendices 1: Extract 0.3

22.	Т:	from the patient table you have patient I D
23.		(.) patient number (.) address (.) and you
24.		have the name, right? (.) which is linked (.)to
25.		a ward which you have (.) a name (.) a
26.		location (.) an I D (.) okay? (.) I believe
27.		this refers to the ward I D (.) right? (.) the
28.		ward name (.)emergency and all these things (3)

In the SETT Framework, content feedback is used in the *classroom-context mode* but as seen in extract 0.2 of appendices 1 the use of content feedback was more relevant rather than form-focused feedback in the content-based classroom. The use of content feedback in the SETT Framework allows the students to express themselves clearly as they were not restricted to focus on the form of their answer, but this was not often the case in content-based classrooms where the focus of learning relies on providing the correct content knowledge. The use of content feedback was seen in lines 11-13 of extract 0.3 in appendices 1, whereby the content feedback provided the answer to the display question in lines 18-20 and concluded the feedback and provided an explanation to the questions raised. Thus extending the tutor's turn and reduced the students' contribution.

Appendices 1: Extract 0.3

11. T:	yeah (.) yeah (.) (ah::) (.) [SS laugh] okay
12.	(.) admission I D (.) patient I D (.) (ah)
13.	yeah that's fine, (2) don't you think it's
14.	(.) patient and what? (3) okay here (.) look
15.	here (.) [T point at TV monitor] you see (.)
16.	patient is admitted to (2) ward, right? (.)if
17.	I'm a patient (.) I come in I tell you my name
18.	(2) I tell you my name (2) how do I know (.)
19.	which ward am I go to? (2) because there's a
20.	link here (.) how do I know?
21. SS:	((2)) [SS talk among themselves]

Aside from content feedback, the use of confirmation checks was also used in extract 0.2 of appendices 1. The use of confirmation checks confirms the students' understanding of the content. There was a need to use confirmation checks to keep up-to-date with students' understanding of high-content information transmitted, which was noticeable with the use of confirmation checks after the information has been transmitted, as seen in lines 16 of extract 0.3 in appendices 1. Overall, extract 0.3 showed the tutor's use of both *materials mode* and *skills and systems mode* regarding the pedagogical goals and the choice of interactures used. However, similar to extract 0.2 to 0.3, the use of content feedback and confirmation checks were familiar to the content-based classroom in the pilot study. The difference between the extracts 0.2 to 0.3 in comparison to extract 0.3 lies at the start of the *mode* whereby the tutor started with display question instead of a modelling scaffolding.

Code-switching between English and Malay language could also be seen in extract 0.3. Code-switching was mainly produced by the students, as found in lines 5, 8, and 9. However, there were cases where the tutor had to use code-switching to gain attention or to ensure students understanding, as seen in extract 0.1 of appendices 1. In the case of extract 0.3, the students used code-switching to clarify and emphasise their point, which in this case was to point out the answer to the question the tutor seeks on the material. The repetition of

the utterance "tu" (which refer to there in English) in lines 5, 8 and 9 showed the students pointing to a specific area on the material, but when this was not understood by the tutor, the students switched to the English language as on line 10.

Appendices 1: Extract 0.3

4.	Т:	so how we link?]=
5.	SS:	ada jua tu (.) di sana = [SS pointing at TV
6.		monitor]
7.	Т:	where?
8.	SS:	tu:: sana
9.	S1:	tu:: di atas
10.	S2:	top (.) top right [laughter]

The employment of different *modes* in one micro-context, as seen in extracts 0.2 and 0.3 of appendices 1, showed the tutor's initiative in providing a micro-context where not only the content information was transmitted but practice in students' sub-skills were provided. However, it also showed how unclear the lines are between one *mode* to another. Aside from displaying questions and eliciting students' responses on the material, the foremost pedagogical goal was in providing corrective feedback on the task set in the previous lesson. Several similarities and differences could be found between the SETT Framework and the micro-contexts found in the first observation above. The similarity was found in the use of *managerial mode* at the beginning and end of the lesson to provide information, refer learners to materials, and organise an activity. Although there was evidence of *materials mode* and *skills and systems mode* being used, the focus of interaction was on content rather than a form of language use, as seen from the use of content feedback in a content-based classroom did not result in extended students turn as in the *classroom-context mode*.

Although there is similar use of *interactures* found in the SETT Framework, certain *interactures* were either not found in the SETT Framework, such as code-switching or was not used in the same way such as content feedback. Code-switching from L2 to L1 was produced mostly by the students to emphasise their point of view and to close the gap

between tutors and students. The tutor was also found to use code-switching to get the students' attention and to make sure the students' attention was where it should have been, as seen in extract 0.1.

5.2.2 PILOT STUDY – OBSERVATION 2 (LECTURE)

As mentioned above, the first part of the lesson was a tutorial session focussed on the feedback for the students' task set during the previous lesson. Looking at the format of the lesson regarding the pedagogical goals, the first part of the lesson was more appropriate as a tutorial due to the amount of review and feedback the tutor used in comparison to the second part of the lesson. The second lesson also took part in the same classroom as the first lesson. The tutor also used the whiteboard and TV monitor as materials to present the lecture. Notes were not provided as the presentation and notes have been uploaded before the lesson through the school's online portal.

The extract 1.1 of appendices 2 below showed the similar use of *interactures* as in *managerial mode*, especially with the use of extended tutor turn and absence of students' turn. The tutorial session started with the tutor recalling previous knowledge to introduce a new topic. However, the presence of a display question in line 1 indicated that a different pedagogical goal was intended. The pedagogical goal thus seeks to provide information, provide students with practice in their sub-skills, check students' understanding, and display questions.

Appendices 2: Extract 1.1

1.	Τ:	so what normalisation is? (4) Normalisation is
2.		a process (.) to convert (.) a data structures
3.		into se, (.) (um::) (.) several (.) simple (.)
4.		stable data structure (.) so basically you have
5.		a big structures (.) you want to convert them
6.		into smaller (.) smaller (.) smaller one (.)
7.		which you can (.) (um) (.) manage them
8.		individually (.) without affecting the others
9.		okay? (.) So, we will see more examples later

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10. (.) so (.) it is a process (.) of (.) assigning
11. attribute (.) to (.) entity (.)

Even though a display question was used at the start of the extract 1.1 and expanded wait time was provided, the fact that students do not provide any response showed their confidence in the tutor to provide the correct answer. Aside from the display question on line 1, there was no other display question found in the extract 1.1 due to the unfinished explanation of the meaning of "normalisation" or the display question was meant to be rhetorical rather than a real question. The display question was an attempt to shift the *mode*, but due to the lack of response, as seen by the pause on line 1, resulted in an extended tutor turn, and the *mode* remained in *managerial mode*.

Other than the display question, other *interactures* found in extract 1.1 of appendices 2 resemble those found in *managerial mode*. The use of transitional markers in lines 1, 4, 9, and 10, however, does not signal the shift from one *mode* to another, but instead, it signalled the change from one point in the content to another. The other *interacture* found in extract 1.1 was the use of confirmation checks, where the tutors used to confirm the students' understanding of the utterance made by the tutor. Confirmation checks were also used in line 9 after the definition of "normalisation" has been mentioned by the tutor in lines 1-8 as seen above. Unlike in extract 0.2 of appendices 1, the use of confirmation checks on line 9 of extract 1.1 was rhetorical and was used to check on students' understanding and allow a short break in the extended teacher turn. Although there were similarities between the *managerial mode* in extract 1.1 and extract 0.1, the differences lie on the presence of display question not only to shift the *mode*, to start a discussion but also as a recall technique to inform the students what will be discussed allowing students to compare their prior knowledge.

Display questions could also be used in the form of a situation or modelling of an example to create an opportunity to elicit a response on material or to provide practice, as seen in extract 1.2 of appendices 2. In extract 1.2, the tutor seeks to create an example to explain what the students have not studied or had no prior knowledge. The pedagogical goals were not only in providing an example to elicit response but also to provide practice for the students on their knowledge of the content. In the extract 1.2 of appendices 2, we can see that the tutor starts with a display question referring to allow students to display the answer to the title of the module with a specific module code. Similarly, as in the tutorial, although the

display questions used in lines 1, 3-4, 6, 8, 17, and 19-20 only elicit short-learner-turn, a series of display questions asked one after another could provide the space required for students to display the correct answer to the question. Thus, multiple display questions are used to expand students' contributions.

Appendices 2: Extract 1.2

1.	Т:	do you get this? [SS shook their heads] (.)
2.		no? (2) I hope this do (.) you have module code
3.		and module name (.) what is I (.) C (.) E (.)two
4.		three (.) zero (.) six (.) refer to? =
5.	SS:	Code =
6.	Т:	Yeah (.) what is the title? =
7.	SS:	Module? Module =
8.	Т:	What is the name of that? (.) I (.) C (.) E (.)
Append	lices 2:	Extract 1.2
17.	What	do we have now? =
18.	S:	[EDMS =
19.	Т:	EDMS] (.) okay? (2) so you're saying module
20.		code (.) tells you what the name is, right?
21.	SS:	Yes

The display questions elaborate the students' leading to a revelation of the correct answer, which proved that by extending and reformulating the answers allow the students to reflect on their answer and elaborate their answer to reach the real answer to the first question found in line 18, "EDMS." Despite the different teaching format, i.e., lecture and tutorial, the use of display questions to elaborate on the students' answer were also used by the tutor in this extract.

Extract 1.2 of appendices 2 also reveals the tutor's use of display questions as scaffolding. An example could be seen from lines 3-4 above and 6-10 below, where the tutor

reformulates his initial display question when students seem not to understand what he meant by asking them the meaning of the module code by directly asking the title of the module.

Appendices 2: Extract 1.2

1. T:	Yeah (.) what is the title? =
2. SS:	Module? Module =
3. T:	What is the name of that? (.) I (.) C (.) E (.)
4.	two (.) three (.) zero (.) six (2) I (.) C (.) E
5.	two (.)three (.) zero (.) six =

Other forms of scaffolding were also used in lines 6, 5, and 17 to expand the students' contribution. The use of reformulation and extension scaffolding allows for to guide the students' into providing hints to the answer on the main display question by changing the module into a different word or by providing hints with the module code, which was more understandable to the students thus encouraging them to participate. Unlike in the first observation, the tutor does not provide the answer and explanation immediately. Instead, the tutor allows the students to answer until the main display question found on line 14; "what do we have now" was answered. Thus, the students correctly answer the main question and participate in length in the interaction.

Confirmation checks are also used in extract 1.2 of appendices 2, in the extended teachers' turn from lines 22 to 34, where the tutor seeks to either confirm the students' understanding of the heavy content transmission. Similarly to extract 0.1, the confirmation checks used in 22 to 34 confirm the students understanding or answer to the multiple display questions. Another *confirmation check* occurred in lines 19 to 20, where the teacher asks, "so you're saying module code tells you what the name is right?" in extract 1.2 of appendices 2. Here the teacher sums up what the students were taught from the series of display questions above, directing the students to rethink their answers through. The use of the confirmation check explains to the students that the module code informs people of the name of the module. Extract 1.2 displays two ways of using confirmation checks with different pedagogical goals. Confirmation checks in the extract 1.2 was also used in the skills and systems *mode* instead of in the *managerial mode* of the SETT Framework.

Clarification request was also produced in extract 1.2 of appendices 2above to ensure the student's contribution was made clear, as seen in lines 2, 13, and 15. On line two, although there was no verbal interaction was made, the students' action seeks to inform the tutor of their answer, and therefore, the use of clarification requests "no?" was the tutors' attempt to understand the reason behind the students' answers. In line 13 of extract 1.2 below, instead of a question, the tutor only used a sound to indicate his intention of clarifying the students' answers. Even though it was only an exhalation sound, the students were able to pick up on the clarification request and provide repetition of their answer on line 14. Line 15, reflects the tutors' confusion for the answer the students' provide, leading them to echo the answer with a rising intonation indicating their question. Due to this use of clarification requests in extract 1.2, the student was able to provide the correct answer. Therefore, the use of clarification requests allows the tutors to clarify the students' answers and guide the students towards displaying the correct answer, as seen below.

Appendices 2: Extract 1.2

13.	Τ:	(Huh)?
14.	SS:	Programming=
15.	Τ:	Programming? =
16.	S1:	<two six?="" three="" zero=""></two>
17.	Т:	What do we have now? =
18.	S:	[EDMS =
19.	Т:	EDMS] (.) okay? (2) so you're saying module

On the other hand, line 15 showed the use of teacher echo as a clarification request to clarify the students' answers. Teacher echo was another *interacture* commonly found not only in the second observation but also in the first observation, especially in the *materials mode* or the *skills and systems mode*. The teacher echo in the extract 1.2 of appendices 2 above was mostly to confirm the students' answer, as seen in line 19 above.

Although extract 1.2 composed of *interactures* found in the *skills and systems mode* found in the SETT Framework, the main focus was not on the forms of language as suggested in the pedagogical goals but rather in displaying the correct answer according to the content

of the subject. The focus on content was proven by the use of content feedback in lines 22 to 34. Unlike the SETT Framework, the content feedback was not used to promote oral fluency instead of extract 1.2; content feedback was used in providing content-based information to conclude the discussion.

Extract 1.3 of appendices 2, also used some similar *interactures* around the *skill and systems mode*, especially display questions, scaffolding, teacher echo, and clarification requests. Creating a situation or an example was a start towards the use of a referential question just like in the first observation, but the use of display question as in line 4 to 5 below changes the pedagogical goal. In the case of extract 1.3, the tutor has provided the details of the example without using the opportunity to encourage the students to provide their ideas, and then the tutor directs the question to the central part of the example, which is what the names show in regards to religion. Although the display question below elicits a response from the students, it is nevertheless a short turn, as seen in line 6. As mentioned before, other factors may influence the tutor's decision to use a display question rather than a referential question such as time constraints, the amount of factual content, and the response of the students.

Appendices 2: Extract 1.3

1.	Τ:	So (.) what is the goal of normalisations? (.)
2.		what is the point of this? (3)
3.	SS:	To (.) reduce data redundancy=
4.	Т:	Yup (.) to reduce (.) data redundancy (.)
5.		okay? yeah (.) ten points to Gryffindor \uparrow [SS
6.		laugh] ((2)) okay (.) so normalisation aim
7.		to reduce data redundancy and? =
8.	SS:	[Store =

Looking at the extract 1.3 above, we could see that the tutor starts by using a display question to provide practice on the subject of normalisation as seen in lines 1 and 2 although the use of display questions reduced the student's contribution to displaying only the correct answer, a response from the students, as seen in line 3 where the students responded with the

utterance "to reduce data redundancy." The display question was again used in line 7 as an extension scaffolding to extend a student's contribution to guiding the students in displaying the correct answer.

In the extract 1.3 above, teacher echoes were used in response to the students' contribution following the confirmation check, as seen in lines 4 to 5 to ensure that all the students understood the statement and bringing the students up to date with what is happening in the classroom. Another teacher echo could be found on line 9, whereby latching and repeating the students' contribution allowed the tutor to confirm the student's correct answers. However, the use of teacher echo restricted the students' contribution while extending the tutor's turn.

Another similarity found in extract 1.3 in comparison with extracts 1.2 was in the use of confirmation checks, which was mostly used in the *managerial mode* of the SETT Framework. The confirmation checks found in lines 5 above, and from lines 9 and 18 below allowed the tutor to keep track of the students' understanding and concentration in a classroom where high content knowledge was transmitted.

Appendices 2: Extract 1.3

9.	Т:	Storage] (.) redundancy means (.) duplicated
10.		data right? (.) if you have (.) a lot of
11.		duplicated data (.) every line (.) every data
12.		(.) is (.) using spaces, isn't it? (.) memory
13.		space (.) so if you have a lot of data (.)
14.		imagine (.) everything is in one row (.) every
15.		time patient come (.)
16.		and admission (.)you have a lot of row (.)
17.		repeated data (.) you're using a lot of space
18.		there (.) okay? (.)

In conclusion, more similar themes could be seen in regards to the tutor's use of *interactures* from the two forms of teaching, i.e., tutorial and lecture. One of the reoccurring themes found in both the first and second observation was on the tutor's use of display questions in the *managerial mode* to not only establish a context but also to provide practice

on the content information transmitted. Display questions were also used to elaborate on the student's answer by providing hints related to the answer and the use of display questions alongside scaffolding to either model, reformulate, or extend students' contributions. The *skills and system mode* found in extract 1.2 to 1.3 were frequently seen throughout the lesson in the second observation to transmit high content knowledge and provide practice for students in the form of questioning using display questions. In contrast to the first observation, less corrective feedback and reference to the material were conducted, aside from the use of a whiteboard and TV monitor to provide a demonstration of the lesson content.

Regarding pedagogical goals, the two observation was also seen to adopt the pedagogical goal of transmitting information found in the *managerial mode* in both *material mode* and *skills and systems mode* due to the high transmission of content knowledge. Furthermore, the shifts in the *mode* were also noted within the *materials mode* and *skills and systems mode* were also noted within the *materials mode* and *skills and systems mode* were also noted within the *materials mode* and *skills and systems mode* were also noted within the *materials mode* and *skills and systems mode* with the use of transitional markers or discourse markers. The transitional markers were also used to signal the shift from one content to another. Furthermore, the pedagogical goals found in the *materials mode* and *skills and systems mode*, which concentrated on the form of language was not found in the two observations. Instead, practices were provided around the students' content knowledge.

In comparison to the SETT Framework, the use of display questions was not found within the *managerial mode*, while the use of confirmation checks and transitional marker from the *managerial mode* was also not found in both the *materials mode* and the *skills and systems mode*. However, these features were found reoccurring in the first and second observation as it served the purpose of introducing new content knowledge and confirming the students' understanding of where a high amount of content knowledge was transmitted.

Other than that, the use of content feedback instead of form-focused feedback in the *materials mode* and *skills and systems mode* was also not found in the SETT Framework as it applied more to language classrooms. The high content knowledge transmission ensured the need for more content feedback rather than form-focused feedback. However, the use of content feedback does not lead to the promotion of oral fluency, as noted in the SETT Framework. Instead, the content feedback provided corrective feedback on the content knowledge of the students. Due to this, it functioned as the form-focused feedback in the language classroom, as seen in the SETT Framework.

One of the main differences between the two observations and the SETT Framework was also found in the predominance of IRF patterns in most *modes* and the lack of *classroom-context mode*. The IRF patterns were mainly found in *materials mode* and *skills and systems mode* adopted in the two observations. However, it was rarely seen in the *managerial mode* at the beginning and end of the lesson. The predominant use of IRF pattern proved the difficulty of changing content-based classrooms to a less traditional form of teaching due to the high content transmission. Although the *classroom-context mode* was not found in both observations, attempts were made using modelling scaffolding and content feedback in establishing a context for discussion. However, the high use of display questions rather than referential questions restricted the use of *classroom-context mode*.

The difference between the first observation and the second observation could be observed in the high reference to materials in the first observation in comparison to the second observation. The difference was due to the corrective feedback provided on the task set in the first observation, while the second observation was focused on the transmission of new content knowledge. Proof of this lies in the higher number of content feedback used and the use of the materials to elicit a response from students found more in the first observation rather than the second observation.

Although humour was not found in the SETT Framework, it plays a significant role in both observations by breaking the pace of the lesson and allowing students to refocus on the lesson. Noticeable in content-based classrooms, which was due to the high transmission of content knowledge. Humour was achieved in response to the students' contribution, as noted in both observations. Another interactional feature found in both observation was in the use of code-switching because both the students and tutor were fluent in both Malay and English languages. Evidence was found where students were more comfortable using the Malay language, especially in situations where they are required to point out the tutor's mistakes or to emphasise their point. In some situations, the tutor was also forced to use code-switching to help students refocus on the matter at hand or to gain students' attention. Therefore, the use of humour and code-switching could be considered as valuable *interactures* in understanding the classroom interaction and the development of classroom interactional competence.

5.2.3 PILOT STUDY - INTERVIEW

The pilot study interview chapter consists of themes arising from the observational data above in a move to provide explanation and clarification using data gained from a stimulus-recall interview conducted on the participation of the pilot study. The purpose of conducting the pilot study was to test the research method used for the primary data. Below are themes, reoccurring in the observation data in the previous section.

Theme 1: Content feedback in Materials mode and Skills and System mode

In a language classroom, the *materials mode* and *skills and systems mode* were focused on the forms of language, as seen in the pedagogic goals associated with these *modes* in the SETT Framework. However, the content-based classroom has high content transmission, which was a contrast to some of the pedagogical goals found in *materials mode* and *skills and system mode*. Evidence of high content transmission was mentioned in line 3 to 4 in the interview extract 1.2 of appendices 3:

Appendices 3: Interview Extract 1.11

1.	I:	How did you find (.) your class just now?
2.	S2:	The way he teach is fine (.) it's just that
3.		sometimes (.)he teaches a lot in one go (.) for
4.		example, up to 80 slides so (.)we have to request
5.		a break (.) So actually the reason why (.) is as a
6.		student we can't really cope up, yes the time is 2
7.		hours the given time for one lecture to have that
8.		just to listen, that's just too much. So students
9.		tend to go to sleep (.) then they just daydream
10.		sometime dreaming already [S laughs]

Even in a practical or tutorial classes where students were allowed to speak among themselves in group work, the focus remained on the material and the content revolving around the material as mentioned in line 3 in extract 1.2 of appendices 1.2:

Appendices 3: Interview Extract 1.12

1.	I:	Didn't (.) your teacher (.) teach you in practical
2.		class too?
3.	S2:	He does (.), but it's still more to theory. I want
4.		a subject (.) that has all I (.) E:: <u>mostly</u>
5.		practical because (.) usually to be honest (.)
6.		even if you study I T (.) we graduate (.) we are
7.		not actually (.) it does not make us a quality
8.		student (.) because sometimes even a friend of
9.		mine (.) he finishes his degree when he goes to
10.		work he doesn't know what to do actually (.) so
11.		they have to point something (.) So basically (.)
12.		its best that we study I mean we should have more
13.		practical than theory

Due to the high content transmission in the different learning styles of content-based classrooms, the use of *materials mode* and *skills and system mode* in a content-based classroom require some changes in the use of *interactures*. One of the changes was in the adoption of *interactures*, such as content feedback and confirmation checks. Content feedback was a necessary *interacture* when dealing with content, but the use of confirmation checks was also detected in the observation for the tutors to confirm the students' answers were correct, and confirm students' understanding of the content.

Theme 2: Multiple display questions expands students' contribution

It was observed in the pilot study that the use of multiple display questions could expand the students' answers, whether in the form of listing out the answers or by using scaffolding to extend the students' answers. However, this depends on the responses from the students. As mentioned in the interview with the tutor when asked about the students' response to display questions;

Appendices 3: Interview Extract 1.01

1. I: What is the response you get from students when you

2.		use questions you know the answer to?
3.	Τ:	like I said I target on general questions something
4.		that you know it by yourself so normally they would
5.		answer it more often (.) Compared to something I
6.		teach (.) a fact already (.)
7.		they'll need to process the fact (.) so if they $% \left(\left(\left({{{\left({{\left({{{\left({{{\left({{{}}} \right)}}} \right)}} \right)}_{i}}}} \right)} \right)$
8.		are not confident (.) they'll just keep quiet (.)
9.		If they're confident (.) they'll try,

The excerpt goes to show that students will answer questions that they are confident in answering. If the display questions are based on their prior knowledge or something related to their personal life, they will be encouraged to speak more. Due to the nature of the display question, which has a specific answer or a predictable answer, guiding the students to the correct answer using display question

Appendices 3: Interview Extract 1.02

1.	I.	Do you think (.) their lack of preparation (.) is
2.		one of the reasons for them (.) to not be able to
3.		answer questions in class?
4.	Τ.	Well (.) if you ask the students (.) to actually do
5.		some research (.) it's a pretty hard thing, right?
6.		(.) So you give lots of reason for that (.) Normally
7.		those question (.) I have to make sure they at least
8.		(.) try to answer not very hard questions (.) its
9.		usually something that I just share a few minutes
10.		ago (.) and ask again or (.) its something general.

By providing simple display questions, which students have prior knowledge as mentioned by the tutor in line 8 of the extract above, the tutor would be able to guide the students to display the correct answer.

Theme 3: Shorter wait-time due to time constraints

Specific questions require the students to think more before answering. Therefore, it is important for tutors to the extended wait time for the student to digest the questions. In this pilot study, the wait-time varies from 5 seconds to none at all. The issue of wait-time is mentioned in the interview with the tutor when asked why the wait-time for each question differs; he mentioned that;

Appendices 3: Interview Extract 1.03

1.	I:	I don't know (.) if you realise this (.) but the
2.		lectures (.) in the video were (.) quite fast paced
3.		and the wait time (.) after some questions are very
4.		short (.) Why is that?
5.	Τ.	I think I have a reason for that (.) The one
6.		without stopping is like (.) I assume (.) is
7.		general knowledge they should know already (.) If
8.		that is something that requires them to take
9.		something different (.) I'll wait for their answer
10.		(.) I will ask la (.) for their opinion (.) if it
11.		is something (.) that they sort of know already

Other than the general knowledge, as mentioned in the abstract above, the issue of wait-time was also influenced by some reasons, mainly concerning time constraints to finish the content of the subject as explained below:

Appendices 3: Interview Extract 1.13

1.	I:	Would you say (.) you were given enough (.) time to
2.		answer the question?
3.	S2:	yea (.) Because like I told you before (.) there's
4.		quite a lot of slides (.) He give a lot of question
5.		(.) but he doesn't really give us time (.) because
6.		if he give us time (.) then the duration of the
7.		class would be extended (.) I mean he needs to

Due to high content transmission, tutors struggle to balance the amount of theory and practical exercises that were required in a lesson. Furthermore, the signals from the students indicating they are unable to answer the questions could be viewed by the tutor as seen in line 3 below:

Appendices 3: Interview Extract 1.04

1.	I:	Do you think it will take time for the students to
2.		answer questions if given enough time?
3.	T1:	It will take more time (.) and certain things that
4.		the students (.) might not be able to answer (.)
5.		cause they just say (.) or give indication. From my
6.		experience (.)when they are quiet (.) they are not
7.		even discussing with their friends (.) they don't
8.		really understand.

Extract 1.0 shows that the time is taken for students to answer a question they do not know, maybe longer than when they have prior knowledge of the question. It is essential to consider the students' prior knowledge and understanding before providing an extended wait-time.

Appendices 3: Interview Extract 1.31

1.	I:	When your lecturer asks questions (.) do you think
2.		you have enough time (.) or do you think it's too
3.		fast?
4.	S5:	I think it's very too fast (.) for me (.) because I
5.		need time to think (.) and then (.) I want about
6.		one to two minutes for me it's ok (.) and discuss
7.		with my friends.
Therefore, there is a need for the tutors to balance between the provision of theory and practical lessons in the classroom to allow enough time for students to be involved in their learning.

Theme 4: Code-switching encourages participation

Although it was rare, code-switching has occurred in the Pilot study observation. Code-switching was conducted using the tutors' and students' mother tongue or L1, the Malay language. For the tutor, code-switching was conducted in response to the students or to gain the students' attention while for the students, code-switching allows them the freedom to react faster and confidently emphasise on a particular point as mentioned in the lines 10-13 below:

Appendices 3: Interview Extract 1.21

1.	I:	Do you (.) find it difficult (.) to answer
2.		questions posed by your tutor?
3.	S4:	I think so (.) I realise (.) I observed lately it's
4.		the pupils (.) they need to respond (.) The problem
5.		is that we don't have that rapid response (.)
6.		Sometimes when the lecturer asks us questions $(.)$
7.		we tend to pause for a while (.) I think the
8.		problem is that we're not really exposed to that
9.		environment (.) where people talk spontaneously
10.		when people ask question, especially this (.) Maybe
11.		in Malay, we would throwback very fast, but I think
12.		it really depends on the person (.) If he ask me a
13.		question (.) I will answer but regarding of what he
14.		is teaching (.) I might not be able to answer (.)

What the extract 1.21 proved was that students' are more comfortable with the Malay language than the English language. Thus, allowing the use of code-switching would increase

the students' participation in their learning. In conclusion, the Pilot study has provided informative data concerning the effectiveness of the research method. The pilot study was conducted in one class at Polytechnic Brunei. Two video observations were recorded, and six stimulated recall interviews were conducted on the participants. The reoccurring themes raised from the observation data were compared to the interview data, and five prominent themes were found. However, the pilot study presents two limitations, firstly in the use of two cameras, which was not appropriate for small rooms and secondly, in the scheduling of interviews, which does not provide enough time for the researcher to go through the videos before conducting the interviews. Therefore, only one camera will be used for observations, and interviews were conducted within three days of observation.

5.3 PRIMARY DATA: OBSERVATION

To start the analysis, I will proceed by first describing in detail the conditions and layout of the classroom or lecture theatre or labs. Then comparisons will be made on the use of *interactures* and pedagogical goals in the three sets of lessons from three different subject areas to *modes* used in the SETT Framework (Walsh, 2006, 2011). The focus of the SETT Framework will not only be on the use of interactures in comparison to pedagogic goals but also in its organisation and function in encouraging participation and efficient transmission of content. Finally, any phenomena or themes that arise from the observational data will be reviewed and reasoned in regards to the themes found in the interview data.

The observational data could be found in the form of two to three hours of lectures, tutorials, and practical sessions conducted by three tutors from three different courses (i.e., Geology, Biology, and Language and Linguistics) in *Universiti of Brunei Darussalam*. All the tutors who participated came from foreign countries outside Brunei Darussalam. I will start by describing the conditions of the classrooms or lecture halls for each course that was observed. For the Geology lectures, lessons were conducted in a vast air-conditioned lecture hall away from the main building. There were about 40 first-year students that attended the lecture. The lecture was presented on a massive powerpoint projected onto a large screen in front of the lecture hall. The lecture hall was designed with up-to-date equipment that ensures the best education.

As for the Biology lecture, the observation took place in a smaller classroom that could fit around 20 to 30 students. The room was only equipped with air-conditioner, chairs

with an attached table, a whiteboard, and a larger table for the tutor. Despite the less equipped classroom, the tutor also used his projector to display the power point presentation. However, due to the small capacity the classroom offered, it was challenging to place the projector at a position where the PowerPoint could be appropriately displayed. Thus, the texts and images on the PowerPoint were small and unclear. The size of the visual and textual images on the PowerPoint may affect the students' understanding of the tutors' presentation. Despite this, the room was clean and bright.

The English Language and Linguistics lecture was held in a smaller classroom that could only fit around 20 students due to the small group of students in each class. However, it was equipped with an overhead projector, a whiteboard, the teacher's table, and an elongated table and chairs that could fit two to three students per table. It is also bright, clean, and airconditioned. The tutorials were also held in the same or similar rooms as in the lectures.

Practical labs for Biology class was much more significant in comparison to Geology practical labs. However, due to the large group of students in the Geology class, only a portion of the students was able to be accommodated in one practical session. Both labs were fit with lab equipment such as microscopes and dissection tools, and long tables with stool chairs. Both were air-conditioned and clean, but the air-conditioning was not able to cover for a large number of students present in one lesson.

5.3.1 PRIMARY DATA: GEOLOGY – LECTURE 1

By generally looking at the data, the structure of interaction for the lectures could be seen to consist of an extended teacher turn and a shorter learner turn. However, there are instances where tutors provide space for students to participate in their learning. The first set of lessons recorded was from the Geology course, and this was conducted in a big lecture hall with at least 60 students in their first year at the university. The second lessons were from the Biology course, where the around 27 students in their third-year were involved, and it was conducted in a small classroom. The final lessons were from the English Language and Linguistics department, where the lesson took place in a small classroom with less than seven students in their second-year participating. The condition of the classroom and the number of students, to an extent, may influence students' involvement in the classroom. All three lecturers or tutors came from outside of Brunei Darussalam, which resulted in the use of the English language as a medium for interaction between students and tutors. Two of the lecturers have taught in Brunei Darussalam for quite a long time while the other has only taught at the Universiti of Brunei Darussalam for about two years.

What has been observed in the pilot study was the tutor's use of *managerial modes* to start the lessons by either recalling the previous task or by introducing a topic in regards to the students' prior knowledge. The first lecture we look into was on the subject of Geology. For this course, the tutor chooses to open the lecture by recalling the students' prior knowledge on classification by using modelling scaffolding to provide examples of "classification," as seen in extract 2.0 of appendices 4 below. By using modelling scaffolding in lines 1 to 8 and 10 to 13, the tutor seeks to establish a context for discussion on the reason for the requirement of classification in science. The establishment of context was supported by the presence of display questions at the end of the scaffolding, as seen in lines 9 and 13 to 14. The modelling scaffolding was further initiated in lines 22 to 24 and 26 to 33, where the tutor used the students' imagination to picture the thousands of minerals available and, thus, provide the answer for the need for classification. Therefore, pedagogical goals found in extract 2.0 was not only in establishing a context and recalling students' prior knowledge but also in providing practice on the content of the lesson.

Appendices 4: Extract 2.0

9.	(.) can you tell me why? (.) why do we need
10.	classification? (.) classification of minerals
11.	(.) classification of animals (.)
12.	classification of plants (.) classification of
13.	rocks (.) next year (.) why? (.) What's the
14.	reason? ((2)) They're are very important (.)
15.	part of the science (.)you have any idea? (5)
16. S1:	((5)) <in (.)="" a="" identification=""> (.)</in>

22.	т:	thousa	and (.) m	inera	als	(.) :	50 (can t	we in	magine	
23.		(.)to	give	you	now	(.)	thre	ee t	chous	sand	mineral	ls

24.		(.)to study
25.	SS:	no/no=
26.	Т:	It will be crazy (.) or (.) some thousands of
27.		animals (.) some thousands of plants etcetera
28.		(.) etcetera (.) so it's easy (.) to know (.) $($
29.		ten (.) fifteen (.) families (.) of minerals
30.		(nowadays) (.) in order to understand (.) all
31.		the members of this (.) family (.) so (.)
32.		there are many attempts of mineral
33.		classification (.)

As seen from the extract 2.0 of appendices 4, the tutors introduce the topic by recalling and confirming students' previous knowledge of minerals and classification. Recall allows the students to relate to their prior knowledge, which can provide a boost in their confidence when it comes to participating in the classroom, and it also helps the tutors in confirming the students' understanding of the subject matter. To recall the students' prior knowledge, the tutor used modelling scaffolding and display questions. Although the tutor seeks specific answer to the display question posed in lines 9 to 10, 13 to 14 and 15, the nature of the question, which seek to find reasons, for the use of "classification" in science, using "why?" as seen in lines 8 to 9 and 13, could produce several correct answers. Due to this, two answers were provided by the students, as seen in lines 16 and 17; "identification" and "segregation."

The production of several answers by the students in lines 16 and 17 resulted in the need for clarification by the tutor, as seen in line 18 by the use of clarification requests and teacher echo. However, instead of waiting for the students' response to the clarification request, the tutor continued with content feedback in lines 18-19 to show that the students' answer was not wrong, but it was not the specific answer the tutor was looking for by using the display question. Therefore, the use of teacher echo as a clarification request was to confirm the possibility of the students' answers even though it was not the specific answer the tutor seeks. Looking at the pedagogical goals and *interactures* produced in extract 2.0

above, the tutor used features of the *skills and systems mode* to introduce the topic of the lecture.

Although *managerial mode* was not used to start the lesson, it was also explored in the lesson with the pedagogical goal of transmitting new information to students, as seen in the extract 2.1 of appendices 4. The extract showed an extended tutor turn on the explanation for the ways classification was conducted on materials. The extended tutor turn and absence of students' hinted at the use of *managerial mode* even with the use of display question on the first line of the micro-context. The use of display questions in line 1, "Do you know this professor? (2) Linneaus" as seen in extract 2.1 of appendices 4, signalled the tutor's attempt to provide practice, but the lack of response led to an extended tutor turn. Another display question was used in line 19 by this display question signalled the shift in *mode* from the *managerial mode* as detected by the use of transitional marker "so" in line 19. Another transitional marker was produced in line 11. However, this does not signal the shift in *mode* but rather the conclusion on one point and the start of another.

Appendices 4: Extract 2.1

11. T:	the environment of ((2))(formation) (.) so they
12.	classified igneous (.) metamorphic (.)
13.	sedimentary (.)but again (.) there are some
14.	problems (.) for some minerals appear (.) in
15.	all the three environment (.) or some other
16.	appear (.) in two environments (.) so for
17.	example ((2)) (.) let's say (.) or quartz (.)
18.	even (worse) (.) quartz can appear (.) in
19.	every (.) environment (.) so what is it?

Although the extract 2.1 used *interactures* and pedagogical goals found in managerial *mode*, there were no confirmation checks used in the extract. The lack of confirmation checks informed us that the tutor does not find the need to confirm the student's understanding of what has been transmitted due to the presence of modelling scaffolding conducted in lines 16 to 19, which provide an example to explain the failure of classifying the correct mode due to

the nature of the content-based classroom. In comparison to the SETT Framework, the *managerial mode* in extract 2.1 was not used to organise a physical learning activity or to introduce an activity but rather to transmit information by referring to content found in the material.

Providing content information could also go hand in hand with providing practice with sub-skills on the content knowledge, as seen in extract 2.2 below. Extract 2.2 of appendices 4 also showed the pedagogical goal of enabling learners to display the correct answer, which was seen from the use of display questions in lines 1 to 2, 9, and 18 to 19. The first display question in lines 1 to 2 sets the start of the *skills and systems mode* by recalling students' prior knowledge and addressing one student to display the correct answer.

Appendices 4: Extract 2.2

1.	Τ:	Can somebody remind me tetrahedral (.) what is
2.		tetrahedral side? (3) tetrahedral side? [A]?
3.	S1:	((3))=

Due to this, the tutor ensured the question was answered even though the answer may not be what the tutor seeks to display, as seen from the reformulation scaffolding in lines 4 to 6. Although the display questions used in lines 9 and 18 to 19 were not a typical question, the rising intonation detected by the student revealed it to be a question, which resulted in the students providing answers, as seen in lines 10 and 20.

Appendices 4: Extract 2.2

6.	Т:	anions (.) exactly (.) and (.) four anions
7.		(.) and the ((2)) is (.) a tetrahedral (.) and
8.		the octahedral side (.) is a side for (.) when
9.		I have kataion (.) surrounded by? (.)=
10.	SS:	[six

Appendices 4: Extract 2.2

11. T: by six] exactly (.) anion (.) so I have a (.)

12.	nearly (.) pyramid (.) which is (.)
13.	octahedral (.) four faces above (.) four faces
14.	below (.) so we will (.) discuss here (.)
15.	always (.) for tetrahedral (.) and octahedral
16.	(.) sides (3) I believe that the tetrahedral
17.	sides (.) are easy (.)to understand (.) which
18.	of the tetrahedral sides (.) in the silicate
19.	Minerals? (5)

Furthermore, the extended wait time in line 19 also revealed the tutor's intention of providing a display question. Overall, extract 2.2 showed IRF patterns with an extended tutor turn.

Appendices 4: Extract 2.2

18.	Τ:	tetrahedral side (3) is a side (.)
19.		that is (.) surrounded (.) by (.) four (.)
20.		anions (.) exactly (.) and (.) four anions
21.		(.) and the $((2))$ is $(.)$ a tetrahedral $(.)$ and
22.		the octahedral side (.) is a side for (.) when
23.		I have kataion (.) surrounded by? (.)=

The use of scaffolding in extract 2.2 above, also determined the *skills and systems mode* as scaffolding enabled the tutor to reformulate students' contribution or expand their answer or establishing a context by developing a model. In lines 4 to 6, the tutor reformulates the students' contribution to display the correct answer to the rest of the class. While in lines 6 to 9 and 11 to 19, the tutor used extension scaffolding to expand students' one-word contribution and thus, providing the correct answer through content feedback. Content feedback was also used to provide explanations and create an opportunity for the use of display questions, as seen in lines 6-9. Although content feedback was mainly found in the *classroom-context mode*, the use of content feedback in the *skills and settings mode* was due

to the tutors' focus on transmitting content knowledge rather than focusing on the forms of students' answers.

The use of teacher echo in lines 11 and 21 of extract 2.2 of appendices 4 above, was also another similarity to the *skills and systems mode* of the SETT Framework. The teacher echo confirms that the answer provided by the students were correct. The use of the word "exactly" in lines 11 and 21 after the teacher echo also showed the answer displayed by the students was what the tutor was seeking. Thus, the teacher echo confirms the students' answers.

Transitional markers were also used in the extract 2.2 but instead of shifting the *mode* to another *mode*, the tutor used the transitional markers "so" in lines 11, 21, and 25 to show the shift in different content form an explanation of "tetrahedral side" to revealing the minerals found in a "tetrahedral side". Although transitional markers were often seen in the *managerial mode* of the SETT Framework, the use of transitional markers showed the importance of revealing the movement of content knowledge from one to the other in a content-based classroom.

Extract 2.3 also used similar forms of *interactures* as extract 2.2, especially in the use of display questions, scaffolding, and content feedback. However, the pedagogical goals were not in enabling students to display the correct answer or providing students with practice on content knowledge, but instead, it seeks to enable students to clarify themselves using their knowledge of the content, which in the case of extract 2.4 concerns "Beryl."

1.	Τ:	Do you know (.) Beryl? (.) Is it any (.)
2.		important mineral? (.) if I give you (.) a big
3.		Beryl (.) you will be happy or not? =
4.	SS:	Yes =
5.	Т:	Why? (.) Is it expensive?
6.	SS:	Yes
7.	Т:	Very expensive (.) it is (.) aquamarine (.) in
8.		other words (.) okay,

The use of the display question in line 1 to introduce a topic was similar to the approach found in extract 2.2. In the case of extract 2.3 of appendices 4, the questions used were focused on the subject of "Beryl" mineral, especially in line 5, aside from line 1. The display question in line 3, however, has features of the referential question in the use of modelling scaffolding to establish a situation where "Beryl" was obtained and the unpredictability of the answer to the question. For someone with no prior knowledge of "Beryl," the display question may be answered differently in comparison to the students who have prior knowledge. Therefore, the use of this display question could be referred to as a referential question.

The use of content feedback in lines 7 to 8 revealed the reason for the students' answers in lines 4 and 6. Although content feedback was mostly used in the *classroom-context mode*, the use of content feedback in extract 2.3 provides the necessary information on the subject content. Another familiar *interacture* used in extract 2.3 was in the use of scaffolding in lines 2 to 3 and 5. As mentioned above, the scaffolding in lines 2 to 3 signifies modelling form of scaffolding while inline 5, the tutor opted for extension scaffolding to expand the students' answers and to clarify the reason for their answer. In this sense, the scaffolding in line 5 also acts as clarification requests. Although the *interactures* used in the extract 2.3 were also found in the *skills and systems mode*, there was also an absence of direct repair and form-focused feedback due to the nature of the classroom.

Humour found in extract 2.3 of appendices 4 could be considered as one of the *interactures* influencing students' participation in the classroom interaction. The use of humour broke the pace of the lesson and changed the mood of the lesson, especially required for a lesson with the highest-content transmission. Not only that, but it also helps in strengthening the relationship between tutors and students and brought about a sense of comfortability, which is one of the crucial factors influencing student's participation. Thus, the ability to use humour during the lesson could encourage students to become more involved in the classroom. The use of humour was interestingly done in the above extract by using one of the subtopics in the lecture, Beryl, as the subject of humour. By doing this, the tutor was able to address the characteristics of Beryl as a valuable mineral and relate it to the students' knowledge in their everyday life, which is the value of expensive items. The extract 2.3 also emphasises the flexibility of display questions in playing different roles to achieve a

different answer, which in this case in the creation of humour as seen in lines two and five where the tutor chooses to tease out information on the value of Beryl from the students.

The first Geology lecture ended using a *managerial mode* explaining what the students will be expected to do in the practical session, as seen in the extract 2.4 below.

Appendices 4: Extract 2.4

1.	Т:	You have a (.) large (.) Orthopyroxenes crystal
2.		(.) in the microscope (.) and some (.) parallel
3.		(.) lines (.) along cleavage (.) so this kind
4.		of Pyroxenes (.) (Exolution) (.) (along the)
5.		zero zero one (.) today (.) then this is the
6.		perpendicular (.) one zero zero (.) okay (.)
7.		then (.) this (.) is what we expect to see
8.		tomorrow in the microscope (.) This is what we
9.		will expect to (.) thank you very much (.) for
10.		coming today (.) I will see you (.) tomorrow in
11.		the practical,

In extract 2.4, there was an extended tutor turn with the absence of students' turn. Furthermore, the use of a confirmation check "okay" in line 6 confirms the students' understanding of the last content before the shift was made to inform the students of the upcoming practical session.

5.3.2 PRIMARY DATA: GEOLOGY -LECTURE 2

The second lecture in the Geology course started with an introduction to the topic and relating it to the previous lecture. The tutor also used humour to explain the relationship between the two topics by mentioning that both are like "cousins," as seen in line 6 of the extract 3.0. The use of this humour at the beginning of the lesson is a good strategy in gaining the students' attention and breaking the ice.

By setting up a task at the beginning of the class, the tutor provides the students with a set goal on what to seek. In the case of extract 3.0, the task for the students was to look into the similarities and differences of the minerals, as mentioned in lines 12 to 16. The tutor shows a different approach to introducing a topic and starting a lesson. The use of humour as a strategy is another way to introduce the topic while setting the mood of the class.

Appendices 5: Extract 3.0

12. have	to make similarities (.) so please today
13.	(.) (um) (2) follow the lecture (.) and try $% \left($
14.	(.) to find the similarities and the
15.	differences (.) of course (.) there must be
16.	some difference (3) general idea for (.) all

The *interactures* found in extract 3.0 followed the *managerial mode* regarding the extended tutor turn and the transitional marker aside from the lack of confirmation checks. There were also differences in the pedagogical goals used by the tutor in the managerial *modes* found in extracts 2.0, 2.4, and 3.0 of appendices 4 with the *managerial mode* in the SETT Framework. In the SETT Framework, the *managerial mode* was also used to introduce and conclude an activity and organise the physical learning environment, but this was not conducted in extracts 2.0 and 2.4. However, in extract 3.0 of appendices 5, the tutor introduced a task for the students marked by the transitional marker in line 12.

The extract 3.1 of appendices 5 below could be seen to have similar features to those found in extract 2.3, especially in the use of display questions to start the discussion on a specific content subject, as seen in lines 2 and 3. Extract 3.1 also revealed the answer to the display question at the beginning at the end of the extract in the form of content feedback, as seen in lines 8 to 10. However, for extract 3.1, a specific answer was required, and the display questions used were not flexible in allowing for variation in answers. The display question used in line 6 also acts as a clarification request, as seen in extract 2.3 too. The use of transitional marker "okay" in line 8 does not deny the students' contribution; instead, it showed a shift from expanding the students' contribution to displaying the correct answer "bonding."

Appendices 5: Extract 3.1

1.	Τ:	I need something (.) to make the structure
2.		robust (.) what do I need for these (.)
3.		Anions? How can they stay there? (4)
4.	S1:	we need ((2))=
5.	S2:	Cataions =
6.	Т:	we need? =
7.	SS:	Cataions/Cataions? (2)
8.	Т:	Cataions (.) okay (.) well, we need <u>bonding</u>
9.		(.)we need some bonds (.)to give them (there)
10.		(.)not James Bond (.) okay (.)so

Humour was also another similarity found between extract 2.3 and 3.1. By relating the humour to something that makes sense to the students, such as things that can be related to their everyday life, students were encouraged to participate. Aside from the use of humour, the *interactures* used in extract 3.1 shared some similarities with the *skills and systems mode* in the SETT Framework. Except, of course, in focusing more on the content rather than the form of language used even though the extract also aimed to provide practice to students, provide corrective feedback, and enable students to display the correct answer.

One theme that has yet to be found in the first Geology lecture was the use of *clarification requests* initiated by the students. *Clarification requests* could be initiated either by the tutors or students as a result of their need to understand a part of the lecture, as seen from the excerpt 3.2 below. In this excerpt, the student was looking at a diagram in the PowerPoint presentation, which prompts the question about the "base," as seen in line 1.

1.	S1:	Sir, where is the base? =
2.	Т:	If you consider this (.) corner towards you [T $\!\!\!\!\!\!\!$
3.		indicating picture in slide] (.) the base
4.		(.) is this level (.) okay? Consider that the

5.	pyramid comes towards you (.) so this is the
6.	base (.) one (.) two (.) three (.) are the
7.	Basal (.) [oxygens =
8. S1:	not] it's not the point here? [S indicate a
9.	place] (2)
10. T:	the point here? = [T points at the picture]

A few times in extract 3.2, the display question used by both tutor and student was used to clarify the response received. Aside from line 1, the use of display question as clarification request could be seen in lines 10 and 15. By doing this, the tutor and students seek to expand the response they received in order to understand and answer the question concerning the "base" of the pyramid structure in the diagram. Display questions were also used by the student to clarify the question posed, as seen in lines 8 and 19. The purpose of adopting the *display question* in the extract 3.2 showed the student enabling the tutor to display the answer the student seeks to find. The role of the student and tutor was thus, reversed.

The teacher echo used by the tutor in line 10 seeks to confirm the point where the student thought the answer lies instead of confirming the students' answer as correct as seen in previous extracts. Interestingly, the tutor's use of modelling scaffolding on lines 2 to 7 from extract 3.2 differs from the use of modelling scaffolding in the other extracts by providing a situation as a model to understand what the student meant by asking the display question. After each response to the student's display question, the tutor used confirmation check; "okay?" as seen in lines 4, 16, 24, and 28 of extract 3.2 of appendices 5 to ensure the explanation fit with what the student was seeking and to ensure the student understood the explanation provided for them. Overall the extract 3.2 showed a variation of the *skills and systems mode* whereby the pedagogical goals seek to provide the correct answer instead or enable students to display the correct answer. Although the use of *interactures* was similarly found in *the skills and systems mode* in the SETT Framework, there are differences in the purpose of adopting the *interactures*.

On the other hand, extract 3.3 depicted the same pedagogical goals and use of *interactures* as those found in the *skills and systems mode* in previous extracts. The excerpt

3.3 below, showed the tutor use of display questions not only in guiding the students to expand their answer in describing the characteristics of Talc:

Appendices 5: Extract 3.3

1.	Τ:	Talc (.) Do you know this mineral? (2)
2.	SS:	Yes =
3.	Т:	Is it soft or rough? =
4.	SS:	Soft =
5.	Т:	What do we (.) use this mineral? =
6.	SS:	Powder =
7.	Т:	Baby powder (.) ladies (.) powder (.) for the
8.		face because it's extremely (.) soft (.) What
9.		is the number in the moist scale? =
10.	SS:	One
11.	Т:	so it's the softest (2)

The excerpt started with the use of *display questions* seen in line 1, which aimed to find out whether the students know the mineral shown in the slide. The second display question, seen in line 3, seeks to explain the texture of the mineral while the third display question was made to discover the function of the mineral. The final display question was used to provide practice on students' content knowledge of "moist scale." Due to this, the students were guided to display the main properties of the Talc mineral. Although the display question does not extend learner turn, multiple uses of display questions allow the tutor to expand on the students' answers and piece together the information of the specific content knowledge. In a sense, the display questions also acted as an extension scaffolding by displaying the properties of one mineral. Furthermore, the use of content feedback in lines 7 to 8 and 11 confirms and expand on the students' answer. However, the use of content feedback does not expand students' contributions as it focuses on eliciting the correct answer instead of the meaning. The use of multiple display questions and content feedback resulted in the

predominance of the IRF pattern seen in extract 3.3, which was an *interacture* found in the *materials mode* of the SETT Framework. Although, the features found in extract 3.3 has similar components with the *skills and systems mode* of the SETT Framework, the absence of several *interactures* such as direct repair, clarification request, and form-focused feedback also sets the extract apart.

5.3.3 PRIMARY DATA: GEOLOGY – PRACTICAL

For Geology, the practical session took place in a small lab. Due to the size of the room, only half the students could fit to do the practical at one time. Consequently, the students have to take the practical at a different time or day — the practical starts with a short lecture by the tutor based on the topic surrounding the practical. The students were provided with handouts, where they were tasked to answer the questions — the practical session consists of identifying, drawing, and categorising minerals. Towards the middle of the lesson, students were free to conduct their practical sessions with the use of microscopes and crystal sheets while the tutor looked on. There was noticeably more student-initiated interaction in this part of the practical. However, due to the noise from students speaking with one another, it was difficult to distinguish specific sound even with the addition of sound editor. Before ending the practical, the tutor went through the task provided by the whole class.

The extract 4.0 showed the start of the short lecture aiming to provide students with information concerning the minerals they observed and provide practice with the content knowledge provided before the practical lesson during the lectures. In extract 4.0, the pedagogical goals were in transmitting information on the content knowledge of the subject. However, the use of display question in lines 10, revealed the pedagogical goal of providing practice on content knowledge for students to display correct answers.

1.	Τ:	today we (have the sample) parts of minerals
2.		(.)the:: Inosilicates and the (.) double chain
3.		Inosilicates (.) but ((3)) to (.) identify (.)
4.		different sections (.) Hornblende (.) Muscovite
5.		(.) Biotite (.) Chloride and Serpentine (.)
6.		five minerals (.) Hornblende is the most (ah::)

7.	(2) the com, the commonest (.) mineral (.) and
8.	(.) I want to ask you now (.) you see here (.)
9.	the colour (.) (no matter where the stage) (.)
10.	the colour changes (.) what is this called? =
11. SS:	Pleochroric/ Pleochroric/ Pleochroric =

Extract 4.0 also showed an extended tutor turn and minimal student turn, a common characteristic found in the *managerial mode*. The use of *display questions* in line 10, however, showed the shift from *managerial mode* to *skills and systems mode* not through the use of transitional markers but with an utterance "I want to ask you now you see here" in line 8. Due to this shift in *mode*, the use of *skills and systems mode* could be noted in lines 12-18, where the tutor used extension scaffolding to expand on the students' answers in line 11.

Appendices 6: Extract 4.0

1.	Τ:	the first mineral (.) the first Pleochroric
2.		mineral (.) you learn (.) is Hornblende (3)
3.		Hornblende has two sets of colour (.) brown (.)
4.		and green (.) that's why (.)maybe you will
5.		sometimes (.) you will hear (.) green
6.		Hornblende (.)and brown Hornblende (.) (means)
7.		(.) denote (.) two different sets of colour

The absence of other *interactures* from the *managerial mode* and *skills and systems mode* revealed the differences in the use of these *modes* in the content-based classroom in comparison to the SETT Framework.

However, the extract 4.1 of appendices 6 below also revealed the use of display questions with characteristics of the referential question due to the variation in the possible answers, as seen in lines 1 to 2. This type of question could also be seen in the Geology lecture, where the tutor seeks to find out if giving someone the mineral "Beryl" would make them happy as a form of humour in extract 2.3 of appendices 4. The presence of this type of question in a content-based classroom proved the possibility of using a question with the criteria of a referential question whereby the answer could not be predicted by the tutor. This

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question also relates to the receiver's personal opinion, which could vary with each person. Though, the question still has a restriction to a specific context, which in the case of extract 4.1 would refer to the study of minerals and the image presented.

Appendices 6: Extract 4.1

1.	Τ:	$\underline{\text{Now}}$ I need your imagination (.) what does it
2.		look like? (2) [T indicate picture on the slide]
3.	S1:	like a ((2))=
4.	т:	like? (2)
5.	SS:	((3))=
6.	Т:	fence? (.)okay (.) the imagination of some
7.		scientist (.) it looks like (.) a fisherman's
8.		(.) net this texture (.) is called a mesh
9.		texture (.) it's very common (2)

The primary purpose of conducting this practice on students' sub-skills and in the students' ability to display answers, which was strictly related to the correct answer agreed by experts in the content subject. In the case of extract 4.1, the correct answer was provided in the content feedback in lines 6 to 9, which differs from the students' answer, the "fence" in line 6. Although there was a vast difference between the student's answer "fence" and the correct answer "fisherman's net," the tutor's use of transitional marker "okay" in line 6 proved that the students' answer was not wrong as they were entitled to their opinion.

Teacher echo found in line 4 was also used as a clarification request to confirm and seek clarification of the students' contribution. Another clarification request was also used in like 6 to confirm what the students' have contributed. The use of teacher echo and clarification requests not only signifies the use of skills and systems *mode* but also revealed the reasoning behind the use of the question in lines 1 to 2, which was in enabling the students to express themselves clearly and participate in their learning.

There was a predominance of IRF with the student initiating the interaction in the extract 4.2 of appendices 6 below, which showed the student's capabilities in participating in their learning, especially lines 1 to 3, which show students' initiation to learn more. The

extract 4.2 below, showed a student initiating a question to the tutor concerning the task of minerals using the microscope, which prompted the tutor to look into the student's work. The pedagogical goals in the extract 4.2 below showed the tutor seeking to elicit a response to the material and transmit information.

Appendices 6: Extract 4.2

1.	S1:	Sir (.) is it anomalies (.) no? =
2.	Т:	is it? =
3.	S1:	anomalies =
4.	Т:	((3)) anomalies (.) the fourth order (.) so
5.		you see the same colour as the colour =

Similar to the situation in extract 3.2 of appendices 5, the student in extract 4.2 was seen seeking clarification due to their lack of understanding of the content. In both extracts, the student's clarification request was based on the material provided. The use of materials to elicit a response from students fit into the characteristics of *materials mode*, but the use of teacher echo and clarification requests shifted the *mode* to *skills and systems*. Another use of clarification request was detected in line 10, where the student mistook one of the words the tutor used to explain the process. By using the *clarification request*, students were able to clarify the meaning behind the tutor's contribution.

Appendices 6: Extract 4.2

10.	S1:	must by the colour? (oh \uparrow) masked by the colour
11.	Τ:	Polarising colours are masked by colour, (.)
12.		the (.) colours yes ((5)) One percent colour
13.		(.) for what mineral? =
14.	S1:	Biotite? =
15.	Т:	Biotite (2)

The display question in line 13 provides practice on the student's prior knowledge, which the student responded using a clarification request; "biotite?" in line 14. The tutor used

confirmation check "okay?" on line 20 and 26 to confirm the students' understanding of what has been transmitted, which explained the position of the confirmation checks after a point has been made. Although, there was more tutor turn than learner turn in extract 4.2, nevertheless choosing to seek clarification showed the students' ability to voice out and participate when allowed to do so such as in this environment where the students can take control of the lesson's pace as in the practical session.

Appendices 6: Extract 4.2

6.	Τ:	rotate (2) okay? (.) Two colours =
7.	S1:	Like (.) light brown =
8.	Т:	Yes =
9.	S1:	Like (.) dark brown =
10.	Т:	Now open it (.) look like that (2) light or
11.		dark? Either light (.) light brown (.) dark
12.		brown (.) okay?

At the end of the Geology practical, the tutor discussed two questions from the handout provided. The extract 4.3 of appendices 6 showed the mixture of pedagogical goals in *materials mode* and *skills and systems mode* in regards to providing corrective feedback, providing practice with students' sub-skills and elicit responses to the materials, and to check and display answers The extract 4.3 of appendices 6 started with the tutor transmitting the information as in the *managerial mode*, but the use of display questions on lines 5, 9 to 10, 28, and 21 to 22 shifted the *mode* from *managerial* to *materials mode*. The tutor seeks to elicit a response from the materials through the display questions in lines 4-5, and another one in 9 to 10.

9.	Τ:	Silicone (.) ion (.) what do you think? (.)
10.		What is the correct answer? If I have (.) if I
11.		obtain (.) if I performed mechanical analysis
12.		for an Amphibole (.) for a Hornblende (.), the
13.		total (.) will be one hundred? =

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Appendices 6: Extract 4.3

21.	Т:	five to ninety six (.) that said (.) so what
22.		does it mean? (3) if you have ninety five (.)
23.		it means (.) that the rest four (.) to five
24.		percent is the so called crystalline water
25.		Hydroxine (3) if you (.) if you (.) obtain the
26.		chemical analysis of a Pyroxin and the result
27.		is ninety four or ninety five (.) those too
28.		<pre>important (.) is it correct? (2) Any question?</pre>

However, due to the lack of response from the students, the tutor opted for the use of modelling scaffolding, as seen in lines 10-13, which also help in establishing a context for discussion. Another use of modelling scaffolding could be found in lines 22 to 25. The use of these modelling scaffolding showed the tutor's intention to provide practice in the students' content knowledge. However, the lack of response from the students resulted in the tutor's use of confirmation checks in line 28 to make sure the students follow what had been explained to them. Extension scaffolding was also found in lines 17 to 21 to expand the students' answers in line 16. Although the purpose of using scaffolding was to expand the answers.

15.	Τ:	no? (.) why? =
16.	SS:	because ((3))=
17.	Τ:	strata (.) amphibole contains hydrogen (.)
18.		hydrogen cannot be analysed (.) as I explain
19.		from the microprobes so (.) the total of
20.		magnesium will be (.) something between ninety
21.		five to ninety six (.)

The shift from *skills and systems mode* to *managerial mode* was detected in the tutor's use of transitional marker "so" in line 29.

Appendices 6: Extract 4.3

29.	Τ:	(5) so you have the rest of the time to (.)
30.		answer the questions and to $(.)$ finish with
31.		different sections (4) before you leave (.)
32.		please leave your practical papers here (.)
33.		take your previous practical papers (.)

The tutor proceeds to ensure the students have time to hand in their tasks and clear the equipment used for the practical. The shift in *mode* to *managerial mode* was due to the different pedagogical goals adopted by the tutor in a micro-context. Shifts between *modes* were not clear sometimes, but in this case, it could be detected clearly due to proper use of transition marker "so."

5.3.4 PRIMARY DATA: BIOLOGY – LECTURE 1

In the case of Biology, the lesson was conducted in a classroom, which could accommodate up to thirty students. The room was air-conditioned and facilitated with a fan, whiteboard, and chairs with small tables on its side. The tutor brought his projector and laptop for the lecture. The students present were less than twenty students with a mixture of boys and girls. The PowerPoint was projected to the whiteboard, which was unclear to those sitting at the back. The students were given notes on the lecture in advance through the University platform 'Moodle.' The tutor was an Italian who has worked at the university for over two years.

In both Biology lectures, there was an emphasis on the importance of conducting an additional reading for the course, as seen in extract 5.0. The tutor reminds by using the *managerial mode* to show the necessity of reading about the subject content at hand as proven by the use of transitional marker "so" in line 1 and 6 to indicate the shifts in pedagogical goal from recalling from the previous lesson to reminding students on their needs to use the textbook as a reference.

Appendices 7: Extract 5.0

1. T:	So (.) last time I just introduces a
2.	generalised (.)if you remember (.) skeleton of
3.	the (.) Cranium (.) of a tetrapod? (.) (um::)
4.	having look at how (.) tetrapod (.) morphs (.) $% \left($
5.	so the (.) ((2)) forms (.) the (.) the
6.	(.) ancestors (.) of tetrapods (.) so you (.)
7.	you may wish to (.) to have an overview (.)on
8.	the textbooks of:: (.) of different tetrapod
9.	(.) Cranium (.) and looking at the slides (.)
10.	try to identify the (.) the different parts of
11.	the skull (.)

As seen from previous extracts, the use of *managerial modes* in the content-based classroom seeks to provide information either on the subject itself or merely an explanation of what will be covered. Extract 5.0 of appendices 7 above also showed the tutor's use of *managerial mode* in transmitting information. Similarly, in previous extract 3.0 of appendices 5, the tutor provided a task for the students to detect any similarities and differences for the reference during the practical. Due to this, the *managerial mode* was not used to organise any form of physical activity but a mental activity that could be done by themselves in relation to the materials provided, such as the PowerPoint slides. The only primary indicator of that *managerial mode* was used in the observations conducted was in the extended tutor turn and absence of students' turn. However, the extract 5.0 above also showed another use of *managerial mode*, which seek to test the students' knowledge by recalling past knowledge as seen in lines 1-2 above.

Extract 5.1 showed an example of *skills and systems mode* conducted in the contentbased classroom, which focuses on the content rather than a form of language used. The pedagogical goal lies in the provision of practice on student's content knowledge, corrective feedback, and the display of correct answers.

1.	Τ:	Do you know what Trichos mean? =
2.	SS:	No =
3.	Т:	Trichos (.)Trichos (.)Trichology =
4.	S1:	Is it like the Trachea? =
5.	т:	With what? Trachea? No, Trichos (3) its hair
6.		(.) hairy structures (.) okay? (2) (Keratosis)
7.		[T points at image on the slide] you already
8.		know that (2) Kera (.) Keratos (.) what does it
9.		mean?
10.	S1:	Keratin=

In this extract, the tutor used the *display questions* to ask the students what they understood by the terms "Trichos" and "Keratos," as seen in lines 1 and 8 above. The display questions were also used to recall any prior knowledge from previous classes. However, judging by the response given by the students in line 2, the students have no prior knowledge of the meaning of this term "trichos." Due to this, the tutor to use other terminology that was part of the word "trichos" as an extension scaffolding strategy. The student's response in line 4 showed their attempt to answer the question by using a clarification request and relating the term to something they have prior knowledge to, i.e., "trachea." Clarification request was also used by the tutor in response to the student's answer inline 4. Using clarification request could be considered a strategy on the students' part to place the ball back in the hands of the tutor, which was responded with a direct repair as seen in line 5 and the display of the correct answer.

Although the direct repair was rarely seen in the extracts in Geology, the use of direct repair in extract 5.1 showed the tutor firm stance in enabling the students to display the correct answer. However, after an extended wait time seen in line 5, the tutor conceded with the reveal of the correct answer on line 5. However, this was followed by another display question on the term "keratos," which the students we able to answer, as seen in line 10. Another display question was used in lines 11 and 12 to 13 to review the meaning of the word "keratin" provided by the students in line 10. The display question in lines 12 to 13 showed

the tutor's attempt to ask more display questions in the subject of entomology, but the students' answer in line 14 stopped the tutor from forming a question.

Appendices 7: Extract 5.1

11.	Τ:	Keratin (.) that's right (.) what does it mean?
12.		(3) pore [T laugh] (er::) are you studying
13.		Entomology? =
14.	SS:	no
15.	Т:	(Serumbasic) (.) kera, ((2)) okay so (.)

Teacher echo was found in lines 4 to 5, and 11 confirmed the correct answer, much like in those found in previous extracts. The use of confirmation checks also allows the tutor to confirm the students' understanding of the information transmitted, as seen in line 6. However, the word "okay" in line 15 was used as a transitional marker to make the shift to a different *mode*. Most of the *interactures* used in extract 5.1 consists of *interactures* found in the *skills and systems mode* of the SETT Framework. The extract also showed the use of direct repair, which was not found in the extracts in Geology classes. Although the focus of the *skills and systems mode* was not focused on the form of language use, but the focus was on the content.

Although extract 5.2 below also featured another example of the *skills and systems mode* used in content-based classrooms, the use of this *mode* showed a similar style of organising the lecture where practices were provided to students along with the transmission of information once the topic has been introduced. However, slight differences were noted, such as in the use of *display questions* to elicit a response from the material used in lines 1 and 8. By doing this, the *mode* encompasses the features of *materials mode*, thus allowing a shift between the two *modes* to occur.

1.	Τ:	this is? [T points to picture on the slide] (2)
2.	SS:	human=
3.	Τ:	human (.) of course (.) foot and a hand (.) a::
4.		in all vertebrates (.) you still, (.) and all

5.		tetrapod (.) you still call it hand (.) and
6.		foot (.) okay (.) so you have a (.) hand of a
7.		frog (.) foot of a frog (ah) (.) it has the
8.		same name (.) okay (.) and this is? (2)[${f T}$
9.		points to picture on slide]
10.	S1:	<horse> =</horse>
11.	Т:	no (.) you see the:: (.) they have one two

Extract 5.2 of appendices 7 also provides an excellent example of the use of direct repair on line 11, which was not often used or not present in previous extracts. Similar to previous extracts, the pedagogical goals used in the middle of the lesson consist of goals found in the *skills and systems, material mode*, and *classroom-context mode*. However, the concentrated use of *skills and systems mode* and *materials mode* was mostly found in the middle of the lesson.

Just like in Geology, the biology practical session was also conducted after the lecture. However, the tutor does not set the task for the practical session during the lecture or even after the lecture. Instead, the tutor chooses to open the space for students to ask questions ten minutes before the lecture ends. The tutor conducts this question and answers session by selecting one PowerPoint slide and directs the students to ask a question from the slide. The slide was filled with diagrams for students to select. Unfortunately, the slide was not clear due to the condition of the room there is no proper working projector, so the tutors have to bring their own and since the size of the room is small, the projector can only be placed in the seat in front row seat facing the whiteboard while the students sat behind the projector. Students were directed to ask a question with the incentive of 1 mark for 1 question.

1.	Т:	okay (.) [T went through the slides]
2.		let's do something (.) we (.) still didn't
3.		do (.) (um) (2) I remind you that (.) you
4.		have a (.) whomever makes (.) makes a question
5.		has a plus (2) I still don't have my questions

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6.	(.) only these guys [T pointed at one student]
7.	(.) (um) talking about interaction (.)
8.	so (um) (4) look at this slide (4) make a
9.	question? (5) try (.) try not to make
10.	it trigger like (.) what is this (.)what
11.	is that (.)yes, of course (.) it's just (.)
12.	define something so:: (2) what (.) what (.)

However, questions were restricted to those who do not involve a definition or any simple question on the process shown by the slide. Although the tutor provides a slide to jump start, the students were not able to respond as seen from the extended tutor turn from lines 1-24 of extract 53 as seen in appendices 7. The extended tutor turn in lines 1 to 24 may also present as a pressure to the students and may end up discouraging students' from participating due to lack of knowledge and confidence. The pressure on students to come up with a question was evident in lines 25 to 29, where the tutor struggles to listen to the student's question. It was only on line 30 that the tutor could distinguish certain words, which he requested clarification from the student; "the nodal cord and?" in which the student responds with "myotomes." The multiple uses of clarification requests in lines 26, 30, and 32 by the tutor indicate that there were some differences in how the student and tutor view the question and the diagram.

13.		where the lining is? (25) you understand (.)
14.		<pre>everything? (.)</pre>
15.	S1:	>why does it fuse? <=
16.	Τ:	sorry? =
17.	S1:	>why does it fuse? <=
18.	Τ:	if you hear me (.) I should hear you (2)
19.	S1:	(um::) (.) the nodal cord and the (.) $[((2))=$
20.	Τ:	the nodal cord] and? =

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21. S1: myotome? =
22. T: and the mayo (.) yes? =
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Although this method of providing space was unexpected in the content-based classroom as evident in other extracts, the lack of response indicates the need for the use of other forms of *interactures* such as referential questions or humour.

5.3.5 PRIMARY DATA: BIOLOGY – LECTURE 2

The second lecture for Biology took place in the same small classroom as in the first lecture. Although the room was air-conditioned, other modern amenities such as an overhead projector was not available. Although there are no prominent *interactures* that could be found in the excerpt below, it was still relevant to show how *classroom-context mode* was explored in the content-based classroom. In the second lecture, the tutor relates the students' use of books as part of their method of study with how it is essential to read and relate to books when it comes to learning the topic of the lecture by using a referential question as seen in lines1-3 below:

Appendices 8: Extract 6.0

1.	Τ:	How much (.) if you have to tell (.) in terms
2.		of percentage (.) how much do you actually
3.		study on books?
4.	S1:	One percent=
5.	Т:	One percent? =
6.	What	(.) What was the question? =
7.	s3:	Study from books=

Extract 6.0 of appendices 8 showed several differences compared to previous extracts. Firstly, just by looking at the use of a referential question on the use of books on line 1, we could see that the tutor seek to enable students to express themselves clearly by using referential question. Secondly, the use of referential questions elicits an extended student turn, as seen in lines 4 to 7, where three students discuss the issue of books. The function of referential questions to expand students' turn shows a similarity to the SETT Framework, especially when it relates to students' personal knowledge that the tutor has no knowledge of. However, there is still an expectation of a specific answer to the referential question posed by the tutor as seen in line 14 where there is sign of disbelief with the higher intonation used on the clarification request.

Appendices 8: Extract 6.0

8.	Τ:	Yeah (.) how much do you study <u>on</u> the books?
9.		(.)on books (.) in terms of preparing
10.		examination or trying to understand the
11.		content of books or a module =
12.	S3:	[>Nine percent<=
13.	S2:	Already (.)] fifty =
14.	т:	Fifty percent? ↑
15.	S2:	Like that (.) Yeah=
16.	Т:	On books? (.) Where (.) where do you get the
17.		books?
18.	SS:	Library =
19.	Т:	you never buy the books? =
20.	SS:	no (3)

The use of teacher echo in lines 5 and 14 in the extract 6.0 above revealed that the tutor is clarifying the students' answers to the *referential question* in line 1. This teacher echo was used as a clarification request, which seeks an explanation for the student's answer. Throughout the micro-context, the students were directed by a series of referential questions, as seen in lines 1 to 3, 16 to 17, and 19 on the students' reading habits, which was used as a scaffolding to expand the students' answers.

Although the topic discussed has no direct connection to the Biology course or the topic of the day. Nevertheless, the use of the tutor's *referential question* on a general topic of discussion has brought about a productive response from the students. It also indicates the

class as a place to discuss ideas rather than a place where the teacher only speaks. In comparison to the use of a referential question in Geology, this triggers more response due to its focus on the general questions related to the daily life of the students. By relating the questions to everyday situations, the tutor emphasises the claim that questions that relate to the student's everyday life prompt a more extended response in comparison to those that are specific to the subject.

Extract 6.1 showed another example of *skills and systems mode* adopted in the content-based classroom. The similarities found in this extract, in comparison to the previous extract, were regarding the pedagogic goal used, where the *mode* seeks to provide practice to students on content knowledge and to enable them to display the correct answers. The use of the predominance IRF pattern showed a typical pattern of interaction was adopted.

Appendices 8: Extract 6.1

1.	Т:	So (.) any of you would explain (.) in very
2.		simple terms (.) what a cardiovascular system
3.		is? (2)
4.	S1:	Is it blood (.) transport system? =
5.	Т:	It is a transport system (.) yes
6.		(.)(um:::)it's a transport system (.) what (.)
7.		what does cardio mean? =
8.	S1:	heart? =
9.	Τ:	heart (.) vascular =
10.	S1:	vessels =
11.	Т:	vessels, okay? (.) so (.)

In the extract above, instead of asking what a term means, the tutor opens the concept of the display question by using the word "explain" in line 1, which triggered a more extended response than a one-word answer. The display questions adopted in the extract 6.1 showed a specific answer was required, which was a contrast to the previous extract 6.0. Nevertheless, attempts were made to expand the students' in the use of multiple display questions, clarification requests, and teacher echo. Reflecting on the message presented in extracts 5.0 and 6.0, the extract 6.2 also showed the use of *managerial mode* at the beginning or towards that end of a lesson to emphasise the importance of reading.

Appendices 8: Extract 6.2

1.	Т:	The presentation is only an overview (.) and
2.		you (.) you cannot possibly cover the (.)((2))
3.		you open a book (.) it's just as simple as this
4.		(.) you open a book (.) the book (.) in the
5.		library (.) I strongly advice (.) you make
6.		copies (2) make copies (.) and you open (.) and
7.		you start reading (.) you start reading (.)
8.		underline (.) take notes (.) if you don't
9.		understand something (.) you search in the
10.		internet (.) ask around (.) look for more books
11.		(.) okay?

Although no specific *interactures* stood out in the extract 6.2 above, nevertheless, the use of *managerial mode* at the beginning and the end of a lesson revealed a pattern associated with the content-based classroom. The organisational pattern detected here revealed the requirement of the content-based classroom to use *managerial mode* either to prepare students for the next class, conclude a lecture, or as a clarification of students' knowledge has similarities with the SETT Framework.

5.3.6 PRIMARY DATA: BIOLOGY – PRACTICAL

The Biology practical was held at a Biology lab that could accommodate 20 students or more. The lab was lined with rows of long tables facing the whiteboard, and the tutor's long desk was set in front. It was equipped with a hanging projector and a pulled screen at the front. The projector was connected to a desktop at the side of the class, where videos on Biology practical could be found. Similar to Geology, in Biology, the lessons also start with a lecture, but instead of using powerpoint, they used a video demonstration on the dissection of a rat. The tutor would pause the video to show the critical points to remember.

Similar to the Geology practical, the students were tasked to conduct an experiment on dissecting the rat while the tutor gave pointers once in a while to ensure students were doing it the right way. The practical starts with students rushing about with their dish to collect the rats for dissection while the tutor posed a question aimed at the whole class. The referential question in lines 1 to 3 made by the tutor concern the students' emotional feelings of dissecting living things was posed to reflect on the student's feelings and to prepare them for the upcoming task.

Appendices 9: Extract 7.0

1.	Τ:	Grab your rat (.) just one note (.) Would it
2.		be (.) would it be (.) more difficult for you
3.		to dissect (.) I mean emotionally (.)
4.		emotionally (.) involving to dissect a (.) a
5.		worm or (.) a rat?
6.	SS:	Rat
7.	Τ:	A rat (.) why? (3)
8.	SS:	Cause (.) it's a mammal

Before the dissection was about to start, the tutor posed a referential question in lines 1-5 to the students to get their emotional outtake on the experiment. The tutor starts by asking a referential question on which species between a rat and a worm would the students find emotionally involving to dissect. Understandably, some of the referential questions did not elicit a more extended student's turn, which may be due to the format of the question in providing two or more options to the answers thus, eliciting a one-word answer. Due to this, the line between referential questions and display questions became blurry. The knowledge that the referential questions could have similar properties and function as display questions, which raise the question on which is more effective in encouraging participation.

Aside from the use referential question, the use of scaffolding in the form of referential questions and clarification requests could also be seen in the extract, scaffolding

was used in lines 9 to 11, 13 to 16 and 23 to 25, to expand on the students' contribution by using the referential question to guide the questions. The use of scaffolding in the form of referential questions and clarification requests in extract 7.0 differs from other extracts. Although the answers were limited to a few choices, the tutor has no knowledge what the students would choose, and this is evident with the use of clarification requests. Clarification request as seen in lines 19 and 14 from extract 7.0 were also used to expand the students' answers to the referential question. The *interactures* found in extract 7.0 encompasses *interactures* found in the *classroom-context mode*. Although the *classroom-context mode* aimed to promote oral fluency and enable learners to express themselves, extract 7.0 could not be fully categorised as *classroom-context mode* as there were shorter students turn and longer tutor turn. This shows that applying classroom-context mode in content-based classroom would require overcoming the high content transmission.

The extract 7.2 seen in appendices 9 below also showed the use of referential question that related to a general view, i.e., a movie. The tutor also starts by using the referential question to ask about the movie to the class, as seen in line 1. The use of a referential question in the extract 7.2 below, was used to establish a space for the discussion on gravity force. The movie was used as an introduction to the body of vertebrates in a lower gravity force. The pedagogical goal was to enable learners to express themselves clearly and providing practice with content knowledge.

1. T:	Did any of you watch the movie Interstellar?
2. SS:	Not yet/yes =
3. т:	Not yet (.) interstellar you have this system
4.	(.)the planets on point eight (.) one point
5.	three (.)the gravity force of (.) of earth
6.	planet so (.) so (.) can you imagine what
7.	would happen to twelve vertebrates (.) on a
8.	planet fifteen million after (.) on (.) on a
9.	planet which has a lower gravity than (.) than
10.	earth? =

11. S1: Heavier than =
12. T: Sorry? =
13. S1: Heavier than the air and =

In the extract above, the tutor used a referential question in line 1 that functions as a yes or no question. However, the second question was a display question on lines 9 to 10, but it elicits a more extended response. The clarification requests in line 10 further expand the student's answer, as seen in line 11. Due to the student's mistake, the tutor repeated the question in line 12, saying that its "lower gravity force" thus, the answer should have been lighter. The confirmation checks in line 13 confirm the answer with the students, and the students respond with an affirmative. Looking at the *interactures* in this extract shows that certain *interactures* could be used for different uses, and it is not as straightforward as we think it is. Although similarities could be seen between extract 7.2 and 7.1 in the use of referential questions with limited answer and without, however, elicits different responses.

5.3.7 PRIMARY DATA: LANGUAGE & LINGUISTICS - LECTURE

The Language and Linguistic lesson took place in a small air-conditioned classroom with long tables facing the front of the classroom. The room could only accommodate less than 15 students. The tutor used powerpoint to present his lecture. Some of the facilities consist of a hanging projector and a whiteboard. Due to the size of the room, only one camera was placed behind the class facing the tutor.

Similar to both Geology and Biology, the language and linguistic course also opted to choose to use the *managerial mode* to start the lesson by recapping on what they have done in the previous class and relating it to the lesson and introducing the topic to the students by defining the topic as seen below in extract 8.0 of appendices 10. The pedagogical goals were in the transmission of information on deixis,

Appendices 10 Extract 8.0

1.	Τ:	Last time we a:: (.) didn't have a proper
2.		lecture we just (.) it was just kinda (.) a
3.		general introduction to (.) pragmatics and the

4.	kinds of (.)data that we would look at when
5.	(.) when doing this module and today, we have
6.	the (.) the first real topic (.) I mentioned a
7.	couple things about it last week If you
8.	remember (.) (um::) (.) today we're going to
9.	talk about (.) Deixis (.) funny pronunciation
10.	(.) right? I almost think it should be (.)
11.	Dayxis but it's not its Deixis (.) so (.) what
12.	is Deixies? (3) a (.) good brief definition I
13.	think (.) codification of features of context
14.	in languages

In the first lecture, the tutor relates the lecture on pragmatics with the lecture on deixis since deixis was a sub-topic under pragmatics, as seen in extract 8.0. The tutor has also approached the topic with humour by mentioning the pronunciation of the word deixis. He also tried to involve the student in the humour by using the confirmation checks in line 8 to 9; "funny pronunciation...right?" By doing this, the tutor was involving the students in the joke and inviting them to join in the interaction. Although it does not elicit any verbal response from the students, there was no argument found too. The use of display questions in lines 11 to 12 does not elicit any response from the students.

In comparison to the SETT Framework, the *display question* was not found in *managerial mode*. There was supposedly a shift from *managerial mode* to *skills and systems* due to the display question used, but since there was no response by the students, the display question was not valid. The display questions in line 11 of the extract 8.0 above seek to define the term "deixis." Although this is a question, which should elicit a response, this is not the case here. Instead, it becomes rhetorical, requiring no answer from the audience. The lack of response to the display question to define deixis was due to the students have no prior knowledge on the topic, thus, preventing them from answering the question. The students were not made aware in advance what to expect in the lesson.

In the language and linguistics classroom, the approach to the lecture consists of tasks through verbal interaction, or the task requires a discussion. The pedagogical goals consist of providing practice and enable students to display the correct answer. Due to this, examples of the sentence are frequently seen throughout the lecture. In this particular extract 8.1 below, the students were tested on their general knowledge of British and Australia's summertime.

Appendices 10: Extract 8.1

1.	Τ:	For example (.) a Brit (.) someone from UK
2.		says to an Australian (.) we're thinking of
3.		visiting you next summer (3) can anybody see
4.		the problem? =
5.	S1:	Next summer =
6.	Т:	Next summer yeah (3)
7.	S2:	Which summer? =
8.	Т:	Which summer (2)
9.	S3:	British or Australia =
10.	Т:	Right::? (.) The British summer that would be
11.		what would (.) ((2)) the British summer from
12.		the speaker (.) that would be the Brit (.)
13.		British summer is centre of projection (3)

The tutor starts the discussion in extract 8.1 with an example to establish a context of a person from Britain planning to visit Australia during the summer conducted using modelling scaffolding from lines 1 to 4. Due to the use of display questions in line 3 to 4 to identify any problems found in the sentence structure of line lines 1 to 3, students' responses were restricted. However, the use of teacher echo in lines 6 and 8 with an extended wait time allowed the students to realise the correct answer to the display question in lines 3 to 4. One student in line 9 provided another aspect of the answer.

Extract 8.1 shows that the tutor deliberately let the students elaborate on their answer. The confirmation check at the end suggests that the tutor agrees with the students' answers.
By doing this, the tutor was able to provide space for the students to add their input and thus participate in the classroom. Although the tutor used similar *interactures* as the *skills and system mode* in Biology and Geology, the difference here lies in the extended wait time without any expansion of the answers or any disruption to the students' contribution.

Similar to previous extracts, the use of humour allows the tutor to break the pace of the lecture and pull the students back to concentrate on the lecture. However, the extract below shows how the tutor unconsciously creates a situation where the students were able to make humorous answers. The pedagogical goals were also in providing practice, display the correct answer, and enable learners to manipulate the target language.

Appendices 10: Extract 8.2

1.	Τ:	I have lived here for years (.) where's here?
2.		(3) right? (.) What could it be? (.) If I say
3.		to you, I've lived here for years (.) could
4.		be?
5.	S1:	>UBD<
6.	Т:	Could be? =
7.	S1:	UBD =
8.	Т:	UBD? [†] [SS Laugh] I lived in UBD? (.) But feels
9.		like it (.) sometimes by the number of hours I
10.		work, right? (.) Could be UBD (.) could be?

The extract 8.2 started with a situation or modelling scaffolding, as seen in lines 2 and 3, which establishes the context just as in extract 8.1 to provide space for students to express themselves. The *referential question* was used instead of a display question in lines 1 to 4. The use of *referential questions* allows for variation in answer, which resulted in the random answer provided by the student in lines 5 and 6. The tutor realised in line 7 that the students' answer was either deliberately or confusing due to the possibilities the answer if seen from another point of view. The clarification request in line 8 was seen as rhetorical due to the tutor's agreement to the answer in lines 9 to 10 as he coincides with "but feels like it

sometimes by the number of hours I work, right?". Then the tutor repeated his original question using a rising intonation on the word "could be?"

Either the response was made deliberately or not is uncertain but the students' response; "this room" in line 10 brought the interaction back to the humorous mood. Another confirmation check was used in response to the student's answer; "this room? I lived in this room?" as seen on line 12. Noticing that the students might have deliberately chosen to answer the question humorously, the tutor tries to put a stop to this by using a direct repair, as seen in line 13; "no ... I don't think so." This lead to the students to finally provide a more plausible answer in line 14; "Brunei," which was echoed by the tutor in confirmation. The excerpt 8.2 revealed that the students could manipulate their use of language as much as the tutors do, especially in the creation of humour. Humour plays a vital role in breaking down the pace and allow the students to refocus.

Appendices 10: Extract 8.2

11.	S2:	This room
12.	Т:	This room? 1 live in this room? [SS Laugh]
13.		No:: (.) I don't think so =
14.	S3:	Brunei =
15.	Т:	Brunei (.) yeah

In the language and Linguistics, there were no requirements for any prior preparation for the tutorial. Students were not provided with notes due to the questions and tasks present in the PowerPoint for lectures. As seen from below, students were not required to do any preparation, nor is there any mentioned of the topic for the next tutorial:

Appendices 10: Extract 8.3

1.	Τ:	On Monday at two, we got tutorial, right? (.)
2.		No need to prepare anything for it (.) Well
3.		you don't need to prepare a presentation for
4.		it (.) we will do some work on deixis and we

5.	will	talk	about	the	presentation	(.)	for	the
6.	futui	re tut	corials	5,				

Tutor's use of *managerial mode* was to transmit information on the tutorial, which was similar to the *managerial mode* found in both Biology and Geology. By conducting the *managerial mode*, the tutor seeks to ensure students pay attention to the information provided and, thus, preparing the students for the next lesson. There is no evidence of display questions found in the extract 8.3 of appendices 10, which differs from another subject area. The *managerial mode* found in extract 8.3 has more similar *interactures* used to the *managerial mode* in the SETT Framework as compared to other extracts.

5.3.8 PRIMARY DATA: LANGUAGE & LINGUISTICS – LECTURE 2

The second lecture was also held in a small air-conditioned classroom equipped with overhead projector, whiteboard, tables, and rules. In the second lecture, the tutor jumps straight to the topic and its relation to their previous lesson on "process writing" and the definition of "creative writing." The extract adopts a *managerial mode*, which has an extended tutor turn and absence of students' turn.

Appendices 11: Extract 9.0

1.	Т:	Right (.) okay (.) We've been talking last
2.		time about process writing and today we're
3.		gonna move on (.) with another that we
4.		mentioned the week before (.) with creative
5.		writing,(3) Now creative writing is something
6.		(.) I think you can call it a fairly
7.		traditional approach (.) used in L1 classroom
8.		(.) for a very long time, it's still probably
9.		the (.) default approach in many first
10.		language classrooms

Extract 9.0 above showed the tutor defining creative writing. There was an extended teacher turn and an absence of student turn. Although the tutor does not use any distinct *interactures* in the *managerial mode* of the second lecture, the use of the *managerial mode* showed similarities in the organisation of interaction in the language classroom. The *managerial mode* found in extract 9.0, was more similar to the *managerial mode* in the SETT Framework as compared to other extracts.

Extract 9.1 seen in appendices 11 showed that students were studying creative writing, and after the introduction of creative writing, the students were asked to justify conducting creative writing in class. At first, there was no respond made by the students, which cause the tutor to choose one student whose name was omitted from the transcription, as seen in lines 8.

Appendices 11: Extract 9.1

1.	Τ:	What arguments can you think of for justifying
2.		creative writing? (.) Have a little think
3.		about it then (um::) I'll ask you (.) Perhaps
4.		it's motivating for the students (.) that's
5.		one (.) anything else? (28) any ideas came to
6.		mind? Other than motivating yourself anything
7.		else? (4) no possible justification? (.) but
8.		you said you like it $[{f C}]$ (.) why did you like
9.		it? =
10.	S1:	It's free (.) I think ((2)) because I can do
11.		what I think =

Extract 9.1 starts with the tutor using referential questions to find justification as to why it was necessary to teach or learn creative writing other than motivation. The use of *referential questions* allows the students to provide a variety of answers. Furthermore, line 5 shows the tutor provided an extended wait-time before proceeding to choose one student to provide their justification for learning creative writing. There was an extended student turn here in lines 10 to 11 where at first, the student answered at the encouragement from the tutor,

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but the second justification in line 9 was made on her own. The tutor took a back seat to listen to the student's reasoning before providing content feedback on the main points of the class, as seen in line 15, thus, providing minimal repair. Although there was no back and forth discussion between the tutor and students, the students were able to provide an elaborate comment due to the referential questions, which produce a variation of the answer. The *interactures* used were similar to those found in the *classroom-context mode* of the SETT Framework.

Appendices 11: Extract 9.1

10.	S1:	It's free (.) I think ((2)) because I can do
11.		what I think =
12.	Т:	(Uh) (.) (hmm) =
13.	S1:	It's a bit disappointing if they give many
14.		comment on =
15.	Т:	(Uh) (.) (huh) (.) right (2) Its free (.) so
16.		you're not constraint to write in a
17.		particular way

As in the other courses, students tend to use clarification requests to initiate the interaction with their tutor because the students required the tutor's assistance during a task-based exercise or when they were confused about certain aspects during a lecture or practical or tutorial. The use of clarification requests to initiate interaction was also the case in excerpt 9.2 below, where the students were given a task to finish a five sentence story by writing another five sentences to complete the story. However, the students found the task confusing, resulting in the student's choice to ask the tutor for another explanation on the task. The pedagogical goal for extract 9.2 seeks to provide students with practice in their sub-skills, which in this case, was in writing a story. Extract 9.2 also aimed to enable learners to manipulate the target language, which was the English language.

Appendices 11: Extract 9.2

S1: Just to (.) write in this form Sir (.) but in
a form of a story?

3. T:	complete (.) this is the first half of the
4.	story (.) right? (.) and you want to continue
5.	sixth [sentence =
6. S1:	You] (.) complete? (.) yeah (.) =
7. T:	Finish the story =
8. S1:	(Oh) (.) (oh) okay (.) So we just continue? =
9. T:	continue the story (.) six (.) seven (.) eight
10.	(.) nine (.) ten (.) Five more sentences
11.	(5) [T wrote on white board]

A clarification request was used by the student to understand the format of the task at hand. By using the clarification request, the student seeks to make sense of any unclear instructions. The tutor used confirmation checks in line 4 to ensure students understood his explanation. The student was still not able to grasp the concept of the task, which resulted in the two display question posed, as seen in lines 6 and 8. The tutor then provides a model for scaffolding using the whiteboard to show what he meant for the task, as seen in lines 9 to 11. In this excerpt, what could be seen is that the student was confused with the format of the story writing since story writing is in the form of paragraphs, not sentences. What this tells us that setting task in the classroom may require proper time management on the tutor's part and although it encourages the students to participate by asking questions or contribute a comment, the time is taken to explain the task and answer clarification requests could take up the time set for a particular task.

Therefore, we could say that in the middle of the lesson for the language and linguistic lecture, the interaction was set around the task organised. For each class, there could be more than three tasks set up depending on how complex the task is. The tasks tested the students' skills in writing, reading, and speaking. Unlike lectures in Geology and Biology, the language and linguistics can have a very complex structure due to the incorporation of the task. These tasks are what regulates the students' interaction in the classroom besides transmitting content knowledge. Although it is not impossible for the task to be incorporated into high content-based such as Geology and Biology courses, nevertheless, due to time

constraints and the amount of content to deliver to the students may restrict actual physical tasks such as writing or drawing. Instead, the task set through interaction may be possible.

At the end of the lessons, the students may linger to ask questions directly to the tutor instead of during the class. In the second lecture of Language and Linguistics, the student initiates a question after the class ended, initiating a discussion on limiting words in writing.

Appendices 11: Extract 9.3

1.	S1:	Is it (.) important to limit the number of words
2.		they (.)write?
3.	Т:	I think (.) <u>no</u> but (.) what do you think? I don't
4.		think, so I mean when we limit the number they will
5.		be counting the number for sacrifice so (.) it's
6.		not very good ((2)) Well if you want students to
7.		write freely sometimes it's not good not to (.)
8.		to set limit but sometimes you an (.) other
9.		argument would be you want them to write a certain
10.		style sometimes maybe you have to set the limits
11.		(.)

Similar to previous extracts in the language and Linguistics course, the referential question was posed to set a context for discussion, as seen in lines 1 to 2. However, this time, it was the student who raised the question to the tutor on the importance of limiting the number of words students write, as seen in line 1. The referential question has an open approach, which was able to produce different answers, and this was proven in line 3 when the tutor posed a referential question back to the student in line 3, "what do you think?". The use of referential questions thus shows that the tutor tried not to lean on one answer as there is no wrong and right answer, and it depends on what type of writing was done. Although this is a spontaneous action from the student, it shows that they are not afraid to participate, unlike the other examples of students initiating a discussion.

5.3.9 PRIMARY DATA: LANGUAGE & LINGUISTICS - TUTORIAL

The Language and Linguistics tutorial was held in a small room with tables facing the front of the room, chairs, a whiteboard, and the teacher's desk at the corner. Only five students were taking the module. The tutor will not be using any PowerPoint, but instead, a handout was provided with the task of the day on the topic of process writing. There were four tasks set in the handout, but the lesson could only accommodate three. The task was set to test the students' writing, reading, and speaking skills. There were no specific *interactures* used by the tutors to start the introduction except for the explanation of process writing and the explanation of the first task, as seen below in extract 10.0.

Appendices 12: Extract 10.0

1.	т:	The first stage in the (.) process writing
2.		(um::) (.) as you know, there are different
3.		ways of starting of a (.) processing
4.		writing class and so since there is five of you
5.		(.) I know we got five (.) different (.)
6.		possibilities there, okay? (.) So (.) what I
7.		want you to do (.) is (.) come up with one of
8.		the methods each (.) and I want you to just (.)
9.		think of (.) couple of arguments (.) why (.) $% = (1,1) + (1,$
10.		that (.) for that particular of study of
11.		process writing (.) so let's just do it

The above transcript starts with the tutor explaining the first task where each student will be allocated one of the five steps in the starting process writing. The students were then asked to think of an argument on why one of the five steps of starting process writing is better, as seen from lines 1 to 10. One student tries to gain the tutor's attention to seek clarification on whether they were supposed to explain how they were going to use one of the steps of starting process writing, but she was cut short by the tutor. The tutor explains that they need to explain "how and why" using that particular step of starting the process writing is useful, as seen in lines 14 to 16. This excerpt shows similarities with interaction found in Biology and Geology lecture where student initiates the conversation by using clarification request,

which shows that the students were encouraged to initiate an interaction when they needed to clarify the tutor explanation.

Appendices 12: Extract 10.0

14.	Т:	Yes? =
15.	S:	Are we (.) supposed to explain how (.) we are
16.		going to =
17.	Т:	Yeah (.) how and (.) why you think that
18.		particular (.) way of starting off process
19.		writing (.) might be good or effective or
20.		useful way of doing it (.) okay?

For the Language and Linguistics tutorial, the tutorial was set up around three tasks, which includes speaking, reading, and writing. Overall there is a lot of extended learner turn throughout the lesson. One of the examples of an extended learner request can be seen below. The extract 10.1 showed a predominance of IRF patterns initiated by the student with the pedagogic goal of providing practice on students' sub-skills, to offer corrective feedback, and enabling the learner to express themselves clearly.

Appendices 12: Extract 10.1

1.	Т:	So (.) why do you think brainstorming (.) is a
2.		good way of doing that? =
3.	S1:	So they can get (.) into the ideas =
4.	Т:	(Uh) (.) $(uh) =$
5.	S1:	The first thing they write =
6.	Т:	Right (.) so they (.) they (.) arrange their
7.		ideas brainstorming (.) how can it be
8.		arranged? =

In the extract above, the tutor set up the context for discussion using the referential question to find out the student's opinion on the use of brainstorming to start process writing,

as seen in lines 1 to 2. The referential question here prompts the student to elicit extended learner turn, as seen in lines 3 and 5. In line 6, the tutor reformulates the student's answer using scaffolding to create another referential question with a different aspect of brainstorming and doing this also aimed to expand the student's answers further, as seen in lines 9 to 11 and 13 to 14. In line 15, the tutor confirms the student's answer by echoing the word "arrange."

Appendices 12: Extract 10.1

9.	S1:	Some start if you keep by talking (.) they
10.		will $((2))$ out $(.)$ then they will $(.)$ have
11.		points =
12.	Т:	(Uh) (.) (uh) =
13.	S1:	and the points (.) raised by the students (.)
14.		so they can just arrange directly =
15.	Τ:	(Oh) yeah \uparrow (.) yeah (.) arrange and (.)
16.		everything =

In extract 10.1, the referential question has an open concept because the tutor used the word "why." Due to this, the tutor was able to expand the student's answers. In lines 21 to 25, the tutor concludes the discussion by using content feedback on student's ideas. The tutor also uses another referential question, which was aimed towards the other students in the class.

Appendices 12: Extract 10.1

21.	Τ:	for the beginning] (.) okay (.) right (.) so
22.		(.) there (um) (.) and (.) anybody else (.) $\$
23.		think of another (.) way? (.) students are
24.		coming out with ideas any other good points
25.		about brainstorming (2)

The excerpt 10.1, as seen in appendices 12, however, has an almost equal turn between the tutor and students. In continuation of the topic from the last excerpt on brainstorming, the tutor chooses to include other students in the discussion to hear an alternative view on brainstorming. In this case, he relates the topic of barnstorming with the inclusion of the class. Thus, eliciting the referential question as seen in line 1 below. In response to this, one student suggested the idea of using points indicated in line 2. In lines 4 to 6, the tutor chooses to reformulate the input made by the student concerning the topic of inclusion and brainstorming.

In excerpt 10.2 as seen in appendices 12 below, the discussion on the use of pictures in process writing is straightforward with the use of referential questions. The excerpt 10.2 above kicks off with the tutor asking a display question to the students on the method of starting process writing that they have used before, as seen in lines 1 to 3. The *display question* was also produced by the tutor to expand on the student's answer and ask other students for their opinion on the methods of starting a process of writing, as seen in line 12. Teacher echo was also used in lines 14 and 16 to confirm the student's answer and encourage the students to expand on their answers.

Appendices 12: Extract 10.2

1.	Τ:	So (.) which:: ones have you used? which one
2.		of these methods have you used? In (.) process
3.		writing class (.) to start off (2)
4.	S1:	I used a:: (.) I used pictures =
5.	т:	(Oh) \uparrow you used pictures (.) it's a good thing
6.		I give it to you =
7.	S1:	Yeah (.) [SS laugh] and taking notes and
8.		getting them to answer questions (2)

Appendices 12: Extract 10.2

12.	Т:	So,	which	you	think	is	the	(.)	better?	=
13.	S1:	I	like	brai	nstorm	ing	=			

14.	Τ:	You like brainstorming =
15.	S:	And pictures =
16.	Τ:	And pictures (.) what about the rest of you?
17.		have You also (.) you have used brainstorming,
18.		right? [T points to one student] =
19.	S2:	but a:: (.) actually we use almost all the
20.		((2)) (.) but the most we used are one and
21.		five =
22.	Т:	one and five (.) okay

In lines 5 to 6, the tutor used humour; "oh, you used pictures … It's a good thing I give it to you", which brought the laughter on line 7. The tutor also used a referential question in lines 9 and 16 to implore the students' experience with the methods of starting a process writing. The *interactures* used in this extract 10.2 reflects the *skills and systems mode*. However, similar to extracts found in Geology and Biology, the focus of the *skills and systems mode* was on the content rather than a form of language use.

The Language and Linguistic tutorial end as the last task ends. However, students were found discussing general topics at the end of the class with the tutor after the recording was done. The analysis of the primary data has shown to produce similarities and differences in the use of interaction than noted in the pilot data extracts.

5.4 SECONDARY DATA: INTERVIEWS

Theme 1: Use of questions in Managerial mode.

In the primary data, we could observe the use of *managerial mode* at the start and the end of the lesson. Similarly to the SETT Framework, the pedagogical goal of this *mode* was focused on transmitting information, referring learners to the material, introduce and end an activity, and shift from one *mode* to another. The *managerial mode* encompasses an extended tutor turn, an absence of students' turn, the use of transitional markers, and the use of confirmation checks. However, in some cases, the use of either display or referential questions do not shift the *mode* from the *managerial mode* as evidence from the use of

pedagogical goals and the lack of students' turn. Questions were used to introduce topics by recalling previous knowledge and connecting it with the new topic, as mentioned in extract 2.0 below:

Appendices 13: Interview Extract 2.0

1.	I:	How do you start (.) the lecture?
2.	Т:	If I have done a couple of lectures (.) in the
3.		beginning (.) after the 3^{rd} lecture (.) lets say I
4.		usually asks S (.) to recall few things (.) from
5.		the previous lectures in order (.) to have the
6.		connection to the next

The evidence indicating the use of questions in the form of "recall" at the beginning of the class, as mentioned in line 4, showed that the use of *managerial mode* was not typical, as seen in the SETT Framework due to the use of questions within the *mode*. Evidence of questions used at the end of the lesson was also mentioned in line 3 below:

Appendices 13: Interview Extract 2.01

1.	I:	Do you usually (.) have a question and answer after
2.		classes end?
3.	Т:	students come (.) after asking for clarification
4.		(.) also, some idea they have (.) During practical
5.		while we are supposed (.) to apply the things we
6.		learn in the lecture we ask (.) they still ask
7.		their questions regarding the Lecture

Not only were questions used to recall previous knowledge, but it was also used to clarify what has been taught in the lesson. Questions could be used by both the tutors and the students. The use of questions to clarify the contents of the lesson shifts the *mode* to the *managerial mode* at the end of the class, thus extending the tutors' turn and ending the

activity. Therefore, the use of a question in the *managerial mode* not only recalled prior knowledge to relate to the new topic or clarify what has been taught, but it was also an attempt to encourage participation.

Theme 2: Multiple display questions expands student's contribution

Display questions play one of the most prominent roles as it was frequently used in all three courses observed in this study. The display question functions as a question with readily available answers, as seen in the SETT Framework. This type of display question was used in content-based classrooms to test the students' skills or previous knowledge. It could be found in the introduction of a topic or a new subtopic. This display question could either elicit an IRF (initiation response and feedback) structure or a Rhetorical question. Although, as often seen in the findings, display questions does not produce an extended learner turn. However, the fact that it elicits a response from the students shows that it has the potential to extend and elaborate an answer depending on the words used. Display questions were not only used to recall or clarify previous knowledge but also encourage students to participate, as explained below:

Appendices 13: Interview Extract 2.02

1.	I:	What type of question (.) is easier to ask (.)
2.		display question (.) where you know the answer or
3.		referential question (.) where you don't know the
4.		answer?
5.	Т:	Its more easier to ask (display) questions but I
6.		feel (.) that I try to make them more comfortable
7.		so it's obvious they try to participate.

The extract above showed the tutor's preference in using display question, but as seen in the observation extracts, some display question does not elicit any response or only a short one-word response. In cases where there was a lack of response from the recipient, tutors used multiple display questions to elaborate student's contribution as mentioned in the extract below:

Appendices 14: Interview Extract 3.1

1.	I:	Have your tutor ever use recall? How did he do it?
2.	S:	Yes (.) he ask question (.) it happened just now
3.		he said like okay (.) where do you find ((2)) so
4.		yeah (.) he does recall (.) recall from previous
5.		lectures

Due to the use of multiple display questions, the students were able to recall previous knowledge, which expanded their turn by answering a sequence of questions. The observation data also showed display questions used to elaborate or refine referential questions as mentioned below:

Appendices 14: Interview Extract 3.2

1.	I:	How does it help you to study besides powerpoint?
2.	S:	He ask questions (.) and he went elaborate more
3.		and more (.) from there (.) we can learn the
4.		previous class (.) which we have forgotten

Therefore, multiple display questions performed several functions such as expanding students' answers, recalling previous knowledge, and refining a question when students struggle to answer.

Theme 3: Content feedback used in the materials and skills and systems mode

Due to the high content transmission in the three subject areas, there was more evidence of content feedback being used as opposed to form-focused feedback. Content feedback was used, in this study, to respond to the students' understanding of the message in the answer rather than focusing on the words or sentence structure. However, in the case of the Language and Linguistics course, content feedback was also used to extend the content of the students' answer or as a conclusion during the *materials mode*, and the *skills and systems mode* as mentioned below:

Appendices 13: Interview Extract 2.03

1.	I:	How do you:: respond to an initiation (.) made by
2.		the students?
3.	Т:	In most of the cases (.) I try to give indirect
4.		evidence in order to:: take answers from them I am
5.		quite patient (.) and I try to force them okay (.)
6.		try again if you don't give the correct answer (.) $% \left($
7.		or if you are nearly correct (.) I give some
8.		directions in order to provide a better answer so I
9.		try to force them to give their \underline{own} answers (.)
10.		rather than me to give them

The abstract 2.0 above showed how the tutor used feedback by providing hints of the content to extend the student's answer and allowing them to answer on their own. By doing this, tutors not only provide feedback but also test the students' knowledge and encourage participation, which was also supported by the students, as mentioned below:

Appendices 14: Interview Extract 3.3

1.	I:	How did (.) your tutor provide feedback?
2.	S:	when he teach and um:: he elaborate more from the
3.		question, (.) he did give hints though

The abstract above showed that by using the content of the question as hints in the feedback, the tutor was able to expand on the student's contribution and encourage the students to participate.

Theme 4: Wait-time constraints or extended student turn

Wait-time refers to the time given to the students to formulate their answers. An extended wait-time was more frequently used in the Language and Linguistics subject area in comparison to Biology and Geology. Due to time constraints in higher content-based subject areas, providing an extended wait-time may be seen as time-constraining. Looking at the interview, extract 2.0 below goes to show the difficulty in balancing the use of wait-time.

Appendices 13: Interview Extract 2.04

How much time (.) after questioning (.) do you
usually give the students?
I think you need to find the balance (.) my opinion
is that (.) if you give them shorter time (.) not
all students have the same ability to respond in
the same time (.) of course some people need more
time (.) some people need less (.) you need to
make all students to feel (.) like you have all
their time (.) to think on the on the other hand
if you (.) let them think for more than a certain
period of time I'm afraid that we have two
problems the first (.) problem is that they will
get board the second thing is that (.) I have to
finish my lecture within:: two hours so I will
have no time to my lecture that's why (.) I
believe every lecturer finish must find the
balance between the short (.) and the long time

The extract above showed how the tutor approach wait-time so as not to waste time nor to restrict the student's contribution. Wait-time may not be seen in the SETT Framework, but the use of wait-time was observed to play a significant role in providing space for students' to participate and to encourage students to produce an extended turn.

Theme 5: Humor breaks the fast pace

Humour was found in all three different courses to break the fast pace of contentbased classrooms. Humour was used with different *interactures* to achieve its purpose. One of the ways was using display questions to elicit humour through the play of words in the question as seen in Geology, and Language and Literature courses. Humour allowed the tutor to put the brakes on the pace of the lecture and keeping the students' concentration focus on the crucial matter at hand, i.e., the content. It was also used to keep the classroom environment light and comfortable enough for students to want to participate, as mentioned in the extract below:

Appendices 13: Interview Extract 2.3

1.	I:	What did you think (.) about the tutor's use of
2.		humour (.) in the video?
3.	S:	funny and interesting (.) He caught our attention
4.		and keep on going

The interview extract 2.3 above proves that humour only attracts the student's attention and allow for a break in the pace of the lesson.

Appendices 15: Interview Extract 4.0

1.	I:	From the video (.) I could see how the students
2.		respond well to humour
3.	Т:	yeah (.) I make jokes all the time (.) I try to
4.		keep it fairly light (.) warm up faster and react
5.		better um:: I often get feedback that it's a
6.		grammar class (.) but it's funny you don't expect
7.		grammar classes to be funny(.)it's just a way of
8.		relating to them and making it fairly easy(.)
9.		instead of questioning (.) what do tutors do to
10.		make us involved more (.) or talk more?

Using humour was, therefore, beneficial as it created a light atmosphere when transmitting high content knowledge. Furthermore, it allows students to feel at ease with expressing themselves and encourage students to participate, as mentioned below:

Appendices 13: Interview Extract 2.05

1.	I:	How do you (.) make sure your students are
2.		comfortable (.) participate in the classroom?
3.	Т:	First of all (.) my intention is to make them feel
4.		comfortable (.) that's why (.) sometimes I use some
5.		jokes lets say to make them feel (.) better in
6.		order to express themselves later (.) this is my
7.		impression (.) I also try to ask question regarding
8.		the lecture (.) but I also try whenever it is
9.		possible look to (.) to ask them or to give them
10.		examples from their everyday life, for example (.)
11.		we use minerals in our everyday life, and we don't
12.		know that (.) most people don't know (.) that even
13.		in our homes and they feel better (.) because they
14.		think it is not so scientific,

The extract above acknowledged that humour could also be used to provide content information but in a comfortable way, which not only encourages students to participate but also helped students remember the knowledge effectively. However, without proper knowledge and understanding of the culture and background of the recipient, the use of humour may be seen as something offensive as seen below:

Appendices 14: Interview Extract 3.4

1.	I:	How	did	your	tutor	(.)	use	humour	in	the	classroom
2.	S:	He u	ise s	sarcas	m (.)	as	a hur	nour			

This extract shows that the appropriate and correct use of humour was required. Including humour in the SETT Framework was beneficial for tutors to break the pace of the lesson, transmit knowledge in a light atmosphere, and encourage students to participate.

Theme 6: Code-Switching encourage participation

As noted in the research, all of the tutors participating in the primary research were not local tutors even though some have stayed in Brunei for almost 20 years. Although the English language was the medium of instruction, it was the second language for almost all of the participants as noted below:

Appendices 13: Interview Extract 2.06

1.	I:	Did you find any case (.) where language use was
2.		seen as a (.) barrier?
3.	T2:	I don't think so, fortunately, or unfortunately I'm
4.		not a native English speaker (.) so they know that
5.		I am in the same situation with them (.) so if they
6.		make some mistakes I also make mistakes this I know
7.		in English I mean (.) so I don't think I have
8.		problems like this they (.) try to express a
9.		themselves (.) with body language even

Although in the classroom itself students and tutor tried to keep from using their mother tongue when the students meet together or work together in a group or during practical lessons, they are bound to speak in their mother tongue as it helps with their confidence as mentioned below:

Appendices 15: Interview Extract 4.01

1.	S:	How do you find the first year students (.) in your
2.		class?
3.	т:	they can be a bit shy (.) they can be a bit

4.	reluctant to speak up (.) (um::) There is a certain
5.	cultural reluctance to (.) to (.) kind of (.) to
6.	stick out and be the one who (.) who sort of puts a
7.	head above the power ((2)) and you know (.) and so ${\tt I}$
8.	(.) there's that aspect to it (um) I find (.) I
9.	think that maybe English students (.) I (.) I (.)
10.	students of English language (.) are a bit more
11.	willing to do so partly because their English is
12.	better (.) than the average student obviously (.)
13.	and partly because they are used to being taught
14.	by:: (um) orang puteh and you know orang puteh tend
15.	to encourage more (.) Most of their lecturers in
16.	the beginning will be org puteh

Using their first language allowed the students to become more comfortable and provide valuable input to the classroom, as mentioned in the interview extract 4.0 below:

Appendices 15: Interview Extract 4.02

1.	I:	Was there a time (.) when the student blow away
2.		your expectations (.) by providing an interesting
3.		point?
4.	Т:	Not blown my expectation (.) just beyond my
5.		knowledge because okay (.) I will sometimes say
6.		what is this situation in Malay and I'm not really a
7.		Malay speaker, right? (.) Now in this example (.)
8.		I ask them about inclusive and exclusively Malay and
9.		they knew the answer but (.) there's quite a few
10.		times with Malay I generally won't know the answer
11.		it won't be a teach you question so (.) they are

Malay native speakers, so I'm saying what's the situation in Malay and then sometimes they kind of discuss it among themselves and then come back and tell me (.) They do come up with something I don't know myself

Therefore, the use of code-switching is a valuable feature of interaction that needs to be taken into account. Although the SETT Framework does not include the code-switching, it could be a valuable feature of interaction in the L2 classroom, especially in building up students' confidence and encouraging them to participate. Thus, it concludes the themes arising from the Primary and Secondary data collected through observation and stimulated-recall interviews. Further discussion could be found in the next chapter.

Chapter VI: Discussion

Conversation is the essence of all professional dialogue, the prime force through which meanings are negotiated, concepts explained and understood, and exchanges of opinion given (Mann and Walsh, 2017: p. 40)

CHAPTER SIX: DISCUSSION

6.1 AIMS & PURPOSE

The present study seeks to understand how the English language was used as a tool by tutors in the content-based classroom in comparison to the language classroom through the SETT Framework introduced by Walsh (2006; 2011). This study aims to provide a platform through video observation and stimulated recall interviews for critical reflective practice aiming to raise teachers' CIC and encourage participation in the creation of a collaborative environment. This study seeks to answer firstly, what are the ways tutors from three different content-based subject areas in UBD use *interactures* in comparison to the SETT Framework? Secondly, how does understanding tutor's use of *interactures* found in content-based subject fields be accommodated into the SETT Framework? Finally, how does understanding their use of *interactures* raise the awareness of the tutors' and students' CIC?

6.2 PILOT STUDY

The pilot study was conducted in one class in a polytechnic school in Brunei. The main aim of the pilot study is to test the method of data collection, i.e., the non-participant video observation, and the stimulated recall interviews. The data from the observation video was analysed using the SETT Framework focusing on the use of the selected *interactures*. The data from the interview was analysed by using thematic analysis on the themes that arise from the observation data. The findings of the study have shown that at least eleven themes were found where the use of the selected *interactures* has elicited different kinds of responses, which coincide with the concept of the subject course. The most prominent themes among them were the use of display questions used in elaborating answers, and the use of a referential question in explaining how answers are achieved. What the pilot study revealed was that through observations and interviews, we could go in-depth in the tutor's use of language to discover the different ways in which the *interactures* could be used as a tool to encourage participation.

6.2.1 LIMITATIONS OF PILOT STUDY

During the video observations, two cameras were set up in the classroom to capture the classroom from the angle of the tutor and the angle of the students. However, what was discovered was that there was difficulty in placing two cameras in a small classroom. Furthermore, transcribing two sets of the same video was not only time consuming but also irrelevant. The first change made to the research method was in using only one video camera. Secondly, due to the limited schedule of the participants, both observation data and interview data were collected within one day, which reduces the time for the researcher to prepare for the stimulated recall interview. Therefore, in the initial data allowance, up to three days to collect the interview data was made depending on the schedule of the participants. More than three days would not make the video data valid for stimulus recall. Furthermore, a set of questions is required to start the videos, and selecting snapshots from the videos require the use of a timeline to pinpoint where the *interactures* were used. Another change was made concerning the interview method whereby the appropriate time to reveal the video was difficult to determine because of the need to balance not only the video but also the voice recorder while conducting the interview. Thus, the decision was made to show a snapshot of the video at the beginning of the interview and more while conducting the interview when there were pauses to the dialogues. For the most part, there were no significant changes to the research method.

6.3 SUMMARY OF RESULTS: PRIMARY DATA

This primary study was also divided into two parts, the video observation, and stimulated-recall interview. The primary data or the video observation was analysed using the SETT Framework, which investigated the use of *interactures* in relation to teachers' pedagogic goals in three different courses in UBD. The secondary data, which was the interview, used thematic analysis to procure, discuss, and provide some evidence to themes that arise from the primary data. Using the SETT Framework as the system of analysis on the transcripts from the observation data, this study discovered reoccurring themes found in the pilot study were also observed in the primary study. Some of these themes concern the function of the *interactures* in the SETT Framework and the pedagogical goals associated with it. Along with these reoccurring themes, some additional themes were surrounding the use of the *interactures*, which will be elaborated below:

Using Display and Referential Questions in the Managerial Mode:

In the SETT Framework, using question was not mentioned as one of the *interactures* in the *managerial mode* where the pedagogical goal consists of teachers "transmitting information, organising the physical learning environment, referring learners to materials, introducing or concluding an activity, and changing from one *mode* of learning to another" (Walsh, 2006: p. 66). Nevertheless, the presence of confirmation checks in the *managerial mode* allows for questions to be used in particular the display questions, which refer to questions that teachers "know the answer" (see Walsh, 2006: p. 67; 2011). Using the display questions in the SETT Framework are mostly found in the *materials mode*, and *skills and systems mode* where the teachers' goal was to prompt response on the material and allow students to display the correct answer. While the display questions found in this study were used in *managerial mode* to recall students' prior knowledge and to relate it to the new topic, to clarify students' knowledge of the content, and recall the newly gained knowledge at the end of the lesson. The display questions also limit the students' turn, allowing teachers to limit the time spent on discussion and focusing on delivering the content.

On the other hand, in this study, tutors in the content-based classroom were found using referential questions, which refers to the "questions that teachers do not know the answer" to, during the *managerial mode* instead of the *classroom-context mode* (Walsh, 2006: pp. 66; Walsh 2011). By using referential questions, tutors were also able to expand on the students' turn and, thus, encourage them to participate more, especially before the class. Using referential questions in the *managerial mode* allowed students to relate their common sense and experience to the topic of discussion. Introducing a topic or an activity as seen in the *managerial mode* does not mean a "non-negotiable, norm-referenced, and teacher controlled" form of dialogue, in fact, tutors were required to interpret and negotiate students' intended meanings to relate to the focused subject areas (Kramsch 1986: p.369). Thus, the use of referential questions in *managerial mode* could be seen as a form of a collaborative effort to negotiate and interpret the students' intended meanings, which lead to the introduction of the content of the subject. Therefore, the use of questions in *managerial mode* allows teachers to use the students' experience or prior knowledge concerning the topic, which reduces the students' disparity with the topic.

Multiple Display Questions expands Students' Contribution:

As explained above, the use of display questions could reduce or limit the students' turn to one-word answers. Due to the tutors' concerns with the high content transmission and time constraints in content-based classrooms, the use of display question was preferred in comparison to the referential question. By using display questions focused on the content of the subject area, tutors could retain the student's focus on the subject and limit the time spent on students' contributions. The display questions found in this study were used multiple times in a sequence following students' contributions to provide hints or keywords for the students to elaborate and expand their answers. This method of using the display questions also aimed to recall prior knowledge and create a form of scaffolding to provide students with hints to display the correct answer. By using multiple display questions, tutors seek to contribute to the engagement of students' participation but limiting to a time-frame.

The use of multiple display questions in content-based classrooms was also possibly due to the propensity of students to produce "very short utterance" as proven not only in this study but also in a study by Masitah and Clarke (2014: p.13). According to Masitah and Clarke (2014), content-based lessons tend to be 'rushed,' and any interactions conducted were in the form of 'fast-paced exchanges,' which provide limited opportunities for "students to participate in a classroom discussion" (2014: p.1). Due to the fast exchange display questions could also appear more rhetoric, which discourages students' participation (see Masitah and Clarke, 2014). The students themselves may also feel discourage or reluctant to 'voice out' in a discussion due to the fear of mistakes or their lack of confidence in the language or lack of prior preparation on the subject area (Masitah and Clarke, 2014: p.8). As a result, students are found to produce "concise sentences [of about] one to four words in length," and if teachers do not choose a particular student to answer the question, students tend to respond in a "chorused manner" (Masitah and Clarke, 2014: p.10-11). Therefore, to reduce the short and choral answers, the teacher is encouraged to ask questions that are not of "low cognitive level" such as display questions with readily-available and clear answers (Masitah and Clarke, 2014: p.12). Although using multiple display questions allow tutors to control the time and space for students' participation, Masitah and Clarke's (2014) study reveals that by employing a higher cognitive level display questions or referential questions before using multiple display questions allow teachers to provide space for students' participation and display the correct detailed answer.

Content Feedback used in the Materials mode & Skills and Systems mode

Unlike language classroom where the focus of the subject is both on the content and the language form itself, content-based classrooms in this study adopt EMI, which implied the manifestation of language learning but conveyed more content learning pedagogical goals (see Richter, 2019). Due to the implementation of EMI, tutors from content-based subjects in higher education institutions commonly use content feedback, which aims to provide feedback on the "message rather than the words used" (Walsh, 2006: p.66). Content feedback was used to focus on content knowledge in order to understand the meaning of the answers rather than language use. In the SETT Framework, content feedback could be found in the *classroom-context mode* where teachers provide a space and "establish a context" for students to "express themselves" and develop their "oral fluency" (Walsh, 2006: p.66). However, due to the content-based subject tutors' common concern on time constraints, few tutors are found reluctant to change the *mode* to *classroom-context mode*.

Therefore, content feedback, in this study, was found in both the *materials mode* and the skills and systems mode. In the materials mode, tutors used content feedback around a material as a way to "elicit responses on the material" or "evaluate any contributions" (Walsh, 2006: p.66). Though, in content-based classrooms, the focus of the materials mode is more on the materials relating to the contents such as the PowerPoint or lab materials rather than the language. The use of content feedback on the material, in this case allows for longer students' turn as the students are not too concerned for their language use. While in the skills and systems mode the language classrooms focused on the language by empowering students to "produce correct forms," to "manipulate the target language," by using a "corrective feedback," or "display question" and providing a space for students to "practice their subskills" (Walsh, 2006: p.66). However, the thought behind the skills and systems mode works around creating a space for students to practice the language. The use of content feedback in the skills and system mode rather than form-focused feedback allows tutors to change the focus from language to content by providing feedback on the content of students' answers and test students' knowledge of the content. Due to the high content transmission in the three different courses, the use of material mode and skills and systems mode required a change in pedagogical goals and the adoption of *interactures* such as content feedback. Using content feedback is also an advantage for students whose weakness is in using the English language; thus, encouraging them to participate.

Wait-time Constraints or Extended Student Turn

The most common form of interaction found in this study was using the Initiation, Response, and Feedback (IRF) structure, whereby a speaker initiates a conversation while another responded, and the first speaker provides feedback or evaluation on the response (see Walsh, 2011). The 'composition' of the IRF structure is determined by the 'pauses' produced "between turns" (see Maroni, 2010: p.2082). The IRF structure is predominantly used in the *materials mode* of the SETT Framework, where there is also extensive use of display questions to elicit a response on the material (see Walsh, 2006; 2011). Furthermore, in a content-based classroom where there is high transmission of content, the use of display questions in the IRF structure may elicit only short responses resulting in the use of multiple display questions in the IRF structure, as mentioned above. Therefore, expanding the IRF structure to allow more space for students to speak requires the use of extended wait-time.

Wait-time was one of the features of interaction that was not included in the SETT Framework but was mentioned in its' study as a feature used to detect the "length of time that elapses between a teacher's question and student's response" (usually between 3-10 seconds depending on the type of question and the pedagogic goal) (Walsh, 2011: p.13; see also Wasik and Hindman, 2018). Allowing longer wait-time produced extended students turn especially paired with referential questions based on students' experience or personal knowledge, as seen in the Language and Linguistic course. By involving referential questions related to students' experience, students are more encouraged to participate as it involved prior knowledge. By applying an extended wait-time after the use of referential questions or open-ended question, tutors would also be able to control the extent of students' turn and thus, their participation as seen in the Language and Linguistics case whereby the tutor used an extended wait-time to allow students to complete a task on their own. Thus, wait-time could also be used to control the "amount of guidance and structure [...] during the learning process" (Westwood, 2008: 27). Furthermore, for the language classroom, the use of waittime has the benefit of providing space for interaction and language use (see Wasik and Hindman, 2018). As for content-based classrooms in this study, the use of wait-time allows the tutors to not only provide space but also allow discussions on the content of the subject area.

Although, if the wait-time is too long, it could interrupt the momentum of the discussion, especially for younger students where there is a tendency to drift off to different tasks (Wasik and Hindman, 2018: p.3). For young students, especially in pre-schools, the thinking process required may be shorter than older students; thus, the length of wait-time

should vary (see Wasik and Hindman, 2018). Duell (1994) argued that the "optimal waittime" is "three seconds" and extending it to "six seconds" could have a "negative impact on the quality of students' answers" (Wasik and Hindman, 2018: p.4). Though, the appropriate amount of time needed for older students to respond remains unclear thus, using the wait-time required a balance and sound judgment on the amount of time needed to elicit a response from the students. Wasik and Hindman (2018) introduced several strategies or methods of using wait-time such as model waiting as seen in appendices 18.

The table in appendices 18 also signifies the need for "wait time to be implemented purposefully and strategically" according to the lesson planned (Wasik and Hindman, 2018: p.5). However, it is not correctly clear the exact moment these strategies could be applied. By relating the teachers' pedagogical goal to the interactional feature, there is a possibility of finding where the wait-time could be applied as an interactional feature. Using the SETT Framework as a basis, the use of wait-time is possible within the *materials mode* to elicit a response from the students or the *skills and systems mode* to provide learners with the space to display the correct answers to the practice. An extended wait-time is more beneficial in the *classroom-context mode* where the teacher seeks to allow for more student turn as part of the pedagogic goal. Therefore, by introducing wait-time in the *materials mode* or *skills and systems mode* of the SETT Framework, teachers will be able to expand students' participation in their learning and fulfill the pedagogical goals.

Humour Break the Fast Pace

Accepting that learning also involves the social dimension brings into attention the atmosphere of the classroom and how positive emotions such as "self-esteem" and negative emotions such as "anxiety" could influence one's teaching and learning (Leslie, 2015: p.51). According to Tarone (2000), "reducing the level of anxiety associated with learning foreign language" could be achieved through humour (Jawhar, 2018: p.295). Aside from wait-time, humour is also another feature of interaction that was not mentioned in the SETT Framework. In broad terms humour may apply as being 'amused' or 'comical' and the ability to create laughter in others, however, the subjective aspect of humour concerning how it was perceived academically and people's reluctance to discuss the use of humour exchanges creates a paradox which challenges the definition humour (Lovorn and Holaway, 2015: p. 25).

Humour is related to the use of 'language play' while also involving the "cognitive, emotional, behavioural, physiological, and social aspects" of "human behaviour" (Foot and McCreaddie, 2006 cited in Jawhar, 2018: p. 295-296). According to Jawhar (2018), humour is "an action that is interactionally achieved and socially situated in an orderly way," which explains the how humour could be used to "facilitate interaction," build positive social relationships, and "increase students' interactional competence" (Jawhar, 2018: p.295). However, Lovorn and Holaway (2015) showed that humour might not necessarily be a "structured classroom management strategy" and the "conscious" use of humour could potentially become a "dangerous tool," thus they encourage teachers to undergo formal training to utilise humour effectively (2015: p.32). Without proper knowledge of the students' background, understanding of the students' culture, and respect for students' feelings, humour could be seen as unfavorable.

Schmitz (2002) discerns the types of humour with the students' language "proficiency level" whereby the use of "exaggeration, hyperbole, and irony" were more appropriate for "lower level students" while "cultural jokes" should be limited to students with "higher-level language proficiency" (Jawhar, 2018: p. 296). Bell (2005) also reasons that students' second language proficiency is also determined by the use of language play (Jawhar, 2018: p.296). However, there is a difference in creating humour using L1 and L2 as students would relate more with humour used in L1 rather than L2 unless it involves a shared knowledge between students and teachers. Due to their low proficiency in L2, students resort to imagining the translation of the humour using L1 or what Garland (2010) termed as "humourous mock translation" (Jawhar, 2018: p.296). Breakdown in the interaction as a result of lack of knowledge or understanding of the use of humour may lead to an extended silence ensuing, as seen in the study when students do not respond to the humour used by the tutors. Therefore, there is an advantage to teachers who are proficient in L1 and L2 in using humour to reduce the social distance, boost students' affective filter," encourage participation, and improve language proficiency and academic achievements (Leslie, 2015: p. 53; Jawhar, 2018).

One way humour was used in this study was by relating to the content of the subject and the collective knowledge shared by teachers and students to break down the fast-paced extended teacher-turn. In a lesson where there is a higher content transmission, using humour allowed the tutors to break down the pace of the lesson, keep track of students' attention on the content, and encourage participation by reducing the social distance. In the SETT Framework, the use of humour could be used within the *classroom-context mode* or *materials* *mode* where the pedagogical goal aims to elicit a response and enable students' to express themselves (see Walsh, 2006; 2011). However, it could also be assimilated in the *managerial mode* to breakdown fast-paced, high content transmission controlled by the teachers. Although humour is not always planned, it could be achieved according to the pedagogical goal set by the teachers at the moment in time. Even though teachers have an advantage of using L1 or code-switching in humour, this study also shows that by relating the humour to the content of the subject area or a shared knowledge between the students and teachers, effective humour could be achieved.

Code-switching encourage participation

Through the adaptation of EMI in the education system, most Brunei students have achieved bilingualism, which leads to the use of code-switching (see Fenton-smith et al., 2017; Ożóg, 1996). Cook (2008) described code-switching as a manner of changing from one language to another "mid-speech," especially when both speakers are proficient with both languages (cited in Bhatti et al., 2018: p.94). The occurrence of using "alternating languages" within an utterance or a text is also known as code-switching was commonly found primarily in informal situations among local students and local teachers in Brunei (Bhatti et al., 2018; p.93; see also Ishamina and Deterding, 2017; Noor Azam et al., 2014). Code-switching acts as a way to negotiate meaning intended where more than one language is used. Some of the possible reasons for the use of code-switching involve the "inability to come up with a word in one language", the absence of "straight-forward equivalent" words in English for some of the "religious terms" or "food items", "explanations that are more easier using another language", providing "direct quotations", and for "stylistic reasons" (Deterding and Salbrina, 2013: p. 111-115). Using code-switching helped raised the students' confidence to participate in their learning and improve their proficiency in L2 through mean making. Although using code-switching in the classroom is advantageous and unavoidable with the presence of local bilingual teachers, but it is not always recommended, especially in the language classroom, where one of the aims is to achieve language proficiency.

In the presence of foreign students or tutors, Ishamina and Deterding (2017) noted that there were Malay terms used by Bruneian students when interacting in an "informal context", which could cause "misunderstandings" but "breakdown rarely occur" as local students are usually careful to avoid using code-switching (2017: pp.294). This study took place in the L2 classrooms where foreign tutors and local students use their second language, i.e., the English language as the medium of instruction to teach contentbased subject areas. This study revealed that due to the presence of foreign teachers, longer students turn with the use of code-switching with their peers are generally found during the practical or tutorial sessions where students have more space to participate in discussions with their local peers. Although tutors and students may not have the same mother tongue, allowing time for students to use code-switching was beneficial in improving their academic achievement. A study made in China has shown results of improvement in academic performance by switching to their mother tongue (see Tsui, 2004). Therefore, incorporating space to allow for code-switching to occur in the content-based classroom is necessary to encourage participation among local students and to improve their academic performance.

Incorporating code-switching in the SETT Framework as an interactional feature is valuable in the *classroom-context mode*, where the pedagogical goal seeks to enable students to express themselves and thus expands and encourages the students' participation. In a study by Nur Hafeezah and Masitah (2014), it was found that code-switching could both be an advantage or a disadvantage to achieve authentic participation. Using code-switching was found to be challenging for tutors who were not fluent in both languages but beneficial for students who are not confident with using the English language. On the other hand, allowing students to use code-switching to explain a point or used as part of a task or group work among their peers, such as in the *classroom-context mode* of the SETT Framework, will help boost students' confidence to interact and improve on their learning. Therefore, the strategic use of code-switching is required.

6.4 LIMITATION OF PRIMARY STUDY

One of the limitations of this study was the use of low-tech microphones. Due to the limited budget set for the research, it was not possible to buy a professional microphone, and this leads to the videos having low-quality sound with many background noises. This was especially the case in the practical lessons when the students were all talking with one another at the same time, thus, reducing the sound of the students discussing specific questions with the tutor. One of the efforts made to procure a slightly clear sounded video was with the use of a voice editing software. By doing this, the voices could be amplified, and background noise could be removed. Although this does not guarantee a hundred percent clean video, the quiet voice was slightly clear.

Another limitation is in the schedule set for the same students with the same tutors to be observed limited to a time, which does not allow for long periods of observation. Before the observation started, the schedule for the classes was provided, and this revealed that one tutor at most would take one class a few times a month before another tutor took up the same class. Therefore, the number of times observation could be made on the same participants are limited, resulting in less time allowed for improvements to be observed after the interview. Furthermore, due to the limited time allotted for the observations, stimulated-recall interviews could only be done once with the participants. Although this is enough to provide a space for tutors to reflect on their lessons, more interview sessions over some time after each observation are also valuable to reflect on their interactional competence and any improvement made.

6.5 RESEARCH IMPLICATIONS

One of the implications made by the study was the difference in *interactures* found in the content-based classrooms as compared to the language classrooms using the SETT Framework introduced by Walsh (2006; 2011). The differences were shown in the form of themes, which arise from the findings of the observations and stimulated-recall interviews. The themes consist of the use of questions in the *managerial mode* to recall and clarify the content, the use of multiple display questions to expand students' answers, the use of content feedback in the materials and *skills and systems mode* to refer to the contents on the material and to test the students' knowledge, the use of an extended wait-time to provide space for an extended student turn, the tutors using humour to break the pace, keep track of students' attention, and create a comfortable atmosphere, and the use of code-switching to build students' confidence and expand their answers. These themes signify the differences between the features of interaction in the language classroom and the content-based classroom.

The findings of this study also implied the tutors' ability to encourage students' to participate through their use of selected *interactures*. The concept of participation in this study was brought about by the sociocultural theory and social-constructivist perspective that a collaborative environment was one of the requirements for the teaching and learning development. Creating a collaborative environment was also a vision shared by the Universiti Brunei Darussalam. Participation was managed by understanding the different types of *interactures* and adapting it to the tutors' and students' everyday interactions. By changing the way we interact with the students by adopting the different types of *interactures*, we may

be able to change or improve not only the student's participation but also in regards to classroom management.

This research's introduction to *interactures* came from the study on classroom discourse by Walsh (2006), whereby the concept of classroom interactional competence was introduced to assess teachers' and students' ability to use language as "a tool for mediating and assisting learning" (Walsh, 2006; 2011). By adopting the different themes mentioned above to the SETT Framework, tutors were able to expand students' answers and create an atmosphere where students were encouraged to participate. Using the SETT Framework, this study had sought to expand the SETT Framework to fit content-based classrooms by showing the differences found in content-based classrooms such as the use of questions in *managerial mode*, the use of multiple display questions, and the use of content feedback in materials mode and *skills and systems mode*. The study also recommended the adaptation of features such as wait-time, humour, and code-switching into the SETT Framework.

The study also implied that by using video observation and stimulated recall interviews, tutors and students' were able to develop their CIC and adopt a data-led reflective practice. The methods of data collection for this study also revealed a data-led reflective practice for tutors and students to develop their CIC and improve on their teaching and learning by focusing on the *interactures* used with their pedagogical goals. The themes raised showed that by providing a platform for the data to be used as a stimulus, this study provides a picture of how tutors use the *interactures* found in the SETT Framework differently in regards to the needs of content-based classrooms and how challenges and progression on the participants' teaching and learning could be improved.

6.6 **RESEARCH CONTRIBUTION**

This study provided an understanding of the workings of classroom interaction in the different content-based classrooms as compared to the language classroom by using the SETT Framework. Through video observation and stimulated-recall interviews, the data of the study raised themes, which provides a picture of how tutors used *interactures* differently in content-based classrooms. The themes from the findings also pointed towards the tutors' use of *interactures* aimed to encourage participation, which in turn helped realise the University's initiatives in creating a community that encouraged students by "facilitating collaborative participation" (About UBD, 2011). By adopting new *interactures* to the SETT Framework,

this study raised tutors' awareness of classroom interactional competence (CIC) and helped the students to realise their potential by becoming more involved in their learning. This study could be seen as a stepping stone in realising the vision of Brunei's Ministry of Education in developing skills needed to cope with the social and economic challenges in the 21st century. The methodology used in this study could also be used for tutors, and students in Brunei Darussalam higher education as a method of reflective practice to reflect on their teaching and learning critically. Although this study was conducted in the context of Bruneian tertiary education, this could also be applied to other content-based subject areas in different contexts.
Chapter VII: Conclusion

Reflective Practice involves paying critical attention to the practical values and theories that inform everyday actions, by examining practice reflectively and reflexively which can lead to developmental insight (Bolton, 2010)

CHAPTER SEVEN: CONCLUSION

7.1 CONCLUSION

In conclusion, the growing role of the English language as the medium of instruction (EMI) in Brunei, especially with the introduction of the SPN21 education system, which has brought with it a linguistic division (see Noor Azam et al., 2016). The existence of a linguistic division clarifies the need to look into how "communication (the use of language to encourage interaction) plays a big part in the classroom" for the development teaching and learning (see Walsh, 2011: p.3). Nevertheless, interaction within communication comprises two-way, fast-paced interaction, which includes several speakers focusing on different things and performs several functions (see Firth and Wagner, 2007; Walsh, 2011). The intricate nature of interaction requires and in-depth view of language use in relation to learning, which coincides with the sociocultural and social-constructivist perspectives. Both perspectives agree on the importance of teaching and learning as a social and cultural collaborative process, which transfers knowledge from the internal (interpsychological) to the external (intrapsychological) mediated through symbolic tools (see Louvigne', 2018; Palincsar, 1998; Mann and Walsh, 2017). Thus, teaching and learning should move towards the distance between a students' independent learning is comparable to learning with capable peers (ZPD) (see Vygotsky, 1978; Louvigne['], 2018).

In line with ZPD is a successful collaborative interaction in the co-construction of knowledge, and to achieve this, requires teachers and students to develop their CIC (see Walsh, 2011). In the language classroom where the language was taught through discourse, the use of the SETT Framework allows for an in-depth understanding of the interactional features (*interactures*) used by teachers in relation to their pedagogical goal at a particular *mode* in time (see Walsh, 2006; 2011). Using the SETT Framework in addition to multiple methodologies such as stimulated recall interview provides an *ad hoc* tool to obtain a data-led 'reflection-in-action' and 'reflection-on-action' (see Mann and Walsh, 2017: p.8). Though the SETT Framework was introduced according to the language classroom, it has the potential to be used in the content-based classroom.

Therefore, this study sought to use the SETT Framework to compare the use of *interactures* by tutors, but instead of the language classroom, the focus is on content-based

subject areas at the *Universiti of Brunei Darussalam*. Through reoccurring video observations and stimulated recall interviews, this study seeks to provide a platform for a reflective practice on the participants' use of *interactures*. In ensuring a collaborative co-construction of knowledge, this study seeks to understand how students' are encouraged to participate through the use of *interactures*. By comparing the SETT Framework with the findings, this study strives to find ways of accommodating the different use of *interactures* found in content-based subjects to the SETT Framework. This study was made in the hope that the findings were able to raise the awareness of tutors' and students' CIC.

The findings revealed that unlike the SETT Framework, *interactures* in the contentbased classroom require the consideration of the high-content transmission. The most reoccurring differences were in the use of questions in the *managerial mode*, the use of multiple display questions to expand students' contributions, and the use of content feedback in the *materials mode* and *skills and systems mode*. Although the *managerial mode* does not involve students' turn, due to the use of questions as confirmation checks, students' turn was observed in content-based classrooms. The use of questions in content-based classrooms often concerns the content of the subject itself be its prior knowledge or common knowledge related to it. Unlike in the SETT Framework, using display questions as confirmation checks in *managerial mode* would ensure that tutors were able to recall prior knowledge in relation to a new topic, clarify students' knowledge of the content, recall newly gained information, and limit the students' turn by focusing on displaying correct answers. Referential questions were also used in *managerial mode* to encourage participation, relate students' everyday knowledge and experience to the topic of discussion, and as a collaborative effort to negotiate and interpret intended meanings.

Content-based classrooms tend to be viewed as 'rushed' and include 'fast-paced exchanges' due to the teachers' concern for the time taken to transmit the high amount of content (see Masitah and Clarke, 2014: p.1). Tutors' concern for time constraints pushed them to choose display questions as the main type of question asked as it limits the students' answers and concentrates on the subject at hand. However, to expand the students' contribution, tutors were found to adopt multiple display questions in the form of scaffolding especially instead of using referential questions. The use of multiple display questions in either the *materials mode* and *skills and systems mode* allows the tutor to control the students' contribution by allowing students' to display the correct answers guided by hints in each

display question within a time limit. However, the fast-paced exchanges resulted in display questions appearing more rhetorical or produce a chorus style of response (see Masitah and Clarke, 2014). Although, using a higher cognitive level display question or referential question would provide more space for students' to participate.

Due to the nature of content-based classrooms, which focuses on the subject matter, there was no clear evidence of form-focused feedback. Instead, content-feedback was found in the *materials mode* and *skills and systems mode*. Due to the nature of EMI, tutors focused more on the 'message' of students' response "rather than the words used" (Walsh, 2006: p.66). The use of content feedback allows tutors to ensure students are able to provide the correct answer without worrying about the language used, thus encouraging students to participate in their learning.

Furthermore, other features of interaction which was not included in the SETT Framework, such as wait-time, humour, and code-switching, played an essential role in the content-based classrooms. The use of wait-time (around 3 seconds) in *materials mode* and *skills and systems mode* provides tutors with the ability to control the amount of guidance required. While using extended wait-time (up to 10 seconds) in the *classroom-context mode* allows tutors to provide space for an extended student turn. However, using wait-time requires sound judgement and needs to be applied purposefully and strategically (see Wasik and Hindman, 2018).

Humour is an interactional feature, which was rarely recognised by academics. However, the importance rising of positive emotions such as self-esteem among students to encourage participation showed how essential it is to use humour. Humour has the ability to "facilitate interaction" by "building a positive social," and "increase students' CIC" (Jawhar, 2018: p. 295; Leslie). Although humour could potentially improve language proficiency and raise the academic level by boosting students' "affective filter," tutors need to be aware of the cultural and social aspects of the students as humour could become a dangerous tool (Leslie, 2015: p.83). There is an advantage to using humour in L1 and L2. Nevertheless, if applied strategically, such as through the *materials mode* and *skills and systems mode* to break down the fast-paced transmission of content, there is a possibility for students to be encouraged to participate.

Code-switching was noticeably prominent when students interact with the local tutors or peers. Code-switching was an unavoidable phenomenon within the practical and tutorial session in the study, and although L1 terms were to be used, according to Ishamina and Deterding (2017), "breakdown rarely occurs" (2017: p.294). Using code-switching encourages participation, which then improves their academic level, but it has both an advantage and disadvantage in achieving authentic participation (see Nur Hafeezah and Masitah, 2014). Using code-switching is also a challenge for tutors who were not fluent in L1. However, strategic application of space for code-switching would boost students' confidence in participating.

7.2 **RECOMMENDATIONS**

In the search for differences in interaction between language classroom and contentbased classroom using the SETT Framework, this study managed to uncover themes, which also highlighted the recommended modifications applied on the SETT Framework to become more applicable to the content-based classroom. Some of the consideration that needs to be taken into account was on the function of questions in the *managerial mode*, the use of multiple display questions, and the use of content feedback in the *materials* and *skills and systems modes* of the SETT Framework. This study also highlights the *interactures*, which were not included in the SETT Framework namely the use of wait-time, humour, and codeswitching, which seeks to encourage students' participation. However, tutors in content-based classrooms need to understand how to balance between exerting necessary control and facilitating a space for participation (see Walsh, 2011; Mann and Walsh, 2017; Sert, 2019). Thus, this study recommended the inclusion of these *interactures* into the SETT Framework to accommodate the second language content-based classrooms.

Using the SETT Framework as an *ad hoc* tool to analyse the data from reoccurring video observation and stimulated recall interviews provides an 'empirical,' 'data-led,' and 'dialogic' multiple methodologies of studying the development of teaching and learning. The methodology of this study could be applied as a recommended method of reflective practice (RP) (see Mann and Walsh, 2017). Using data as evidence helped push RP to become more concrete and reliable (Mann and Walsh, 2015: p.352). A data-led RP reduces the use of written forms of reflection and allows for a more collaborative and authentic form of reflection (see Mann and Walsh, 2017). An *ad hoc* tool such as the SETT Framework also

provides a way to conduct reflection-in-action and reflection-on-action while also providing a way for progression to be made (Mann and Walsh, 2017: p.8). The use of stimulated recall conducted between peers provides a 'springboard' to jump-start a critical and objective discussion on teaching and learning (Mann and Walsh, 2017: p.116). Considering the social and cultural aspect of Brunei's education where the values of the local context should concern the process of RP (see Minnis, 1999), a balanced, data-led, and multiple methodology RP is recommended. Furthermore, the consideration of the value of code-switching in encouraging participation is a learning point for teacher training.

APPENDICES

Appendices 1:

Pilot Study – Observation 1:

Extract 0.1:

6. T:	All right (.) so good morning, everyone so today
7.	we are going through (2)(um) database design
8.	two (.) normalisations (2) so (1) last week
9.	(.) we have cover database design one (2)
10.	actually (.) ER diagram (2) right? (.) so this
11.	is the (.) second part (.) there are many (.)
12.	ways to design your database (2) the first one
13.	is going through (.) your diagram (.) the
14.	second, going through (2) normalisation (3)
15.	okay? (.) So the content (.) NDT relationship
16.	(.) we'll start off (.)with what (.)
17.	we have left (.) off last lecture (.) there
18.	are a few more things (.) we already learn how
19.	to draw (.) your ER diagram (.) but there a
20.	few more (.) additional stuff that you need to
21.	know. So:: (2) (um)revise again (2) what is
22.	(.) which position (.) which location (.) are
23.	we in (2) based on (.) the degree of data
24.	extractions (.) and then (.) we'll start with
25.	(2) normalisations after (3) (a)we finish off
26.	(2) [T gestures to the white board] the review (.)
27.	basically second slot (.) after break (2) so
28.	(.) we do have (.) data redundancy (.) what is

29. redundant? (2) data redundancy. (3)
30. S1: (ah::) same thing (uh)=
31. T: same thing (.) correct (.) repeated (.) data
32. (2) then (.) data dependency (2) level of (.)
33. normalisations (.) there are few level (.)
34. which you have to go through (.) one by one
35. (.)okay?

Extract 0.2

1.	Т:	okay (.) we'll start with (.) recap what we
2.		have studied(2) [T addressed one student]
3.		you've seen it? (.) Right? (.) accidentally
4.		seen what is it (2) okay so (2) before
5.		(.)creating and using a database (.) what
6.		should we do? (2)
7.	S1:	plan the [database =
8.	S2:	plan the question]=
9.	т:	plan? (2)
10.	SS:	plan the ((4))
11.	S2:	initialise the ((2))=
12.	т:	initialise? How do we initialise? =
13.	SS:	plan the, (3) ((2)) [SS talk among themselves]
14.	Т:	Sorry? =
15.	SS:	[SS talking among themselves]((2)) =
16.	т:	before you actually start (.) creating(2)of
17.		course before you:: start using (2) you have

18.		To create first, right? (.) So (.) before you
19.		create what (.) do you do?
20.	S3:	<pre>analysing((2)) =</pre>
21.	т:	analyse? So:: (2) analyse and then? (2) you
22.		analyse the business rule (.) right? So you go
23.		to the organisations (.) and the organisations
24.		will say (.) please do database for us (.)
25.		then you see what they actually (.) do (.) how
26.		they (.) how the (.)the procedure okay? (.)
27.		from there (.) what do you do (.) after you
28.		analyse? (2)
29.	SS:	<pre>plan/planning/((2))</pre>
30.	Τ:	(hm?) (2)
31.	S1:	plan (2)
32.	Т:	you plan(.) you? (2) design okay? So (.) you
33.		design (.) so:: from there (.) the business
34.		plan itself (.) business rules (.) we learn
35.		about(2) entity (.) attribute your
36.		relationship(.)cardinality ratios (.) so such
37.		as (.) what are they? (2) What is entity? (.)
38.		can you give me (.)(um) one example of entity=
39.	SS:	students/students/ [SS points to the
40.		Whiteboard]=
41.	Т:	students (2) another example?
42.	SS:	<pre>teachers/teachers/lecturers/=</pre>
43.	т:	teachers (.) lecturers (.) okay? So that is
44.		the entity (.)

Extract 0.3

1.	Τ:	can you see (.) that admission (.) doesn't
2.		have (.) any attribute (.)
3.	S:	[((3))[SS talk among themselves]=
4.	Τ:	so how we link?]=
5.	SS:	ada jua tu (.) di sana = [SS pointing at TV
6.		monitor]
7.	Τ:	where?
8.	SS:	tu:: sana
9.	S1:	tu:: diatas
10.	S2:	top (.) top right [laughter]
11.	Т:	yeah (.) yeah (.) (ah::) (.) [SS laugh] okay
12.		(.) admission I D (.) patient I D (.) (ah)
13.		yeah that's fine, (2) don't you think it's
14.		(.) patient and what? (3) okay here (.) look
15.		here (.) [T point at TV monitor] you see (.)
16.		patient is admitted to (2) ward, right? (.)if
17.		I'm a patient (.) I come in I tell you my name
18.		(2) I tell you my name (2) how do I know (.)
19.		which ward am I go to? (2) because there's a
20.		link here (.) how do I know?
21.	SS:	((2)) [SS talk among themselves]
22.	Τ:	from the patient table you have patient I D
23.		(.) patient number (.) address (.) and you
24.		have the name, right? (.) which is linked (.)to
25.		a ward which you have (.) a name (.) a
26.		location (.) an I D (.) okay? (.) I believe

27.	this	refers	to	the	ward	d I	D (.) ri	ght?	(.)	the
28.	ward	name(.)	eme	erger	псу а	and	all	thes	e th	ings	(3)

Appendices 2:

Pilot Study – Observation 2:

Extract 1.1

12.	Т:	so what normalisation is? (4) Normalisation is
13.		a process (.) to convert (.) a data structures
14.		into se, (.) (um::) (.) several (.) simple (.)
15.		stable data structure (.) so basically you have
16.		a big structures (.) you want to convert them
17.		into smaller (.) smaller (.) smaller one (.)
18.		which you can (.) (um) (.) manage them
19.		individually (.) without affecting the others
20.		okay? (.) So, we will see more examples later
21.		(.) so (.)it is a process (.) of (.) assigning
22.		attribute (.) to (.) entity (.)

Extract 1.2

1.	Τ:	do you get this? [SS shook their heads] (.)
2.		no? (2) I hope this do (.) you have module code
3.		and module name (.) what is I (.)C (.)E (.)two
4.		three (.)zero (.)six (.)refer to?=
5.	SS:	Code =
6.	Т:	Yeah (.) what is the title?=
7.	SS:	Module? Module =
8.	Т:	What is the name of that? (.) I (.) C (.) E (.)
9. 10.		two (.) three (.) zero (.) six (2) I (.) C (.) E two (.)three (.) zero (.) six =

11. S1: <Okay (.) wait> (2)

- 12. SS: Programming =
- 13. T: (Huh)?
- 14. SS: Programming=
- 15. T: Programming? =
- 16. S1: <Two three zero six?>
- 17. T: What do we have now? =
- 18. S: [EDMS =
- 19. T: EDMS] (.) okay? (2) so you're saying module20. code (.) tells you what the name is right?
- 21. SS: Yes

22. by default (.) okay? if I say what is I (.) c т: 23. (.) e (.) two (.) three (.) zero (.) nine (.) 24. they will be object under programming (.) by 25. looking at one (.) attribute will tell you (.) 26. another attribute (.) this is what (.) it means 27. (.) when the information stored (.) in the same 28. table (.) you see you have module (.) (uh) (.) 29. table right? (.) when the information stored in (.) the same table (.) module code (.) uniquely 30. determines other information that is stored in 31. 32. the same table (.) okay? (.) so by looking at the module code (.) I know what ((2)) it is (.) 33. all right? 34.

Extract 1.3

19. So (.) what is the goal of normalisations? (.)

20.		what is the point of this? (3)
21.	SS:	To (.) reduce data redundancy=
22.	Т:	Yup (.) to reduce (.) data redundancy (.)
23.		okay? yeah (.) ten points to Gryffindor \uparrow [SS
24.		laugh] ((2)) okay (.) so normalisation aim
25.		to reduce data redundancy and? =
26.	SS:	[Store =
27.	Τ:	Storage] (.) redundancy means (.) duplicated
28.		data right? (.) if you have (.) a lot of
29.		duplicated data (.) every line (.) every data
30.		(.) is (.) using spaces, isn't it? (.) memory
31.		space (.) so if you have a lot of data (.)
32.		imagine (.) everything is in one row (.) every
33.		time patient come (.)
34.		and admission (.) you have a lot of row (.)
35.		repeated data (.) you're using a lot of space
36.		there (.) okay? (.)

Appendices 3:

Pilot Study Interview:

Participant no. 1:

10.	I:	What is the response you get from students when you
11.		use questions you know the answer to?
12.	Т:	like I said I target on general questions something
13.		that you know it by yourself so normally they would
14.		answer it more often (.) Compared to something I

15. teach (.) a fact already (.)

16. they'll need to process the fact (.) so if they

- 17. are not confident (.) they'll just keep quiet (.)
- 18. If they're confident (.) they'll try,

Interview Extract 1.02

11.	I.	Do you think (.) their lack of preparation (.) is
12.		one of the reasons for them (.) to not be able to
13.		answer questions in class?
14.	т.	Well (.) if you ask the students (.) to actually do
15.		some research (.) it's a pretty hard thing, right?
16.		(.) So you give lots of reason for that (.) Normally
17.		those question (.) I have to make sure they at least
18.		(.) try to answer not very hard questions (.) its
19.		usually something that I just share a few minutes
20.		ago (.) and ask again or (.) its something general.

12.	I:	I don't know (.) if you realise this (.) but the
13.		lectures (.) in the video were (.) quite fast paced
14.		and the wait time (.) after some questions are very
15.		short (.) Why is that?
16.	т.	I think I have a reason for that (.) The one
17.		without stopping is like (.) I assume (.) is
18.		general knowledge they should know already (.) If
19.		that is something that requires them to take
20.		something different (.) I'll wait for their answer
21.		(.) I will ask la (.) for their opinion (.) if it

22. is something (.) that they sort of know already

Interview Extract 1.04

9.	I:	Do you think it will take time for the students to
10.		answer questions if given enough time?
11.	T1:	It will take more time (.) and certain things that
12.		the students (.) might not be able to answer (.)
13.		cause they just say (.) or give indication. From my
14.		experience (.) when they are quiet (.) they are not
15.		even discussing with their friends (.) they don't
16.		really understand.

Appendices 3:

Participant no. 2:

Interview Extract 1.11

11. I:	How did you find (.) your class just now?
12. S2:	The way he teach is fine (.) it's just that
13.	sometimes (.)he teaches a lot in one go (.) for
14.	example up to 80 slides so (.)we have to request a
15.	break (.) So actually the reason why (.) is as a
16.	student we can't really cope up, yes the time is 2
17.	hours the given time for one lecture to have that
18.	just to listen that's just too much. So students
19.	tend to go to sleep (.) then they just daydream
20.	sometime dreaming already [S laughs]

14.	I:	Didn't (.) your teacher (.) teach you in practical
15.		class too?
16.	S2:	He does (.) but it's still more to theory. I want
17.		a subject (.) that has all I (.) E:: <u>mostly</u>
18.		practical because (.) usually to be honest (.)
19.		even if you study I T (.) we graduate (.) we are
20.		not actually (.) it does not make us a quality
21.		student (.) because sometimes even a friend of
22.		mine (.) he finishes his degree when he goes to
23.		work he doesn't know what to do actually (.) so
24.		they have to point something (.) So basically (.)
25.		its best that we study I mean we should have more
26.		practical than theory

Interview Extract 1.13

9.	Ι:	Would you say (.) you were given enough (.) time to
10.		answer the question?
11.	S2:	yea (.) Because like I told you before (.) there's
12.		quite a lot of slides (.) He give a lot of question
13.		(.) but he doesn't really give us time (.) because
14.		if he give us time (.) then the duration of the
15.		class would be extended (.) I mean he needs to
16.		finish the slides as quick as possible.

Appendices 3:

Participant no. 3:

15. I: Do you (.) find it difficult (.) to answer

16. questions posed by your tutor?

I think so (.) I realise (.) I observed lately it's 17. S4: 18. the pupils (.) they need to respond (.) The problem is that we don't have that rapid response (.) 19. 20. Sometimes when the lecturer asks us questions (.) 21. we tend to pause for a while (.) I think the 22. problem is that we're not really exposed to that 23. environment (.) where people talk spontaneously 24. when people ask question, especially this (.) Maybe 25. in Malay, we would throwback very fast, but I think 26. it really depends on the person (.) If he ask me a 27. question (.) I will answer but regarding of what he 28. is teaching (.) I might not be able to answer (.)

Appendices 3:

Participant no. 4:

Interview Extract 1.31

8.	I:	When your lecturer asks questions (.) do you think
9.		you have enough time (.) or do you think it's too
10.		fast?
11.	S5:	I think it's very too fast (.) for me (.) because I
12.		need time to think (.) and then (.) I want about
13.		one to two minutes for me it's ok (.) and discuss
14.		with my friends.

Appendices 4:

Primary Data – Geology Lecture 1:

1.	Τ:	So far (.) you know (.) all the optical
2.		properties (.) to recognise (.) enhance
3.		specimen (.) in microscope (.) under the
4.		microscope (.) so let's see what are these
5.		minerals (.) and (.) let's start with a $((2))$
6.		classification 2) apparently you know (.) that
7.		(.) in every science (.) in every discipline
8.		(.) of the science (.) we have classification
9.		(.) can you tell me why? (.) why do we need
10.		classification? (.) classification of minerals
11.		(.) classification of animals (.)
12.		classification of plants (.) classification of
13.		rocks (.) next year (.) why? (.) What's the
14.		<pre>reason? ((2)) They're are very important (.)</pre>
15.		part of the science (.)you have any idea? (5)
16.	S1:	((5)) <in (.)="" a="" identification=""> (.)</in>
17.		[segregation =
18.	Т:	Identification?] it's something like that (3)
19.		let's say that (2) or (have you got the names
20.		of) how many minerals (.) do we have (.) do
21.		we know (2) a lot of them (.) more than three
22.		thousand (.) minerals (.) so can we imagine
23.		(.)to give you now (.) three thousand minerals
24.		(.)to study
25.	SS:	no/no=
26.	т:	It will be crazy (.) or (.) some thousands of
27.		animals (.) some thousands of plants etcetera
28.		(.) etcetera (.) so it's easy (.) to know (.)

29.	ten (.) fifteen (.) families (.) of minerals
30.	(nowadays) (.) in order to understand (.) all
31.	the members of this (.) family (.) so (.)
32.	there are many attempts of mineral
33.	classification (.)

1. T:	Do you know this professor? (2) Linneaus (.)
2.	yeah (.) he's one of the most (.) famous
3.	professors (.) to him (.) we owe him the
4.	classification of animals, he also try:: to
5.	classify minerals but it was not successful (.)
6.	because (.) he try to apply the biological $(.)$
7.	(um) type of classification but it was (.) not
8.	very good formula (.) later on (.) we had some
9.	(.) petrological (.) type (.) people try to
10.	classify (um::) (.) minerals (.) according to
11.	the environment of ((2))(formation) (.) so they
12.	classified igneous (.) metamorphic (.)
13.	sedimentary (.)but again (.) there are some
14.	problems (.) for some minerals appear (.) in
15.	all the three environment (.) or some other
16.	appear (.) in two environments (.) so for
17.	example ((2)) (.) let's say (.) or quartz (.)
18.	even (worse) (.) quartz can appear (.) in
19.	every (.) environment (.) so what is it?

4.	Т:	Can somebody remind me tetrahedral (.) what is
5.		tetrahedral side? (3) tetrahedral side? [A]?
6.	S1:	((3))=
7.	Т:	tetrahedral side (3) is a side (.)
8.		that is (.) surrounded (.) by (.) four (.)
9.		anions (.) exactly (.) and (.) four anions
10.		(.) and the ((2)) is (.) a tetrahedral (.) and
11.		the octahedral side (.) is a side for (.) when
12.		I have kataion (.) surrounded by? (.)=
13.	SS:	[six
14.	Τ:	by six] exactly (.) anion (.) so I have a (.)
15.		nearly (.) pyramid (.) which is (.)
16.		octahedral (.) four faces above (.) four faces
17.		below (.) so we will (.) discuss here (.)
18.		always (.) for tetrahedral (.) and octahedral
19.		(.) sides (3) I believe that the tetrahedral
20.		sides (.) are easy (.)to understand (.) which
21.		of the tetrahedral sides (.) in the silicate
22.		Minerals? (5)
23.	S2:	S I 0 4
24.	Τ:	S I 0 4 (.) exactly (.) so (.) silicone (.)
25.		is certainly in a tetrahedral side and (.) in
26.		general (.) not for miso silicate (.) in
27.		general (.) silicone can be replaced
28.		aluminium (.) so aluminium can also be in a
29.		Tetrahedral side (.)

9.	Т:	Do you know (.) Beryl? (.) Is it any (.)
10.		important mineral? (.) if I give you (.) a big
11.		Beryl (.) you will be happy or not? =
12.	SS:	Yes =
13.	Τ:	Why? (.) Is it expensive?
14.	SS:	Yes
15.	Т:	Very expensive (.) it is (.) aquamarine (.) in
16.		other words (.) okay,

Extract 2.4

1. T:	You have a (.) large (.) Orthopyroxenes crystal
2.	(.) in the microscope (.) and some (.) parallel
3.	(.) lines (.) along cleavage (.) so this kind
4.	of Pyroxenes (.) (Exolution) (.) (along the)
5.	zero zero one (.) today (.) then this is the
6.	perpendicular (.) one zero zero (.) okay (.)
7.	then (.) this (.) is what we expect to see
8.	tomorrow in the microscope (.) This is what we
9.	will expect to (.) thank you very much (.) for
10.	coming today (.) I will see you (.) tomorrow in
11.	the practical,

Appendices 5:

Primary Data – Geology Lecture 2:

Extract 3.0

1. T: So this (.) what's next is the:: (.) the

2. another part of the systematic (.) mineralogy (.) if you remember we've finish 3. 4. our previous lecture with a:: (.) the beginning of inosilicate minerals (.) we talk 5. 6. about the single chain (.) now I will discuss about their (.) cousins which are (.) the 7. 8. double chain inosilicates (.) apparently you 9. understand (.) if these two families of 10. minerals (.) are the same name (.) or (same name) (.)if you want (.)Inosilicates (.)you 11. 12. have to make similarities (.) so please today 13. (.) (um) (2) follow the lecture (.) and try 14. (.) to find the similarities and the differences (.) of course (.) there must be 15. 16. some difference (3) general idea for (.) all inosilicate minerals (.) is (that) (.) they 17. have long (.) chains of tetrahedral (.) 18. infinite number tetrahedral (.) the single 19. 20. chain was(.) (how the saying) (.) only one (.) 21. the double chain (.) is (.) something like 22. that [T indicate picture in slide] (.) two (.) chains (.) connected (.) interconnected (.) to 23. my imagination (.) it looks (.) looks a ladder 24. (.) if you want \downarrow (3) 25.

Extract 3.1

11.	Τ:	I need	SOM	ething	g (.	.)	to ma	ake '	the s	stru	cture
12.		robust	(.)	what	do	Ι	need	for	thes	se (.)

- 13. Anions? How can they stay there? (4)
- 14. S1: we need ((2)) =
- 15. S2: Cataions =
- 16. T: we need? =
- 17. SS: Cataions/Cataions? (2)
- 18. T: Cataions (.) okay (.) well, we need <u>bonding</u>
 19. (.)we need some bonds (.)to give them (there)
- 20. (.)not James Bond (.) okay (.)so

Extract 3.2

11.	S1:	Sir, where is the base? =
12.	Т:	If you consider this (.) corner towards you $[{\tt T}$
13.		<pre>indicating picture in slide] (.) the base</pre>
14.		(.) is this level (.) okay? Consider that the
15.		pyramid comes towards you (.) so this is the
16.		base (.) one (.) two (.) three (.) are the
17.		Basal (.) [oxygens =
18.	S1:	not] it's not the point here? [S indicate a
19.		place] (2)
20.	т:	the point here? = [T points at the picture]
21.	S1:	yeah (.) that's not the base? =
22.	т:	no (.) no (.) this is the Apical =
23.	S1:	underneath it =
24.	Т:	this is towards you =
25.	S1:	so the base is underneath it? =
26.	Т:	exactly (2) okay? (.) one two three (.) basal
27.		(.) one two three (.)Basal (.) Apical (.)
28.		apical (.) apical =
29.	S1:	and the (.) silicone (.) it's inside?

30.	Τ:	the silicone is in the centre (.)of this
31.		Pyramid =
32.	S1:	so we can't see it (.) in the diagram =
33.	Т:	it is not shown (.) just for simplicity (.)
34.		not for any other reason (.) okay? Of course
35.		(.)there are not pyramids in mineral (.) we
36.		have only Cations and (Banions) (.) this is
37.		(.) human (.) invention (.) to draw (um::) (2)
38.		beautiful pictures (.) okay?

Extract 3.3

12.	Т:	Talc (.) Do you know this mineral? (2)
13.	SS:	Yes =
14.	Τ:	Is it soft or rough? =
15.	SS:	Soft =
16.	Τ:	What do we (.) use this mineral? =
17.	SS:	Powder =
18.	Τ:	Baby powder (.) ladies (.) powder (.) for the
19.		face because it's extremely (.) soft (.) What
20.		is the number in the moist scale? =
21.	SS:	One
22.	т:	so it's the softest (2)

Extract 3.4

1.	Τ:	This	is	the	end	for	toc	lay	(.)I	wil	.1 :	see	you
2.		Tomor	row	(.)	pra	actic	cal	(.)	try	to	red	cogr	nise

- 3. these minerals (.) under the microscope (.)
- 4. thank you very much

Appendices 6:

Primary Data – Geology Practical:

Extract 4.0

12.	Τ:	today we (have the sample) parts of minerals
13.		(.)the:: Inosilicates and the (.) double chain
14.		Inosilicates (.) but ((3)) to (.) identify (.)
15.		different sections (.) Hornblende (.) Muscovite
16.		(.) Biotite (.) Chloride and Serpentine (.)
17.		five minerals (.) Hornblende is the most (ah::)
18.		(2) the com, the commonest (.) mineral (.) and
19.		(.) I want to ask you now (.) you see here (.)
20.		the colour (.) (no matter where the stage) (.)
21.		the colour changes (.) what is this called? =
22.	SS:	Pleochroric/ Pleochroric/ Pleochroric =
23.	Τ:	the first mineral (.) the first Pleochroric
24.		mineral (.) you learn (.) is Hornblende (3)
25.		Hornblende has two sets of colour (.) brown (.)
26.		and green (.) that's why (.)maybe you will
27.		sometimes (.) you will hear (.) green
28.		Hornblende (.)and brown Hornblende (.) (means)
29.		(.) denote (.) two different sets of colour

Extract 4.1

```
10.
      т:
            Now I need your imagination (.) what does it
            look like? (2) [T indicate picture on the slide]
11.
12.
           like a ((2))=
      S1:
           like? (2)
13.
      т:
14.
      SS:
           ((3))=
15.
            fence? (.)okay (.) the imagination of some
      т:
            scientist (.) it looks like (.) a fisherman's
16.
17.
            (.) net this texture (.) is called a mesh
           texture (.) it's very common (2)
18.
```

Extract 4.2

13.	S1:	Sir (.) is it anomalies (.) no? =
14.	Т:	is it? =
15.	S1:	anomalies =
16.	Т:	((3)) anomalies $(.)$ the fourth order $(.)$ so
17.		you see the same colour as the colour =
18.	S1:	that's the $((3)) =$
19.	Τ:	((2)) they are the same cause (.) they have
20.		fourth order (.) you have to write fourth
21.		order masked (.) by (.) the (.) colour =
22.	S1:	<u>must</u> by the colour? (oh \uparrow) masked by the colour
23.	Т:	Polarising colours are masked by colour, (.)
24.		the (.) colours yes ((5)) One percent colour
25.		(.) for what mineral? =
26.	S1:	Biotite? =
27.	Т:	Biotite (2)

28.	S:	But then sir now got the ((3))=
29.	Т:	You do the real work (.) so you have a mineral
30.		(.) you don't know (.) you try to identify (2)
31.		let's go to (.) this crystal here (2)
32.		rotate (2) okay? (.) Two colours =
33.	S1:	Like (.) light brown =
34.	Т:	Yes =
35.	S1:	Like (.) dark brown =
36.	Т:	Now open it (.) look like that (2) light or
37.		dark? Either light (.) light brown (.) dark
38.		brown (.) okay?

Extract 4.3

1.	Т:	Okay (.) let's discuss the two questions (6)
2.		first question said (.) ask if I have a
3.		Pyroxene, the total after ((2)) analysis, is
4.		ideally one hundred percent (.) is it the same
5.		for Amphibole? (.) What is your opinion? (3) I
6.		will write again the general formula that is Y
7.		zero (2) here I have (.) and they have (.)
8.		Calcium (.) Magnesium (.) Aluminium (.)
9.		Silicone (.) ion (.) what do you think? (.)
10.		What is the correct answer? If I have (.) if I
11.		obtain (.) if I performed mechanical analysis
12.		for an Amphibole (.) for a Hornblende (.), the
13.		total (.) will be one hundred? =
14.	SS:	No =
15.	Т:	no? (.) why? =
16.	SS:	because ((3))=

17. T:	strata (.) amphibole contains hydrogen (.)
18.	hydrogen cannot be analysed (.) as I explain
19.	from the microprobes so (.) the total of
20.	magnesium will be (.) something between ninety
21.	five to ninety six (.) that said (.) so what
22.	does it mean? (3) if you have ninety five (.)
23.	it means (.) that the rest four (.) to five
24.	percent is the so called crystalline water
25.	Hydroxine (3) if you (.) if you (.) obtain the
26.	chemical analysis of a Pyroxin and the result
27.	is ninety four or ninety five (.) those too
28.	<pre>important (.) is it correct? (2) Any question?</pre>
29.	(5) so you have the rest of the time to (.)
30.	answer the questions and to (.) finish with
31.	different sections (4) before you leave (.)
32.	please leave your practical papers here (.)
33.	take your previous practical papers (.)
34.	do not forget any sections on the microscope

Appendices 7:

Primary Data – Biology Lecture 1:

Extract 5.0

12. T:	So (.) last time I just introduces a
13.	generalised (.) if you remember (.) skeleton of
14.	the (.) Cranium (.) of a tetrapod? (.) (um::)
15.	having look at how (.) tetrapod (.) morphs (.)
16.	so the (.) ((2)) forms (.) the (.) the
17.	(.) ancestors (.) of tetrapods (.) so you (.)

18.	you may wish to (.) to have an overview (.) on
19.	the textbooks of:: (.) of different tetrapod
20.	(.) Cranium (.) and looking at the slides (.)
21.	try to identify the (.) the different parts of
22.	the skull (.)

Extract 5.1

16.	Τ:	Do you know what Trichos mean? =
17.	SS:	No =
18.	Τ:	Trichos (.)Trichos (.)Trichology =
19.	S1:	Is it like the Trachea? =
20.	Т:	With what? Trachea? No, Trichos (3) its hair
21.		(.) hairy structures (.) okay? (2) (Keratosis)
22.		[T points at image on the slide] you already
23.		know that (2) Kera (.) Keratos (.) what does it
24.		mean?
25.	S1:	Keratin=
26.	Т:	Keratin (.) that's right (.) what does it mean?
27.		(3) pore [T laugh] (er::) are you studying
28.		Entomology?=
29.	SS:	no
30.	Т:	(Serumbasic) (.) kera, ((2)) okay so (.)

Extract 5.2

12.	Т:	this is?	[Тр	oints	to	picture	on	the	e sli	.de]	(2)
13.	SS:	human=									
14.	т:	human (.)	of	course	.)) foot	and	a h	and	(.)	a::

15.		in all vertebrates (.) you still, (.) and all
16.		tetrapod (.) you still call it hand (.) and
17.		foot (.) okay (.) so you have a (.) hand of a
18.		frog (.) foot of a frog (ah) (.) it has the
19.		same name (.) okay (.) and this is? (2)[${f T}$
20.		points to picture on slide]
21.	S1:	<horse> =</horse>
22.	Т:	no (.) you see the:: (.) they have one two
23.		three four (.) four digits (.) which are (.)
24.		contacting the ground (.) the fifth one =
25.	S2:	(hog) =
26.	Т:	similar (.) it's a dog (.) it's a dog (.)so
27.		this is ((2))you see the palm (.) the carpus
28.		and the metacarpus (.)all this (.) this part
29.		and wrist (.) it is not contacting the ground
30.		(.) ((2)) this way (.) I (.) I can elongate (.)
31.		I can (.) have a longer arm (.) for a:: (.)
32.		better leverage (.) when I run (.) okay? (.)
33.		these are runners (.) okay?

Extract 5.3

23. T:	okay (.) [T went through the slides]
24.	let's do something (.) we (.) still didn't
25.	do (.) (um) (2) I remind you that (.) you
26.	have a (.) whomever makes (.) makes a question
27.	has a plus (2) I still don't have my questions
28.	(.) only these guys [T pointed at one student]
29.	(.) (um) talking about interaction (.)

30.		so (um) (4) look at this slide (4) make a
31.		question? (5) try (.) try not to make
32.		it trigger like (.) what is this (.)what
33.		is that (.)yes, of course (.) it's just (.)
34.		define something so:: (2) what (.) what (.)
35.		didn't (.) didn't you understand (.) in this
36.		slide (5)can be several levels (.) from the
37.		very trigger one (.) like what is this (.)
38.		what is that (.) from (.) from (.) in what
39.		logical relationship (.) elements are (.) why
40.		should I? (.) show something first (.) and
41.		then something (.) after (5) did you
42.		understand the development of the (.)
43.		Vertebrates (.) did you understand why the (.)
44.		Vertebrates fu::sed (.) out of (faced) (.)
45.		where the lining is? (25) you understand (.)
46.		<pre>everything? (.)</pre>
47.	S1:	>why does it fuse?<=
48.	Т:	sorry? =
49.	S1:	>why does it fuse?<=
50.	Т:	if you hear me (.) I should hear you (2)
51.	S1:	(um::) (.) the nodal cord and the (.) $[((2))=$
52.	Т:	the nodal cord] and? =
53.	S1:	myotome? =
54.	т:	and the mayo (.) yes? =
55.		

Appendices 8:

Primary Data – Biology Lecture 2:

Extract 6.0

21.	Τ:	How much (.) if you have to tell (.) in terms
22.		of percentage (.) how much do you actually
23.		study on books?
24.	S1:	One percent=
25.	Т:	One percent? =
26.	S2:	What (.) What was the question? =
27.	S3:	Study from books=
28.	т:	Yeah (.) how much do you study <u>on</u> the books?
29.		(.)on books (.) in terms of preparing
30.		examination or trying to understand the
31.		content of books or a module =
32.	S3:	[>Nine percent<=
33.	S2:	Already (.)] fifty =
34.	т:	Fifty percent?
35.	S2:	Like that (.) Yeah=
36.	Т:	On books? (.) Where (.) where do you get the
37.		books?
38.	SS:	Library =
39.	т:	you never buy the books? =
40.	SS:	no (3)

Extract 6.1

12.	Τ:	So (.) any of you would explain (.) in very
13.		simple terms (.) what a cardiovascular system
14.		is? (2)

15.	S1:	Is it blood (.) transport system? =
16.	Т:	It is a transport system (.) yes
17.		(.)(um:::)it's a transport system (.) what (.)
18.		what does cardio mean? =
19.	S1:	heart? =
20.	Т:	heart (.) vascular =
21.	S1:	vessels =
22.	т:	vessels okay? (.) so (.)

Extract 6.2

12.	Τ:	The presentation is only an overview (.) and
13.		you (.) you cannot possibly cover the (.)((2))
14.		you open a book (.) it's just as simple as this
15.		(.) you open a book (.) the book (.) in the
16.		library (.) I strongly advice (.) you make
17.		copies (2) make copies (.) and you open (.) and
18.		you start reading (.) you start reading (.)
19.		underline (.) take notes (.) if you don't
20.		understand something (.) you search in the
21.		internet (.) ask around (.) look for more books
22.		(.) okay?

Appendices 9:

Primary Data – Biology Practical:

Extract 7.0

9.	Τ:	Grab your rat (.) just one note (.) Would it
10.		be (.) would it be (.) more difficult for you
11.		to dissect (.) I mean emotionally (.)

12.		emotionally (.) involving to dissect a (.) a
13.		worm or (.) a rat?
14.	SS:	Rat
15.	Т:	A rat (.) why? (3)
16.	SS:	Cause (.) it's a mammal
17.	Т:	It's a mammal (.) okay (.) so (.) it's a
18.		mammal (.) would it (.) would it be (.) okay
19.		for you to dissect a rat or a human? (2)
20.	SS:	Rat =
21.	Т:	More difficult to dissect a rat? (.)
22.		emotionally speaking (.) are you sure? (4)
23.		Would it be more difficult to dissect a human
24.		being or a rat?
25.	S1:	Rat =
26.	Т:	Sorry? =
27.	S1:	A rat =
28.	Т:	What do you (.) so you find it easier to
29.		dissect humans? =
30.	S2:	Yes (3)
31.	Т:	would it be difficult to dissect (.) a human
32.		you don't know or your mother [SS laugh] your
33.		mother, right? (3)

Extract 7.2

14. T: Did any of you watch the movie Interstellar?15. SS: Not yet/yes =

16.	Т:	Not yet (.) interstellar you have this system
17.		(.)the planets on point eight (.) one point
18.		three (.)the gravity force of (.) of earth
19.		planet so (.) so (.) can you imagine what
20.		would happen to twelve vertebrates (.) on a
21.		planet fifteen million after (.) on (.) on a
22.		planet which has a lower gravity than (.) than
23.		earth? =
24.	S1:	Heavier than =
25.	Т:	Sorry? =
26.	S1:	Heavier than the air and =
27.	т:	Lower (.) lower gravity force (.) small
28.		rotation feed (.) lighter (.) right? =
29.	S1:	Yes =
30.	Т:	of course the structure won't be so (.) tough
31.		(.) right?

Appendices 10:

Language & Linguistics Lecture 1:

Extract 8.0

15.	Τ:	Last time we a:: (.) didn't have a proper
16.		lecture we just (.) it was just kinda (.) a
17.		general introduction to (.) pragmatics and the
18.		kinds of (.)data that we would look at when
19.		(.) when doing this module and today, we have
20.		the (.) the first real topic (.) I mentioned a
21.		couple things about it last week If you
22.		remember (.) (um::) (.) today we're going to
23.	talk about (.) Deixis (.) funny pronunciation	
-----	--	
24.	(.) right? I almost think it should be (.)	
25.	Dayxis but it's not its Deixis (.) so (.) what	
26.	is Deixies? (3) a (.) good brief definition I	
27.	think (.) codification of features of context	
28.	in languages	

Extract 8.1

14.	Т:	For example (.) a Brit (.) someone from UK						
15.		says to an Australian (.) we're thinking of						
16.		visiting you next summer (3) can anybody see						
17.		the problem? =						
18.	S1:	Next summer =						
19.	Т:	Next summer yeah (3)						
20.	S2:	Which summer? =						
21.	Т:	Which summer (2)						
22.	S3:	British or Australia =						
23.	Т:	Right::? (.) The British summer that would be						
24.		what would (.) ((2)) the British summer from						
25.		the speaker (.) that would be the Brit (.)						
26.		British summer is centre of projection (3)						
27.	S1:	which projection?						
28.	Т:	(uh?) (.) it's the centre, right? he's						
29.		speaking from his point of view (.) form the						
30.		Brit's point of view (.) oh (.) I see you're						
31.		right. We don't know:: =						
32.	S1:	yeah:: =						

33. T: that's a good example =

Extract 8.2

16.	Т:	I have lived here for years (.) where's here?
17.		(3) right? (.) What could it be? (.) If I say
18.		to you, I've lived here for years (.) could
19.		be?
20.	S1:	>UBD<
21.	Т:	Could be? =
22.	S1:	UBD =
23.	т:	UBD? [SS Laugh] I lived in UBD? (.) But feels
24.		like it (.) sometimes by the number of hours I
25.		work, right? (.) Could be UBD (.) could be?
26.	S2:	This room
27.	Т:	This room? 1 live in this room? [SS Laugh]
28.		No:: (.) I don't think so =
29.	S3:	Brunei =
30.	Т:	Brunei (.) yeah

Extract 8.3

7.	Т:	On Monday at two, we got tutorial, right? (.)
8.		No need to prepare anything for it (.) Well
9.		you don't need to prepare a presentation for
10.		it (.) we will do some work on deixis and we
11.		will talk about the presentation (.) for the
12.		future tutorials,

Appendices 11:

Language & Linguistics Lecture 2:

Extract 9.0

11.	Τ:	Right (.) okay (.) We've been talking last
12.		time about process writing and today we're
13.		gonna move on (.) with another that we
14.		mentioned the week before (.) with creative
15.		writing,(3) Now creative writing is something
16.		(.) I think you can call it a fairly
17.		traditional approach (.) used in L1 classroom
18.		(.) for a very long time, it's still probably
19.		the (.) default approach in many first
20.		language classrooms

Extract 9.1

12. T:	What arguments can you think of for justifying
13.	creative writing? (.) Have a little think
14.	about it then (um::) I'll ask you (.) Perhaps
15.	it's motivating for the students (.) that's
16.	one (.) anything else? (28) any ideas came to
17.	mind? Other than motivating yourself anything
18.	else? (4) no possible justification? (.) but
19.	you said you like it $[{f C}]$ (.) why did you like
20.	it? =
21. S1:	It's free (.) I think ((2)) because I can do
22.	what I think =

23.	Т:	(Uh) (.) $(hmm) =$
24.	S1:	It's a bit disappointing if they give many
25.		comment on =
26.	Т:	(Uh) (.) (huh) (.) right (2) Its free (.) so
27.		you're not constraint to write in a
28.		particular way

Extract 9.2

12. S1:	Just to (.) write in this form Sir (.) but in
13.	a form of a story?
14. T:	complete (.) this is the first half of the
15.	story (.) right? (.) and you want to continue
16.	sixth [sentence =
17. S1:	You] (.) complete? (.) yeah (.) =
18. T:	Finish the story =
19. S1:	(Oh) (.) (oh) okay (.) So we just continue? =
20. T:	continue the story (.) six (.) seven (.) eight
21.	(.) nine (.) ten (.) Five more sentences
22.	(5) [T wrote on white board]

Extract 9.3

12.	S1:	Is it (.) important to limit the number of words
13.		they (.)write?
14.	Т:	I think (.) <u>no</u> but (.) what do you think? I don't
15.		think, so I mean when we limit the number they will
16.		be counting the number for sacrifice so (.) it's
17.		not very good ((2)) Well if you want students to

18.	write freely sometimes it's not good not to (.)
19.	to set limit but sometimes you an (.) other
20.	argument would be you want them to write a certain
21.	style sometimes maybe you have to set the limits
22.	(.)

Appendices 12:

Language & Linguistics Tutorial:

Extract 10.0

12.	Т:	The first stage in the (.) process writing
13.		(um::) (.) as you know, there are different
14.		ways of starting of a (.) processing
15.		writing class and so since there is five of you
16.		(.) I know we got five (.) different (.)
17.		possibilities there, okay? (.) So (.) what I
18.		want you to do (.) is (.) come up with one of
19.		the methods each (.) and I want you to just (.)
20.		think of (.) couple of arguments (.) why (.) $% = (1,1) + (1,$
21.		that (.) for that particular of study of
22.		process writing (.) so let's just do it as
23.		a (.) I'll allocate you (.) right (.) okay (.)
24.	S:	(Um::) =
25.	Т:	Yes? =
26.	S:	Are we (.) supposed to explain how (.) we are
27.		going to =
28.	Т:	Yeah (.) how and (.) why you think that
29.		particular (.) way of starting off process

30.	writing	(.)	might	be	good	or	effective	or
31.	useful	way d	of doir	ng i	Lt (.)	0}	kay?	

Extract 10.1

17.	Т:	So (.) why do you think brainstorming (.) is a
18.		good way of doing that? =
19.	S1:	So they can get (.) into the ideas =
20.	Т:	(Uh) (.) $(uh) =$
21.	S1:	The first thing they write =
22.	Т:	Right (.) so they (.) they (.) arrange their
23.		ideas brainstorming (.) how can it be
24.		arranged? =
25.	S1:	Some start if you keep by talking (.) they
26.		will $((2))$ out $(.)$ then they will $(.)$ have
27.		points =
28.	Т:	(Uh) (.) (uh) =
29.	S1:	and the points (.) raised by the students (.)
30.		so they can just arrange directly =
31.	т:	(Oh) yeah \uparrow (.) yeah (.) arrange and (.)
32.		everything =
33.	S1:	Yes =
34.	т:	yeah \uparrow (.) so the students are coming up with
35.		the ideas =
36.	S:	[ideas =
37.	Т:	for the beginning] (.) okay (.) right (.) so
38.		(.) there (um) (.) and (.) anybody else (.)
39.		think of another (.) way? (.) students are
40.		coming out with ideas any other good points

Extract 10.2

9.	Т:	So (.) which:: ones have you used? which one
10.		of these methods have you used? In (.) process
11.		writing class (.) to start off (2)
12.	S1:	I used a:: (.) I used pictures =
13.	Τ:	(Oh) \uparrow you used pictures (.) it's a good thing
14.		I give it to you =
15.	S1:	Yeah (.) [SS laugh] and taking notes and
16.		getting them to answer questions (2)
17.	Т:	Yeah (.) so you (.) you have used all these
18.		<pre>methods? =</pre>
19.	S1:	Yeah =
20.	Т:	So, which you think is the (.) better? =
21.	S1:	I like brainstorming =
22.	Т:	You like brainstorming =
23.	S:	And pictures =
24.	Τ:	And pictures (.) what about the rest of you?
25.		have You also (.) you have used brainstorming,
26.		right? [T points to one student] =
27.	S2:	but a:: (.) actually we use almost all the
28.		((2)) (.) but the most we used are one and
29.		five =
30.	т:	one and five (.) okay

Appendices 13:

Secondary Data – Geology Interview:

Participant no. 1:

Interview Extract 2.0

7.	I:	How do you start (.) the lecture?
8.	Τ:	If I have done a couple of lectures (.) in the
9.		beginning (.) after the 3^{rd} lecture (.) lets say I
10.		usually asks S (.) to recall few things (.) from
11.		the previous lectures in order (.) to have the
12.		connection to the next

Interview Extract 2.01

8.	I:	Do you usually (.) have a question and answer after
9.		classes end?
10.	Т:	students come (.) after asking for clarification
11.		(.) also, some idea they have (.) During practical
12.		while we are supposed (.) to apply the things we
13.		learn in the lecture we ask (.) they still ask
14.		their questions regarding the Lecture

Interview Extract 2.02

8.	I:	What type of question (.) is easier to ask (.)
9.		display question (.) where you know the answer or
10.		referential question (.) where you don't know the
11.		answer?
12.	Т:	Its more easier to ask (display) questions but I

13. feel (.) that I try to make them more comfortable14. so it's obvious they try to participate.

Interview Extract 2.03

11.	I:	How do you:: respond to an initiation (.) made by
12.		the students?
13.	Т:	In most of the cases (.) I try to give indirect
14.		evidence in order to:: take answers from them I am
15.		quite patient (.) and I try to force them okay (.)
16.		try again if you don't give the correct answer (.) $% \left($
17.		or if you are nearly correct (.) I give some
18.		directions in order to provide a better answer so I
19.		try to force them to give their \underline{own} answers (.)
20.		rather than me to give them

Interview Extract 2.04

18.	S:	How much time (.) after questioning (.) do you
19.		usually give the students?
20.	Τ:	I think you need to find the balance (.) my opinion
21.		is that (.) if you give them shorter time (.) not
22.		all students have the same ability to respond in
23.		the same time (.) of course some people need more
24.		time (.) some people need less (.) you need to
25.		make all students to feel (.) like you have all
26.		their time (.) to think on the on the other hand
27.		if you (.) let them think for more than a certain

28. period of time I'm afraid that we have two
29. problems the first (.) problem is that they will
30. get board the second thing is that (.) I have to
31. finish my lecture within:: two hours so I will
32. have no time to my lecture that's why (.) I
33. believe every lecturer finish must find the
34. balance between the short (.) and the long time

Interview Extract 2.05

15.	I:	How do you (.) make sure your students are
16.		comfortable (.) participate in the classroom?
17.	Т:	First of all (.) my intention is to make them feel
18.		comfortable (.) that's why (.) sometimes I use some
19.		jokes lets say to make them feel (.) better in
20.		order to express themselves later (.) this is my
21.		impression (.) I also try to ask question regarding
22.		the lecture (.) but I also try whenever it is
23.		possible look to (.) to ask them or to give them
24.		examples from their everyday life, for example (.)
25.		we use minerals in our everyday life, and we don't
26.		know that (.) most people don't know (.) that even
27.		in our homes and they feel better (.) because they
28.		think it is not so scientific,

Interview Extract 2.06

10. I: Did you find any case (.) where language use was

11. seen as a (.) barrier?

12.	T2:	I don't think so, fortunately, or unfortunately I'm
13.		not a native English speaker (.) so they know that
14.		I am in the same situation with them (.) so if they $% \left(\left({{{\left({{{\left({{{\left({{{}}} \right)}} \right)}_{i}}}}_{i}}} \right)} \right)$
15.		make some mistakes I also make mistakes this I know
16.		in English I mean (.) so I don't think I have
17.		problems like this they (.) try to express a
18.		themselves (.) with body language even

Interview Extract 2.3

5.	Ι:	What did you think (.) about the tutor's use of
6.		humour (.) in the video?
7.	S:	funny and interesting (.) He caught our attention
8.		and keep on going

Appendices 14:

Secondary Data – Biology Interview:

Interview Extract 3.1

6.	I:	Have your tutor ever use recall? How did he do it?
7.	S:	Yes (.) he ask question (.) it happened just now
8.		he said like okay (.) where do you find ((2)) so
9.		yeah (.) he does recall (.) recall from previous
10.		lectures

Interview Extract 3.2

5.	I:	How does it help you to study besides powerpoint?
6.	S:	He ask questions (.) and he went elaborate more
7.		and more (.) from there (.) we can learn the
8.		previous class (.) which we have forgotten

Interview Extract 3.3

4.	I:	How did (.) your tutor provide feedback?
5.	S:	when he teach and um:: he elaborate more from the
6.		question, (.) he did give hints though

Interview Extract 3.4

3.	I:	How did your tutor (.) use humour in the classroom
4.	S:	He use sarcasm (.) as a humour

Appendices 15:

Secondary Data – Language & Linguistics Interview:

Interview Extract 4.0

11.	I:	From the video (.) I could see how the students
12.		respond well to humour
13.	Τ:	yeah (.) I make jokes all the time (.) I try to
14.		keep it fairly light (.) warm up faster and react
15.		better um:: I often get feedback that it's a
16.		grammar class (.)but it's funny you don't expect
17.		grammar classes to be funny(.)it's just a way of
18.		relating to them and making it fairly easy(.)
19.		instead of questioning (.) what do tutors do to

20. make us involved more (.) or talk more?

Interview Extract 4.01

17.	S:	How do you find the first year students (.) in your
18.		class?
19.	Т:	they can be a bit shy (.) they can be a bit
20.		reluctant to speak up (.) (um::) There is a certain
21.		cultural reluctance to (.) to (.) kind of (.) to
22.		stick out and be the one who (.) who sort of puts a
23.		head above the power ((2)) and you know (.) and so ${\tt I}$
24.		(.) there's that aspect to it (um) I find (.) I
25.		think that maybe English students (.) I (.) I (.)
26.		students of English language (.) are a bit more
27.		willing to do so partly because their English is
28.		better (.) than the average student obviously (.)
29.		and partly because they are used to being taught
30.		by:: (um) orang puteh and you know orang puteh tend
31.		to encourage more (.) Most of their lecturers in
32.		the beginning will be org puteh

Interview Extract 4.02

17.	Ι:	Was there a time (.) when the student blow away
18.		your expectations (.) by providing an interesting
19.		point?
20.	Т:	Not blown my expectation (.) just beyond my
21.		knowledge because okay (.) I will sometimes say

what is this situation in Malay and I'm not really a 22. 23. Malay speaker, right? (.) Now in this example (.) I ask them about inclusive and exclusively Malay and 24. 25. they knew the answer but (.) there's quite a few 26. times with Malay I generally won't know the answer 27. it won't be a teach you question so (.) they are Malay native speakers, so I'm saying what's the 28. 29. situation in Malay and then sometimes they kind of 30. discuss it among themselves and then come back and 31. tell me (.) They do come up with something I don't 32. know myself

Appendices 16:

Interactional Features	Definition of Terms	
Scaffolding	1. Reformulation: rephrasing a learner's	
	contribution	
	2. Extension: extending a learner's	
	contribution	
	3. Modelling: providing an example for	
	learner(s)	
Repair	A form of error correction.	
	1. Direct repair: Correcting an error	
	quickly and directly	
Feedback	1. Content Feedback: Giving feedback to	
	the message rather than the words used	
	2. Form-Focused Feedback: Giving	
	Feedback on the words used, not the	
	message	
Extended wait time	Allowing sufficient time (several seconds) for	
	students to respond or formulate a response.	
Questions	1. Display Questions: Asking questions to	
	2 Referential Questioner Convine	
	2. Referential Questions: Genuine	
	questions to which the teacher does not	
Confirmation checks	Conforming understanding of student's or	
Commination checks	teacher's contribution	
Seeking Clarification / Clarification Requests	1 Teacher asks a student to clarify	
Seeking Charmenton / Charmenton Requests	something the student has said	
	2. Student asks teacher to clarify	
	something the teacher has said.	
Teacher Echo	1. Teacher repeats teacher's previous	
	utterance	
	2. Teacher repeats a learner's contribution	
Turn-Taking	1. Turn Completion: Completing a	
	learner's contribution for the learner	
	2. Extended Learner Turn: Learner turn of	
	more than one utterance	
	3. Extended Teacher turn: Teacher turn of	
	more than one utterance	
Acknowledgement Token	Term used in Conversation Analysis (CA) to	
	refer to words like ok, right, yean, sure, mm,	
	advantual and a speaker contributions and to help	
	communication proceed smoothly	
IRE Exchange	See Sinclair and Coultbard (1075) Who noted	
	that most classroom discourse follows a three	
	nart structure: Initiation Response and Follow-	
	up/Feedback/Evaluations	
	up/1 coubacity Livaluations.	

Figure 5: Definition of Interactional Features (Interactures) (see Walsh, 2011: p.214-221)

Appendices 17:

Transcription System	Meanings
T:	-teacher/tutor
S:	-learner/students
S1: S2: etc.	-identified student/learner
SS:	-several students/learners at once or the whole class
/ok/ok/	-overlapping or simultaneous utterances by more than one student
[do you understand?]	-the overlap between teacher and learner
[I see]	
=	-turn continues, or one turn follows another without any pause
	(latching)
(.)	-pause of one second or less
(4)	-silence; length given in seconds
((4))	-a stretch of unintelligible speech with the length given in seconds
::	-a colon after a vowel or a word is used to show that the sound is
	extended, The number of colons shows the length of the extension
(hm,hh)	-onomatopoetic representations of the audible exhalation of air
.hh	- Indicates an audible inhalation of air, for example, like a gasp. The
	more h's, the longer the in-breath
?	-a question mark indicates that there is slightly rising intonation
	-a period indicates that there is slightly falling intonation
,	-a comma indicates an abrupt cut off, where the speaker stopped
	speaking suddenly
$\uparrow\downarrow$	-up and down arrows are used to indicate that there is sharply rising or
	falling intonation. The arrow is placed just before the syllable in which
	the change in intonation occurs
Under	-underlines indicate speaker emphasis on the underlined portion of the
	word
CAPS	-capital letters indicate that the speaker spoke the capitalised portion
	of the utterance at a higher volume than the speaker's normal volume
0	-indicates an utterance that is much softer than the normal speech of
	the speaker. This symbol will appear at the beginning and at the end of
	the utterance in question
><,<>	- 'greater than' and 'less than' signs indicate that the talk they surround
	was noticeably faster, or slower than the surrounding talk
(would)	-when a word appears in parentheses, it indicates that the transcriber
	has guessed as to what was said, because it was indecipherable on the
	tape. If the transcriber was unable to guess as to what was said,
	nothing appears in the parentheses.
	-onnited names of participants
1 organises group	-eaitor s comments (in bold type)
Italics	- the use of the first language (L1)

Figure 6: Adapted from Walsh (2013: p.145-146)

Appendices 18:

Strategy	Description	Examples
Model waiting	Model what waiting for three	Reflect on the question that you
	seconds looks and feels like.	asked, the feedback that you
		may provide to the student, and
		potential follow-up questions
		that you may ask if the student
		is having difficulty responding.
Model thinking	Conduct think-aloud so students	Teacher: I was just asked what
	can observe what it looks like	my favourite animal is, so I am
	when you are thinking about the	thinking that I like both horses
	answer to a question.	and dogs, but I have a dog and
		know about dogs, so I think my
		favourite animal is a dog.
Teach active listening	Teach students how to face the	Teacher: [says and gestures]
	person who is speaking and	Eyes on me and ears on what I
	attend to what is being said. Use	say.
	gestures to guide students.	
Limit the wait time	Three seconds has been	The teacher counts to 3 or
	identified as a good amount of	silently repeats a phrase or short
	wait time.	sentence (e.g., "I will wait for
		the student to respond") that
		takes three seconds.
Identify activities that will	Choose specific activities, such	While reading, ask open-ended
benefit most from the wait	as book reading, to use wait	questions and wait three
time	time.	seconds for students to respond.
Teach students to	Repeat the student's word,	Student: Yellow. Teacher:
respond using more than	followed by the use of the word	Yellow! The boy found a
one word	in a sentence.	yellow balloon. Yes, that is
	· · · · · · · · · · · · · · · · · · ·	correct.
Be patient	Learning to use wait time takes	While planning for the day, the
	time, as this is a new	teacher thinks I am going to try
	conversation style for everyone	and use wait time three times
	in the classroom.	today, so I do not respond
		immediately.
Use the wait time for you	Reflect on the question that you	While waiting, the teacher
to think	asked, the feedback that you	thinks, I asked students how
	may provide to the student, and	they knew the boy was sad, but
	potential follow-up questions	I may rephrase that prompt to
	that you may ask if the student	ask them to describe what the
	is having difficulty responding.	boy's face looks like.

Figure 7: Strategies to Support Wait Time (Wasik and Hindman, 2018: p.6).

REFERENCES

- Aghajanzadeh Kiasi, M. & Hemmati, F., 2014. The Importance of 'Teacher Talk' in Teaching EFL Writing. *Porta Linguarium*, Volume 22, pp. 95-108.
- Altrichter, H., Posch, P. & Somekh, B., 1993. *Teachers Investigate Their Work*. London: Routledge.
- Amineh, R. J. & Asl, H. D., 2015. Review of Construction and Social Constructivism. Journal of Social Sciences, Literature and Languages, 1(1), pp. 9-16.
- Anon., 2017. *The World Factbook*. [Online] Available at: <u>https://www.cia.gov/library/publications/the-world-factbook/geos/bx.html</u> [Accessed 15 May 2017].
- Argyris, C. & Schon, D. A., 1996. Organizational Learning II: Theory, Method and Practice. Reading MA: Addison=Wesley.
- Beblawi, H., 1994. The rentier state in the Arab world. In: *The rentier state*. London: Croom Helm, pp. 34-43.
- Bernstein, B., 1999. Vertical and Horizontal Discourse: An Essay. British Journal of Sociology of Education, 20(2), pp. 157-174.
- 8. Bernstein, B., 2006. Aspects of Language and Learning in the Genesis in the Social Process. *Journal of Child Psychology and Psychiatry*, 1(4), pp. 313-324.
- Beyer, L. E. & Zeichner, K., 1987. Teacher education in a cultural context:Beyond reproduction. *Discoure: The Australian Journal of Educational Studies*, 13(2), pp. 298-334.
- 10. Bhatti, A., et al., 2018. Code-Switching: A Useful Foreign Language Teaching Tool in EFL Classroom. *English Language Teaching*, 11(6), pp. 93-101.
- 11. Blunt, P., 1988. Cultural consequences for organization change in a Southeast Asian state: Brunei. *Academy of Management Executive*, 1(3), pp. 235-240.

- Bolton, G., 2010. *Reflective Practice, Writing and Professional Development (3rd ed.)*. London: Sage Publications.
- 13. Boud et al, 1985. Reflection: turning experience into learning. London: Kogan Page.
- 14. Brandes, D. & Ginnis, P., 1986. *A Guide to Student-Centred Learning*. Hemel Hempstead: Simon & Schuster Education.
- 15. Braun, V. & Clarke, V., 2013. Successful qualitative research: a practical guide for beginners. London: Sage.
- 16. Brown, J. D. & Rodgers, T. S., 2002. Doing Second Language Research: An introduction to the Theory and Practice of Second Language Research for Graduate/Master's Students in TESOL and Applied Linguistics, and Others. Oxford: Oxford University Press.
- 17. Brunei Times, 2011. SPN21 Improved Teaching, Learning. [Online] Available at: http://www.bt.com.bn/news-national/2011/03/08/spn21-improved-teaching-learning
- Bruner, J., 1997. Celebrating Divergence: Piaget and Vygotsky. *Human Development*, 40(2), pp. 63-73.
- Butler, J., 1992. Teacher Professional Development: An Australian Case Study. Journal of Education for Training, 18(3), pp. 221-238.
- 20. Butler, J., 1996. Professional Development: Practice as text, reflection as process, and self as locus. *Australian Journal of Education*, 40(3), pp. 265-283.
- 21. Butterfield, J., 2010. Verbal Communication. Massachusetts: Cengage Learning.
- 22. Calderhead, J. & Gates, P., 1993. *Conceptualizing Reflection in Teacher Development*. London: Falmer Press.
- 23. Cannella, G. S. & Reiff, J. C., 1994. Preparing Teachers for Cultural Diversity: Constructivist Orientations. *Actions in Teacher Education*, 16(3), pp. 37-45.
- Channa, L., 2014. A Critical Debate in Second Language Acquisition (SLA) Theory. NUML Journal of Critical Inquiry, 12(2), pp. 43-56.

- 25. Churches, R., 2010. *Effective Classroom Communication Pocketbook*. Hampshire: Teacher's Pocketbooks.
- 26. Clynes, A., 2014. Brunei Malay: An overview. In: P. Sercombe, M. Boutin & A. Clynes, eds. Advances in research on linguistic and cultural practices in Borneo. Phillips, ME: Borneo Research Council, pp. 153-200.
- 27. Clynes, A. & Deterding, D., 2011. Standard Malay (Brunei). Journal of the International Phonetics Association, 41(2), pp. 259-268.
- Cohen, L., Manion, L. & Morrison, K., 2011. Reseach Methods in Education. London: Routledge-Falmer.
- 29. Compernolle, R. A. v., 2014. Instructed Concept Appropriation and L2 Pragmatic Development in the Classroom. *Language Learning*, 64(3).
- 30. Copeland, W. D., Birmingham, C., de la Cruz, E. & Lewin, B., 1993. The Reflective Practitioner in Teaching: Towards a research agenda. *Teaching and Teacher Education*, 9(4), pp. 347-359.
- 31. Corver, M., 2005. Young Participation in Higher Education 2005/03. Bristol: HEFCE.
- 32. Creswell, J. W., 2009. *Research Design: Qualitative, Quantitative, and Mixed Methods Approaches.* 3rd ed. Thousand Oaks, CA: Sage.
- Cullen, R., 1998. Teacher talk and the classroom context. *English Language Teaching Journal*, Volume 52, pp. 179-87.
- 34. Cullen, R., 2002. Supportive teacher talk: the role of the F-move. *English Language Teaching Journal*, Volume 56, pp. 117-27.
- 35. Denstad, F. Y., 2009. Youth Policy Manual: How to develop a national youth strategy. Strasbourg Cedex: Council of Europe.
- 36. Elder-Vass, D., 2012. *The Reality of Social Construction*. Cambridge: Cambridge University Press.

- 37. Escobar Urmeneta, C., 2019. An Introduction to Content and Language Integrated Learning (CLIL) for Teachers and Teacher Educators. *CLIL Journal of Innovation* and Research in Pluralingual and Pluricultural Education, 2(1), pp. 7-19.
- 38. Ezzy, D., 2013. Qualitative Analysis: Practice and Innovation. Oxon: Routledge.
- Fenton-Smith, B., Humphreys, P. & Walkinshaw, I. eds., 2017. English Medium Instruction in Higher Education in Asia-Pacific. Cham: Springer International Publishing.
- 40. Fielding, M., 2001. Students as Radical Agents of Change. *Journal of Educational Change*, Volume 2, pp. 123-141.
- 41. Firth, A. & Wagner, J., 1997. On Discourse, Communication, and (some) fundamental concepts in SLA research. *Modern Language Journal*, Volume 81, pp. 285-300.
- 42. Firth, A. & Wagner, J., 2007. Second/Foreign Language Learning as a Social Accomplishment: Elaborations on a Reconceptualized SLA. *The Modern Language Journal*, 91(s1), pp. 800-819.
- 43. Gass, S. M. & Mackey, A., 2013. *Stimulated Recall Methodology in Second Language Research*. Mahwas: Routledge.
- 44. Gayle, B. M., 2006. Classroom Communication and Instructional Processes: Advances Through Meta-Analysis. New Jersey: Routledge.
- 45. Gee, J. P., 2005. An Introduction to Discourse Analysis: Theory and Method. London and New York: Routledge.
- 46. Ghaffarpour, H., 2016. Classroom Conversation Analysis and Critical Reflective Practice: Self-evaluation of Teacher Talk Framework in Focus. *Regional Language Centre (RELC) Journals*, 48(2), pp. 210-225.
- 47. Gilroy, P., 1993. Reflections on Schon: An epistomological critique and a practical alternative. In: P. Gilroy & M. Smith, eds. *International Analyses of Teacher Education*. Oxford: Carfax, pp. 125-142.

- 48. Grbich, C., 2012. Qualitative Data Analysis: An introduction. London: Sage.
- Grimmitt, P., 1988. The nature of reflection and Schon's conception in perspective. In: *Reflection in Teacher Education*. New York: Teachers College Press.
- 50. Gunn, G. C., 1993. Rentier capitalism in Brunei Darussalam. In: Southeast Asia in the 1990s: Authoritarianism democracy and capitalism. London: Allen & Unwin, pp. 109-132.
- 51. Haji Awang Asbol, H. M., 2019. 'Melayu Islam Beraja' The Malay Islamic Monarchy in Negara Brunei Darussalam Prior to 1906: A Historical Study. Brunei Darussalam: Brunei Historical Society.
- 52. Harris, V., Burch, J., Jones, B. & Darcy, J., 2001. Something to Say? Promoting Spontaneous Classroom Talk. London: CiLT.
- 53. Hart, R., 1997. *Children's Participation: The theory and practice of involving young citizens in community development and environmental care.* New York: Earthscan.
- 54. Haynes, J. & Murris, K., 2001. Opening up Space for Children's Thinking Dialogue. In: United Kingdom Reading Association Conference. Canterbury, Kent: Opinion Papers, pp. 6-8.
- 55. Hendry, D., 1996. Constructivism and Educational Practice. *Australian Journal of Education*, 40(1), pp. 9-45.
- 56. Hill, D., 1997. Critical reflection in initial teacher education. In: *Teachers, teacher education and training*. London: Cassell, pp. 193-208.
- 57. Hymes, D. H., 1972. On Communicative Competence. In: J. B. Pride & J. Holmes, eds. *Sociolinguistics. Selected Readings.* Harmondsworth: Penguin, pp. 269-293.
- 58. Institute of Brunei Technical Education (IBTE), 2019a. IBTE Vision and Mission.
 [Online]
 Available at: <u>https://ibte.edu.bn/about/</u>
 [Accessed 6 August 2019].

- 59. Institute of Brunei Technical Education (IBTE), 2019b. Strategic Plan. [Online]
 Available at: <u>https://ibte.edu.bn/strategic-plan-1718/</u>
 [Accessed 6 August 2019].
- 60. Ishamina, A. & Deterding, D., 2017. English-Medium Education in a University in Brunei Darussalam: Code-Switching and Intelligibility. In: B. Fenton-Smith, P. Humphreys & I. Walkinshaw, eds. *English Medium Instruction in Higher Education in Asia-Pacific: From Policy to Pedagogy*. Cham: Springer International Publishings, pp. 281-298.
- 61. Jackson, S. L., 2010. *Research Methods: A Modular Approach*. Belmont: Cengage Learning.
- 62. Jawhar, S., 2018. The Use of L1 as a Source of Humour to Facilitate Interaction in EFL Classrooms. *Arab World English Journal*, 9(3), pp. 249-310.
- 63. Johnson, K. E., 1995. Understanding Communication in Second Language Classrooms. Cambridge: Cambridge University Press.
- 64. Kelly Hall, J., Hellermann, J. & Pekarek Doehler, S. eds., 2011. *L2 Interactional Competence and Development*. New York: Multilingual Matters.
- 65. Kidd, W. & Czerniawski, G., 2011. *The Student Voice Handbook: Bridging the Academic/ Practitioner Divide*. Bingley: Emerald Group Publishing.
- 66. Kiekopf, J., 2011. CfBT Educational Services. Bandar Seri Begawan: CfBT.
- 67. King, N. & Horrocks, C., 2010. Interviews in qualitative research. London: Sage.
- 68. Kolej Univeristi Perguruan Ugama Seri Begawan (KUPU-SB), 2019. Latar Belakang.
 [Online]
 Available at: <u>http://www.kupu-sb.edu.bn/SitePages/Latar%20Belakang.aspx</u>
 [Accessed 25 July 2019].
- 69. Kolej Universiti Perguruan Ugama Seri Begawan (KUPU-SB), n.d. *Info KUPU SB* (*English Ver.*). [Online] Available at: <u>http://www.kupu-sb.edu.bn/SiteCollectionDocuments/INFO%20KUPU%20SB%20(ENGLISH%20VE</u>

[Accessed 16 August 2019].

- 70. Kothari, C. R., 2008. *Research Methodology: Methods and Techniques*. New Delhi: New Age International.
- 71. Kramsch, C., 1986. From language proficiency to interactional competence. *Modern Language Journal*, 70(4), pp. 366-72.
- 72. Kumpulainen, K., et al., 2009. *Investigating Classroom Interaction: Methodologies in Action*. Rotterdam: Sense Publishers.
- 73. Kumpulainen, K. & Wray, D., 2012. *Classroom Interactions and Social Learning: From theory to practice.* New York: Routledge.
- 74. Lantolf, J. P., 2000. Sociocultural Theory and Second Language Learning. Oxford: Oxford University Press.
- 75. Leslie, C., 2015. Humour in Peer Interaction in the L2 Classroom. *e-TEALS: An e-Journal of Teacher Education and Applied Language Studies*, Volume 6, pp. 51-67.
- 76. Levinson, S. C., 1983. Pragmatics. Cambridge: Cambridge University Press.
- 77. Lichtman, M., 2010. *Qualitative research in Education: a user's guide*. California: Sage.
- Lourenço , O., 2012. Piaget and Vygotsky: Many resemblances, and a crucial differences. *New Ideas in Psychology*, Volume 30, pp. 281-295.
- 79. Lourenco, O. M., 2016. Developmental Stages, Piagetian Stages in Particular: A Critical Review. *New Ideas in Psychology*, Volume 40, pp. 123-137.
- Louvigne, S., 2018. Social Constructivist Approach of Motivation: Social Media Messages Recommendation System. *Behaviormetrika*, 45(1), pp. 133-155.
- Lovorn, M. & Holaway, C., 2015. Teachers' Perceptions of Humour as a Classroom Teaching, Interation, and Management Tool. *European Journal of Humour Research*, 3(4), pp. 24-35.

- Lowenthal, D., 1987. Social features. In: *Politics, security and development in small states*. London: Allen & Unwin, pp. 45-67.
- Mann, S. J. & Walsh, S., 2013. RP or RIP: a critical perspective on reflective practice. *International Review of Applied Linguistics*, 4(2), pp. 291-315.
- Mann, S. & Walsh, S., 2015. Doing Reflective Practice: A Data-Led Forward. *ELT Journal*, 69(4), pp. 351-362.
- 85. Mann, S. & Walsh, S., 2017. *Reflective Practice in English Language Teaching : Research-Based Principles and Practices.* London: Routledge.
- 86. Maps of the World., 2016. Large Physical Map of Brunei. [Online] Available at: <u>http://www.maps-of-the-world.net/maps-of-asia/maps-of-brunei/</u> [Accessed 15 May 2016].
- Markee, N., 2008. Toward a Learning Behavior Tracking Methodology for CA for SLA. *Applied Linguistics*, 29(3), pp. 404-427.
- Maroni, B., 2010. Pauses, Gaps and Wait Time in Classroom Interaction in Primary Schools. *Journal of Pragmatics*, 43(7), pp. 2081-2093.
- 89. Martin, P. W. & Sercombe, P., 1996. The Penan of Brunei: Patterns of linguistic interaction. In: *Language use & Language Change in Brunei Darussalam*. Athens, OH: Ohio University Center for International Studies, pp. 302-311.
- 90. Masitah, S. & Clarke, D. J., 2014. Brunei Teacher' Perspectives on Questioning: Investigating the Opprtunities to "Talk" in Mathematics Lessons. *International Education Studies*, 7(7), pp. 1-18.
- Mason, R. & Rennie, F., 2006. *ELearning: The Key Concepts*. Oxan and New York: Routledge.
- 92. Mauzy, D. K., 1997. The human rights and 'Asian values' debate in Southeast Asia: Trying to clarify the issues. *Pacific Review*, 10(2), pp. 210-236.
- 93. Maxwell, A. R., 1996. The place of the Kedayan in traditional Brunei society. *South East Asia Research*, 4(2), pp. 157-196.

- 94. McCarthy, M., 1992. Discourse Analysis for Language Teachers. *Child Language Teaching Therapy*, 8(1), pp. 96-100.
- 95. McLean, J., 1997. *Flexible Learning and Learning Organisation*. s.l.:Staffordshire University.
- 96. McLean, J., et al., 2003. *Three Flexible Tutor: From Lecturer to Facilitator*. Edinburgh, s.n.
- 97. Menezes, V., 2013. Second Language Acquisition: Reconciling Theories. *Open Journal of Applied Sciences*, 3(7), pp. 404-412.
- Ministry of Education (MoE), 2007. The Ministry of Education Strategic Plan 2007-2011. Brunei Darussalam: Ministry of Education.
- Ministry of Education (MoE), 2012. *The Ministry if Education Strategic Plan 2012-*2017. Brunei Darussalam: Ministry of Education.
- 100. Ministry of Education (MoE), 2012. *Higher Education*. [Online] Available at: <<u>http://www.moe.edu.bn/web/moe/edusys/highedu?p_p_id=15&p_p_action=1&p_p_state=normal&p_p_mode=view&p_p_col_id=&p_p_col_pos=0&p_p_col_count=0& ≥</u>

[Accessed 7 December 2012].

- 101. Ministry of Education, 2012. *Vision and Mission*. [Online] Available at: <<u>http://www.moe.edu.bn/web/moe/home/></u> [Accessed 7 December 2012].
- 102. Ministry of Education (MoE), 2013. *The National Education System for the* 21st Century: SPN21, Brunei Darussalam: Ministry of Education Brunei Darussalam.
- 103.
 Ministry of Education (MoE), 2013. The National Education System for the

 21st
 Century
 SPN21.
 [Online]

 Available
 at:
 http://www.moe.gov.bn/spn21dl/SPN21%20ENG%20(2013)%20COMPLETE.pdf

 [Accessed 6 August 2019].
 [Accessed 6 August 2019]

- 104. Ministry of Education (MoE), 2019. Strategic Plan 2018-2022, Brunei Darussalam: Strategic Enterprise Performance and Delivery Unit (SEPADU), Ministry of Education.
- 105. Ministry of Law (MoL), 1996. Seventh National Development Plan 1996 2000, Brunei Darussalam: Government Printing Department.
- Minnis, J. R., 1998. Brunei's seventh national development plan 1996-2000: Implications for educational policy and practice. *Asia Pacific Journal of Education*, 18(1), pp. 25-37.
- Minnis, J. R., 1999. Is reflective practice compatible with Malay-Islamic Values? Some thoughts on teacher education in Brunei Darussalam. *Australian Journal of Education*, 43(2), pp. 172-185.
- Moskal, A., Loke, S. & Hung, N., 2016. Challenges Implementing Social Constructivist Learning Appraches: The Case of Pictation. At Adelaide, ASCILITE, pp. 446-454.
- 109. Mulder, N., 1996. The common cultural construction of social life in inner, littoral Southeast Asia. *South East Asia Research*, 4(1), pp. 41-61.
- 110. Muzaffar, C., 1996. Europe, Asia and the question of human rights. *Just Commentary*, Volume 23, pp. 1-6.
- 111. Napoli, R. D., 2004. What is Student Centred Learning. [Online] Available at: <<u>http://www.westminster.ac.uk/__data/assets/pdf_file/0004/41782/StudentCentredLe</u> <u>arning.pdf></u> [Accessed 7 August 2011].
- 112. Nedjl, W. & Tochterman, K., 2006. *Innovative Approaches for Learning and Knowledge Sharing*. Hannover: Springer.
- 113. Noor Azam, H. O. & McLellan, J., 2014. English in Brunei. World Englishes, 33(4), pp. 486-497.
- 114. Noor Azam, H. O., McLellan, J. & Deterding, D., 2016. The Use and Status of Language in Brunei Darussalam: A Kingdom of Unexpected Linguistic Diversity. Singapore: Springer.

- 115. Nur Hafeezah, A. S. & Masitah, S., 2014. Examining Classroom Interactions in Secondary Mathematics Classrooms in Brunei Darussalam. *Asian Social Science*, 10(11), pp. 92-103.
- O'Hara-Davies, B., 2010. Brunei English: A developing variety. World Englishes, 20(3), pp. 406-419.
- Osagie Obazee, G. E. & Obaseki, F. N., 2009. The Adoption of Some Counselling Techniques in Teaching Practice Supervision. *Journal of Counselling*, 2(1), pp. 103-109.
- Oxford Business Group, 2009. *The Report: Brunei Darussalam*, Oxford, United Kingdom: Oxford Business Group.
- Palincsar, A. S., 1998. Social Constructivist Perspectives on Teaching and Learning. *Annual Review Psychology*, Volume 49, pp. 345-75.
- Paltridge, B., 2012. Discourse Analysis: An Introduction. London: Bloomsbury.
- 121. Papaja, K., 2013. Analysing types of classroom interaction in CLIL. *Glottodidactica. An International Journal of Applies Linguistics*, 38(1), pp. 43-52.
- Pennington, M. C., 1999. Framing bilingual classroom discourse: lessons from Hong Kong secondary school English classes. *International Journal of Bilingual Education and Bilingualism*, 2(1), pp. 53-73.
- 123. Piaget, J., 1952. *The Origins of Intelligence in Children*. New York: International Universities Press, INC..
- 124. Politeknik Brunei (PB), 2017. Academic Programme. [Online] Available at: <u>http://www.pb.edu.bn/academicprogramme.html</u> [Accessed 6 July 2017].
- Politeknik Brunei (PB), 2019. *Politeknik Brunei Home*. [Online] Available at: http://www.pb.edu.bn/SitePages/home.aspx
 [Accessed 6 August 2019].

- 126. Richmond, V. P. & McCrosskey, J. C., 2012. *Power in the Classroom: Communication, Control and Concern.* New Jersey: Routledge.
- Richter, K., 2019. English-Medium Instruction and Pronunciation. Bristol: Multilingual Matters.
- 128. Rogers, C. R., 1951. *Client-centred Theraphy*. London: Constable.
- 129. Rolfe, A. & Cheek, B., 2012. Learning Styles. Innovait, Oxford University Press Journal, 5(3), pp. 176-181.
- Rosenberg, M. B., 2003. Non-Violent Communication: A Language of Life. California: Puddle Dancer Press.
- Ruddock, J. & McIntyre, D., 2007. Improving Learning through Consulting Pupils. New York: Routledge.
- 132. Rudduck, J. & Fielding, M., 2006. Student Voice and the Perils of Popularity. *Educational Review*, 58(2), pp. 219-231.
- Salbrina, S. & Deterding, D., 2013. Brunei English: A new variety in Multilingual society. Dordrecht: Springer.
- 134. Schreiber, L. & Valle, B., 2013. Social Constructivist Teaching Strategies in the Small Group Classroom. *Small Group Research*, 44(4), pp. 395-411.
- Seah, J., 2011. Teaching with a Difference Teaching with a Difference.
 [Online]
 Available at: < <u>http://www.bt.com.bn/edu-bt/2011/01/08/teaching-difference-teaching-difference></u> [Accessed 10 August 2011].
- 136. Seedhouse, P., 2004. *The interactional architecture of the language classroom: a conversation analysis perspective.* Blackwell: Malden.
- 137. Sercombe, P., 2007. Small Worlds: the language ecology of the Penan in Borneo. In: C. Angela, M. W. Peter & N. H. Hornberger, eds. *Encyclopedia of language and education: Ecology of language*. Amsterdam: Kluwer, pp. 183-193.

- Sert, O., 2015. Social Interaction and L2 Classroom Discourse. Edinburgh: Edinburgh University Press.
- Sert, O., 2019. Classroom Interaction and Language Teacher Education. In: S.
 Walsh & S. Mann, eds. *The Routledge Handbook of English Language Teacher Education*. London: Routledge, pp. 216-238.
- Sinclair, J. & Coulthard, R. M., 1975. *Toward an Analysis of Discourse*. Oxford: Oxford University Press.
- 141. Sloth-nielsen, J., 2008. Children's Rights in Africa, a Legal Perspective. Burlington: Ashgate.
- 142. Smith, J., 2010. *Talk, Thinking and Philosophy in the Primary Classroom*.Exeter: Learning Matters Ltd.
- 143. Strauss, S. & Feiz, P., 2013. Discourse Analysis: Putting Our Worlds into Words. New York: Routledge.
- Stubbs, M., 1983. Discourse Analysis: The Sociolinguistic Analysis of Natural Language. Chicago: The University of Chicago Press.
- 145. Sun, D., 2014. From Communicative Competence to Interactional Competence: A New Outlook to the Teaching of Spoken English. *Journal of Language Teaching and Research*, 5(5), pp. 1062-1070.
- 146. Thomas, E., 1997. Developing a culture-sensitive pedagogy: Tackling a problem of melding 'global culture' with existing cultural contexts. *International Journal of Education Development*, 17(1), pp. 13-26.
- 147. Tsui, A. B. M., 2004. Medium of Instruction in Hong Kong: oe country, two systems, whose language?. In: J. W. Tollefson & A. B. M. Tsui, eds. *Medium of Instruction Policies: which agenda? whose agenda?*. Mahwah, N.J.: Lawrence Erlbaum, pp. 97-116.
- Turuk, M. C., 2008. The Relevance and Implications of Vygotsky's Sociocultural Theory in the Second Language Classroom. *ARECLS*, Volume 5, pp. 244-262.

- 149. Universiti Brunei Darussalam (UBD), 2011. *About UBD*. [Online] Available at: <u>http://www.ubd.edu.bn</u> [Accessed 7 December 2013].
- 150. Univerisiti Brunei Darussalam (UBD), 2016. Degree Programmes. [Online] Available at: <<u>http://www.ubd.edu.bn/admission/undergraduate/gennext-degree-programme/degree-programmes></u> [Accessed 24 July 2019].
- 151. University Brunei Darussalam (UBD), 2019a. GENnext Degree Programme.
 [Online]
 Available at: <u>http://www.ubd.edu.bn/admission/undergraduate/gennext-degree-programme/</u>[Accessed 6 August 2019].
- 152. University Brunei Darussalam (UBD), 2019b. *Organisation*. [Online] Available at: <u>http://www.ubd.edu.bn/about/organisation [Accessed 6 August 2019]</u>.
- 153. Universiti Islam Sultan Sharif Ali (UNISSA), 2017a. Vision, Mission and Objectives. [Online] Available at: <u>http://www.unissa.edu.bn/about-us/corporate-profile/motto-vision-mission-objectives/</u> [Accessed 21 May 2019].
- Universiti Islam Sultan Sharif Ali (UNISSA), 2017b. *Programmes Offered*.
 [Online] Available at: <u>http://www.unissa.edu.bn/future-student/programmes-offered/</u>
 [Accessed 21 May 2019].
- 155. Universiti Teknologi Brunei (UTB), 2017. *The University*. [Online] Available at: <u>http://www.utb.edu.bn/universiti-teknologi-brunei/</u> [Accessed 15 May 2017].
- 156. Vaish et al, n.d. Language and social capital in Singapore. In: L. Lim, A. Pakir & L. Wee, eds. *English in Singapore: Modernity and management*. Hong Kong: Hong Kong University Press, pp. 159-180.
- 157. van Lier, L., 1988. *The Classroom and The Langauge Learner*. London: Longman.
- 158. Vygotsky, L. S., 1978. *Mind in Society: The Development of Higher Psychological Processes.* Cambridge, MA: Harvard University Press.

- 159. Vygotsky, L., 1987. Thinking and Speech. In: R. W. Rieber & A. S. Carton, eds. *The Collected Works of L.S. Vygotsky*. New York: Plenum, pp. 39-385.
- 160. Walsh, S., 2006. *Investigating Classroom Discourse*. London: Routledge.
- 161. Walsh, S., 2011. Exploring Classroom Discourse: Langauge in Action. London: Routledge.
- 162. Walsh , S., 2012. Conceptualising Classroom Interactional Competence. *Novitas-ROYAL (Research on Youth and Language)*, 6(1), pp. 1-14.
- 163. Walsh, S., 2013. Classroom Discourse and Teacher Development. Edinburgh: Edinburgh University Press.
- 164. Walsh, S. & Mann, S., 2015. Doing Reflective Practice: Data-led Way Forward. *ELT Journal, Oxford University Press*, 69(4), pp. 351-362.
- 165. Walsh, S. & O'Keeffee, A., 2010. Investigating Higher Education Seminar Talk. *Novitas-ROYAL (Research on Youth and Language)*, 4(2), pp. 141-158.
- 166. Wang, W., 2019. Code-Switching and its Role in Language Socialization. International Journal of Bilingual Education and Bilingualism, 22(7), pp. 787-800.
- 167. Wannagat, U., 2007. Language through L2 Content and Language Integrated Learning (CLIL) and English as Medium of Instruction (EMI). *International Journal* of Bilingual Education and Bilingualism, 10(5), pp. 663-682.
- Wasik, B. & Hindman, A., 2018. Why Wait? The Importance of Wait Time in Developing Young Students' Language and Vocabulary Skills. *The Reading Teacher*, 72(3), pp. 369-378.
- Watanabe, N., 2017. Accelerated Cognitive Development- Piaget's Conservation Concept. *Journal of Educational Developmental Psychology*, 7(2), pp. 68-74.
- 170. Westwood, P. S., 2008. *What Teachers Need to Know About Teaching*. Victoria: Australian Council for Educational Research.

- 171. Wheeler, S. & McLeod, J., 1996. Person-centred and Psychodynamic Counselling: A dialogue. In: *ICASSI (International Committee for Adlerian Summer Schools and Institutes)*. Cambridge: Warwick University.
- 172. Wilkinson, D. & Birmingham, P., 2003. Using Research Instruments: A Guide for Researchers. London and New York: Routledge Falmer.
- 173. Wiseman, R., 2009. 59 Seconds: Think a Little Change a Lot. London: Macmillan.
- 174. Woolner, P., 2010. *The Design of Learning Spaces*. York Road: Continuum International Publishing.
- 175. Wragg, T., 1999. An Introduction to Classroom Observation. 2nd ed. London: Routledge Falmer.
- Xhafer, B. & Xhaferi, G., 2011. Developing Learner Autonomy in Higher Education in Macedonia. *Procedia Social and Behavioural Sciences*, Volume 11, pp. 150-154.
- 177. Young, R., 2003. Learning to talk the talk and walk the walk: Interactional competence in academic spoken English. *North Easter Illinois University Working Papers in Linguistics*, Volume 2, pp. 26-44.
- 178. Young, R., 2008. Language and Interaction: An advanced resource book. London: Routledge.
- 179. Young, R., 2014. What is interactional competence?. AL Forum: The Newsletter of the TESOL Applied Linguistics Interest Section.
- Zeichner, K. M. & Liston, D. P., 1987. Teaching student teachers to reflect. *Harvard Educational Review*, 57(1), pp. 23-48.
- 181. Zeichner, K. M. & Tabachnick, B. R., 1991. Reflections on reflective teaching. In: *Issues and practices in inquiry-oriented teacher education*. London: Falmer Press.