



EXPLORING TRANSITION PEDAGOGY AT THE TERTIARY LEVEL: A CASE
STUDY OF NEWLY ENROLLED FIRST YEAR EDUCATION STUDENTS'
EXPERIENCE IN WRITING AND THINKING WITHIN THE GENRE OF THE
PERSUASIVE ESSAY IN A COMPARATIVE ANALYSIS OF LITERACY
PEDAGOGY

A Thesis submitted by

Lynette Dorothy Pears Faragher, BA, TTHD, BA Hons, MEd

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Abstract

The widespread policy of inclusion in higher education institutions in the western world has enabled an increasingly wide range of entrants to gain access to university. Many of these entrants come from backgrounds where they would not have had preparation for the culture and demands of university study. One of the areas much foregrounded is their supposed lack of appropriate linguistic skills. In the case of Australia that implies English language skills. It is often assumed by academics that poor language skills mean that they do not have the necessary intellectual and thinking skills either. A case study was designed in which a sample of first year education student writing and interviews was analysed according to the taxonomy of higher order thinking skills developed by Marzano and Kendall, and Costa. Integrative Research, strongly influenced by the principles of *bricolage*, was used to provide a theoretical framework for the study. The higher order thinking and academic literacy skills they used were identified and conclusions drawn based on this analysis. It is argued in this thesis that if that information is used in curriculum planning in the future that Higher Education progression statistics could be enhanced.

Thesis certification page

This Thesis is entirely the work of Lynette Dorothy Pears Faragher except where otherwise acknowledged. The work is original and has not previously been submitted for any other award, except where acknowledged.

Principal Supervisor: Professor Shirley O'Neill

Associate Supervisor: Dr Hendrik Huijser

Student and supervisors' signatures of endorsement are held at the University.

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Table of Contents

Abstract	ii
Thesis certification page	iii
Acknowledgements	iv
Table of Contents	v
List of Figures	xi
List of Tables.....	xii
1. CHAPTER ONE: INTRODUCTION	1
1.1. Background.....	1
1.2. Research Problems.....	1
1.3. Pilot Study	2
1.4. The Context	2
1.5. Attrition.....	3
1.6. Transition Pedagogy	5
1.7. Research Questions.....	6
1.8. Thesis Map.....	8
1.9. Summary.....	9
2. CHAPTER TWO: LITERATURE REVIEW	10
2.1. Introduction.....	10
2.2. Transition Pedagogy	10
2.2.1. Diversity.....	12
2.2.2. Engagement.....	24
2.2.3. Embedded curriculum.....	26
2.3. The UK Experience	28
2.4. The US Experience	29
2.5. The Australian Experience	30
2.5.1. The Bradley Review	30
2.5.2. The Report on Good Practice Principles.....	31
2.5.3. Students in transition.....	31
2.5.4. The classroom.....	32
2.6. Academic Literacies	33
2.6.1. Academic discourse.....	33
2.6.2. Academic writing.....	38

2.6.3. Vocabulary count.....	42
2.6.4. Idiosyncratic expressions.....	45
2.6.5. Linguistic Skills and Academic Success	46
2.6.6. Higher Order Thinking Skills.....	48
2.6.7. Metaphor.....	52
2.7. Summary.....	53
3. CHAPTER THREE: THEORETICAL FRAMEWORK	54
3.1. Introduction.....	54
3.2. Higher Order Thinking Skills (HOTS) – Marzano and Kendall.....	56
3.2.1. Self system thinking – the top level of the taxonomy.....	57
3.2.2. Metacognition.....	60
3.2.3. Knowledge utilization.....	62
3.2.4. Analysis.....	63
3.2.5. Comprehension.....	65
3.2.6. Retrieval.....	66
3.3. Higher Order Thinking Skills – Costa.....	68
3.3.1. Generating new ways of viewing a situation outside the bounds of standard conventions.....	68
3.3.2. Focusing mental energy on understanding others and empathising.....	69
3.3.3. Understanding and paraphrasing others’ thoughts.....	69
3.3.4. Setting aside judgements, solutions and autobiographical responses.....	69
3.4. Metaphors also Grammatical Metaphors which Connect with Academic Discourse.....	70
3.5. Conclusion to Higher Order Thinking Skills.....	72
3.6. Academic Discourse	73
3.7. Academic Writing.....	76
3.8. Vocabulary Count.....	78
3.9. Idiosyncratic Language.....	78
3.10. Summary	78
4. CHAPTER FOUR: METHODOLOGY	80
4.1. Introduction.....	80
4.2. Research Design	80
4.3. Data Collection, Processes, Ethics and Achievements.....	81
4.4. Research Methods Adopted and Why They Were	83
4.4.1 Quantitative analysis – yes or no?.....	84
4.4.2. Qualitative research.....	85

4.5. Method of Analysis.....	103
4.5.1. NVivo.....	104
4.5.2. Analysing the essays – some of the adaptations made.	104
4.5.3. The interviews.....	105
4.6. How the Vocabulary Count Was Implemented.....	107
4.7. Summary.....	108
5. CHAPTER FIVE: HIGHER ORDER THINKING SKILLS.....	110
5.1. Introduction.....	110
5.2. The “Bricologic”.....	113
5.3. Interpreting results of essays and interviews - Marzano, Kendall and Costa.....	114
5.3.1. The self system (including interviews).....	114
5.3.2. Metacognition including interview results.	128
5.3.3. Knowledge utilization.	142
5.3.4. Analysis.	148
5.3.5. Comprehension.	166
5.3.6. Retrieval.....	172
5.3.7. Metaphors also grammatical metaphors which connect with academic discourse.	174
5.3.8. Costa’s higher order thinking skills.....	177
5.4. Summary.....	188
6. CHAPTER SIX: ACADEMIC LITERACIES: DISCOURSE AND WRITING.....	190
6.1. Introduction.....	190
6.2. Academic Writing.....	190
6.2.1. Long complicated noun phrases with nouns more often followed by prepositional phrases than relative clauses.....	192
6.2.2. Long nouns, big words, and a tendency to use words of Latin or Greek origin.	192
6.2.3. Lots of different words (especially compared to friendly conversation with its limited range of often repeated words).	193
6.2.4. Simple present tense verbs in generalizations and statements of theory.	193
6.2.5. A limited range of verbs with <i>be</i> , and <i>have</i> and <i>seem</i> often repeated.....	194
6.2.6. Frequent use of the passive voice, usually without a <i>by</i> phrase.....	194
6.2.7. Use of adverbial phrases to indicate location inside the text (e.g. in the next chapter, etc.)	195
6.3. Results of Essays - Textual Metadiscourse.....	195
6.3.1. Transition markers—mainly conjunctions and adverbial phrases expressing relations between main clauses (e.g. and, but, in addition, thus).	195
6.3.2. Frame markers—explicitly refer to discourse acts or text stages (e.g. finally, to repeat, our aim here, we try first, next, finally, to conclude).	196

6.3.3. Endophoric markers—refer to information in other parts of the text (e.g. as noted above, see Figure..., refer to the next section).....	197
6.3.4. Evidentials—refer to information from other sources (e.g. according to X, Z states ...).	197
6.3.5. Code glosses—supply additional information by rephrasing, explaining or elaborating what has been said (e.g. namely, for example, such as, in other words).	198
6.4. Results of Essays - Interpersonal Metadiscourse	199
6.4.1. Hedges—withhold the writer’s complete commitment to a proposition, recognizing, in this way, the possibility of the readers’ alternative viewpoints (e.g. might, perhaps, possible).	200
6.4.2. Boosters—emphasize the certainty of the writer’s claim, closing alternatives (e.g. definitely, obviously, of course, demonstrate).	200
6.4.3. Attitude markers—express the writer’s attitude to a proposition (e.g. unfortunately, hopefully, surprisingly, I agree).	202
6.4.4. Self-mentions—refer to author(s) explicit presence in the text (e.g. I, we, my, our).....	203
6.4.5. Engagement markers—explicitly build relationship with the reader (e.g. you, your, consider, note, you can see that).	204
6.5. Results of Essays - Appropriate Use of Discipline Jargon - Technicality	204
6.6. Results of Essays - Idiosyncratic Language.....	205
6.7. Results of Essays - Vocabulary Count.....	210
6.8. Summary	211
7. CHAPTER SEVEN: EXTRA DESCRIPTORS FROM THE INTERVIEWS ...	213
7.1 Introduction.....	213
7.2. Student Interviews	213
7.2.1. Academic discourse, expectations of the culture of the university and of university staff.	214
7.2.2. Referencing.....	221
7.2.3. Writing.....	221
7.2.4. Information Technology.	222
7.2.5. Reading.....	223
7.2.6. “Getting the right answer” and self belief.	224
7.2.7. Social and academic engagement.	228
7.2.8. Understanding the course.	229
7.2.9. Assessment.....	232
7.2.10. Students personal backgrounds.	239
7.3. Staff Interviews - Teacher Education	240
7.3.1. Appropriate relevant courses.....	241
7.3.2. Teacher talk – “dialogic pedagogy”.	245
7.3.3. University to school (classroom) – TEMAG.....	247
7.3.4. Schoolwide pedagogy.	254

7.3.5. Assessment.....	255
7.3.6. Critical thinking.....	257
7.3.7. Modelling.....	258
7.3.8. Scaffolding.....	259
7.3.9. HOTS – Marzano et al.	259
7.3.10. Engaging curriculum.....	264
7.3.11. Virtual uni bag.....	265
7.4. Summary	266
8. CHAPTER EIGHT: ANSWERING THE QUESTIONS.....	267
8.1. Introduction.....	267
8.2. The Contents of the VUB	268
8.2.1. The self system.....	271
8.2.2. Metacognition.....	273
8.2.3. Costa’s descriptors.....	274
8.2.4. Knowledge utilisation.....	274
8.2.5. Analysis and comprehension – symbolising.....	277
8.2.6. Metaphors.....	277
8.2.7. Summary of HOTs contents of VUBs.....	277
8.3. Academic Language and Discourse.....	278
8.4. Other Challenges Experienced by the SWs.....	280
8.5. Staff Perceptions of Importance of HOTS.....	281
8.6. Summary	282
9. CHAPTER NINE – CONCLUSION	286
9.1. Introduction.....	286
9.2. Key Findings.....	286
9.2.1. Transition Pedagogy (TP) or pedagogy for transition (PFT).....	286
9.2.2. Academic literacies.....	288
9.2.3. Teacher education.....	289
9.3. Strengths and Limitations of the Study	291
9.3.1. Case study.....	291
9.3.2. Number of data.....	292
9.3.3. Limited scope.....	292
9.3.4. L2 interview.....	293
9.4. Contribution to Knowledge	293
9.4.1. Virtual uni bag (VUB).....	293
9.4.2. Marzano, Kendall and Costa – HOTS.....	294
9.4.3. Pedagogy for transition – PFT.....	294

9.4.4. Academic discourse vs student voice	295
9.5. Implications for Practitioners	295
9.5.1. VUB	295
9.5.2. Application of HOTS in planning and assessment	296
9.6. Future Research	296
9.6.1. Value of the use of graphic organisers.	296
9.6.2. Knowledge utilisation.	296
9.6.3. Rubric development.	297
9.6.4. Theory to be tested over a wider range of data.....	297
9.7. Conclusion	298
REFERENCES.....	299
APPENDICES	323
Appendix 1	323
Appendix 2.....	324
Appendix 3.....	326

List of Figures

Figure 1.1. Thesis Map	7
Figure 3.1. Theoretical Framework.....	55
Figure 3.2. Marzano’s Levels.....	57
Figure 5.1. Overview of Data Analysis.....	112
Figure 5.2. Results of Costa’s Descriptors in Essays (E) and Interviews (I).....	188
Figure 5.3. Results of HOTS, Marzano and Kendall and Costa from Essays and Interviews.....	188
Figure 6.1. Percentage of academic writing and discourse in the essays.....	192
Figure 7.1. Challenges Experienced by the Students.....	214
Figure 7.2. Issues Raised and Discussed in the Staff Interviews.....	241
Figure 8.1. Levels of HOTS - Marzano and Kendall and Costa.....	270
Figure 8.2. Academic Literacies	278
Figure 8.3. Challenges Experienced by New Students	280

List of Tables

Table 5.1	Self System Thinking.....	128
Table 5.2	Metacognition	142
Table 5.3	Knowledge Utilisation	148
Table 5.4	Generalisation	159
Table 5.5	Specifying	165
Table 5.6	Analysis.....	166
Table 5.7	Comprehension	172
Table 5.8	Retrieval.....	174
Table 5.9	Understanding and Empathising	182
Table 5.10	Understanding and Paraphrasing	185
Table 5.11	Costa’s Skills	187
Table 6.1	Distribution of Coding for Idiosyncratic Language	210
Table 8.1	Approximate Comparative Levels of Marzano and Kendall and Costa’s Criteria.....	269
Table 8.2	Evidence of Knowledge Utilisation	275

CHAPTER ONE: INTRODUCTION

If I had to reduce all of educational psychology to just one principle, I would say this: the most important single factor influencing learning is what the learner already knows. Ascertain this and teach him [sic] accordingly. (Ausubel, Novak, & Hanesian, 1978, cited in Ashwin & Trigwell, 2012, p. 449)

1.1. Background

This project arose out of my deep concern about the anxiety experienced by the many first year students I supported in my role of learning adviser. Many of them were mature age students, few were traditional students. Most had had no previous experience of life and work in the university and were overawed and frustrated by its demands that most of the time they did not know about and only discovered when their first assignments were returned. It was also clear to me from conversation with such students that they had a range of skills that had brought them to university and which were possibly not being used in their studies. They felt disempowered in this environment, whereas in their other lives they felt in control and confident. These experiences resonated strongly with the dissertation I had written for my MEd in South Africa where I had analysed African L2 matriculants' essays using Vygotskian tools to demonstrate that, although their English writing was not perfect, they were thinking well enough to be described as "self-regulated".

1.2. Research Problems

The research problem here centred on the experiences of first year undergraduate education students in their first major assignment and what skills they used and needed, to do this successfully. They were all starting out in academia and had had little or no prior experience of university. The data here are drawn from a basic course in teaching literacy which was, at the time, a foundation course, studied by all education students. This is in the context of the growing diversity of student populations and increasing pressure on students and institutions to limit attrition and enhance progression and retention. There have been extensive longitudinal studies conducted and much information accumulated that reflect the first-year experience but nothing so far that provides insight into the actual experience of first year

students in relation to their interaction with a specific curriculum and academic activity. Much has been said and researched about the language needs of international students and others who might be underprepared for study at institutions of higher education but little about the higher order thinking skills they need and that they might already have. To identify these and other academic literacies is part of the purpose of this study.

1.3. Pilot Study

A pilot study was conducted to test the viability of a study such as this present one and the results presented at the AALL Conference in Melbourne in 2011 (Faragher, 2011). It was a trial run but the results suggested that the use of a taxonomy of thinking skills would be a viable approach to discover the skills that first year students used in writing their first major assignment in a first-year course in literacy in their teacher education programme. The pilot study included some analytical tools such as a vocabulary count, metaphors and idiosyncratic expressions, as well as others relating to academic writing that were also be used in this study.

1.4. The Context

The context of this study is an unstable terrain, as government policies related to the sector have changed significantly during the period of the study. In addition, student demographics have changed as well as international perspectives. In the Executive Summary of the *First Year Experience in Australian Universities: Findings from 1994- 2009* (James, Jennings, & Krause, 2010) state:

Future studies will take place in a vastly different tertiary education environment if the federal policy targets for expansion and social inclusion are progressively being achieved. The transition, teaching, support and curriculum responses of universities in the first year will be pivotal in achieving the new national goals that have been set for the higher education sector.

They mention further changes in the student demographic, for example that the online mode of delivery is being used more, especially for students from rural and remote areas and low SES and part-timers, and that there has been a significant

decline in the time students spend on campus and course contact hours have consequently declined. Numbers of students in paid work have also increased; nearly two-thirds of respondents work to support basic needs. Still, according to James et al. (2010, p. 3) there has been a significant increase in the percentage of students who believe that “the quality of teaching is generally good”. This might suggest that the universities are becoming more student-focussed in their pedagogy and that they are adjusting to satisfying incoming cohorts, which include the changed demographic. Feedback continues to be an issue with one-third of students believing they do not receive helpful feedback, while only about a quarter of them thought that the staff take an interest in their progress. Some interesting comparisons surfaced between mature age students who had more positive attitudes to their learning experiences than traditional students, while international students felt the same as the mature age students and were also more engaged in their studies than domestic students. The authors’ forecast of continuing growth in the number of currently defined at risk students, is in line with the national targets:

...that by 2025, 40 per cent of all 25-34-year-olds will have attained a qualification at bachelor level or above and that by 2020, 20 per cent of undergraduates will be people from low socioeconomic status backgrounds (James et al., 2010, p. 4).

This is borne out by the most recent statistics quoted above. There have also been changes of government and other significant international events, like the Global Financial Crisis, since 1990, and while the widening participation agenda remains in place, the rhetoric surrounding it has changed a little from a focus on social justice to one on economics. Part of that is about the income from “international education exports” and part of it is to do with Australia’s need for skilled professionals to sustain and grow the economy (Cadence, 2016; Deloitte, 2015).

1.5. Attrition

These developments have also led to increased concern about attrition, especially in the first year, as many of those students who have entered the universities without adequate preparation confront the challenges and drop out. James et al. (2010), in

their survey of first year students, found that fear of failure was a strong motivator for students thinking about dropping out and in addition,

For many students, the submission of the first assignment can be a very stressful experience because it brings together a range of requirements that may be quite alien to students who may not have previous experience of university study (James et al., 2010, p. 28).

Concern about attrition has led to more government research and reports and individual institutions have also looked at their issues and, like government, have counted the costs. Jackson (2016), the Deputy Chief Executive of Universities Australia recently produced an opinion piece on attrition in which she spelt out the fact that about 15% of students leave university before graduating. The numbers are hard to track because some of them may return later and complete. However, she claims that this 15% is a stable figure. She then discusses the uncapped number of places, which has expanded access for “tens of thousands” more Australians, which includes some from disadvantaged backgrounds. The data show that universities with the most mature age and part-time students have the biggest drop-out rates, which is to be expected. The most significant reasons for dropping out were not to do with course content or choice of degree but rather with their personal lives. Universities have strongly recommended to the current Turnbull government that their proposed budget cuts should not include the Higher Education Participation and Partnerships program (HEPP) that funds a wide range of support programmes. On the other hand, Milburn (2012) three years earlier, broke the figures up and came up with different conclusions to Jackson (2016). She quoted Professor Karen Nelson as saying that the cost to the community and the national economy is worth billions of dollars in lost productivity, earnings and skill levels. In addition, Pitman and Koshy (2015) refer to the the Selected Higher Education Statistics, which reveal an increase in attrition, or expressed differently, in the percentage of students commencing in 2013 who neither completed nor re-enrolled in 2014. “In 2013, the national figure for domestic commencing Bachelor students in all higher education providers was 14.79%, compared to 13.43% in 2012. This attrition rate is the highest it has been since 2005, when it was 15.04%.” They suggest that that the newly-implemented demand-driven system could account for this increase in attrition. However, between 2010 and 2014 enrolments have increased by almost 20%.

As of 2014, the removal of caps has allowed an additional student to enter the system for every four positions available at 2010 levels of enrolment. For each student who commenced in 2013, but did not return in 2014, there were many more who will successfully complete. They would not have had the opportunity to do so under the previous, capped, system.

These writers expand into a discussion about the possibilities of pre-enrolment support and post-enrolment support to assist this more diverse student population to persist and complete their studies. In the case study presented in this thesis more will be uncovered about academic literacies, including HOTS and academic writing skills that students have when they enrol. This may then lead to suggestions on how those skills can be capitalised on and used pedagogically to enhance the teaching curriculum and give more students ‘a fair go’. Regardless of the details of the statistics, attrition is a serious enough problem to have engaged the minds and energies of significant numbers of academics over a long period (Martin & Koob, 2017).

1.6. Transition Pedagogy

At Queensland University of Technology a team of researchers and academics developed a theoretical construct –Transition Pedagogy (TP)¹ – designed to alleviate attrition and assist retention and progression (Kift, 2008; Kift, 2009a, 2009b; Kift, Nelson, & Clarke, 2010; Nelson & Kift, 2005; Nelson, Kift, Humphreys, & Harper, 2006). This has become the received wisdom in the First Year Experience and many universities have adopted the model and developed their own particular variations. However, attrition remains an issue and many new students continue to find their first experiences of university overwhelming. TP focusses strongly on the students’ lives outside the classroom, student support services continue to be heavily used, and accounts of ways to assist students to transition continue to multiply. However, there is currently very little evidence in the literature that suggests that students’ existing skills and knowledge are validated and used in curriculum planning.

¹ Later, after 4.1., TP refers to pedagogy for transition, PFT, as is explained there.

To find ways of discovering what the students bring with them in their *virtual uni bags* (VUB)s², their existing skills and knowledge, the following Research Questions were asked, followed by an extensive Literature Review.

1.7. Research Questions

1. How do first year education students experience the activity and demands of academic literacies in the context of writing critical comparative analysis in literacy pedagogy?
2. How do lecturers perceive the task of first year education students' writing of critical comparative analysis in their focus on teaching literacy pedagogy, and how do they perceive the challenges of TP?
3. How can TP best enhance first year education students' ability to engage with the demands of academic literacies in the writing of comparative analysis in literacy pedagogy.

² It is a construct developed by Thomson and Hall (2008), relating in their research to the skills and knowledge children bring with them when they start school. It is adapted here to apply to university students and the skills and knowledge they bring with them and is an ongoing metaphor central to this research.

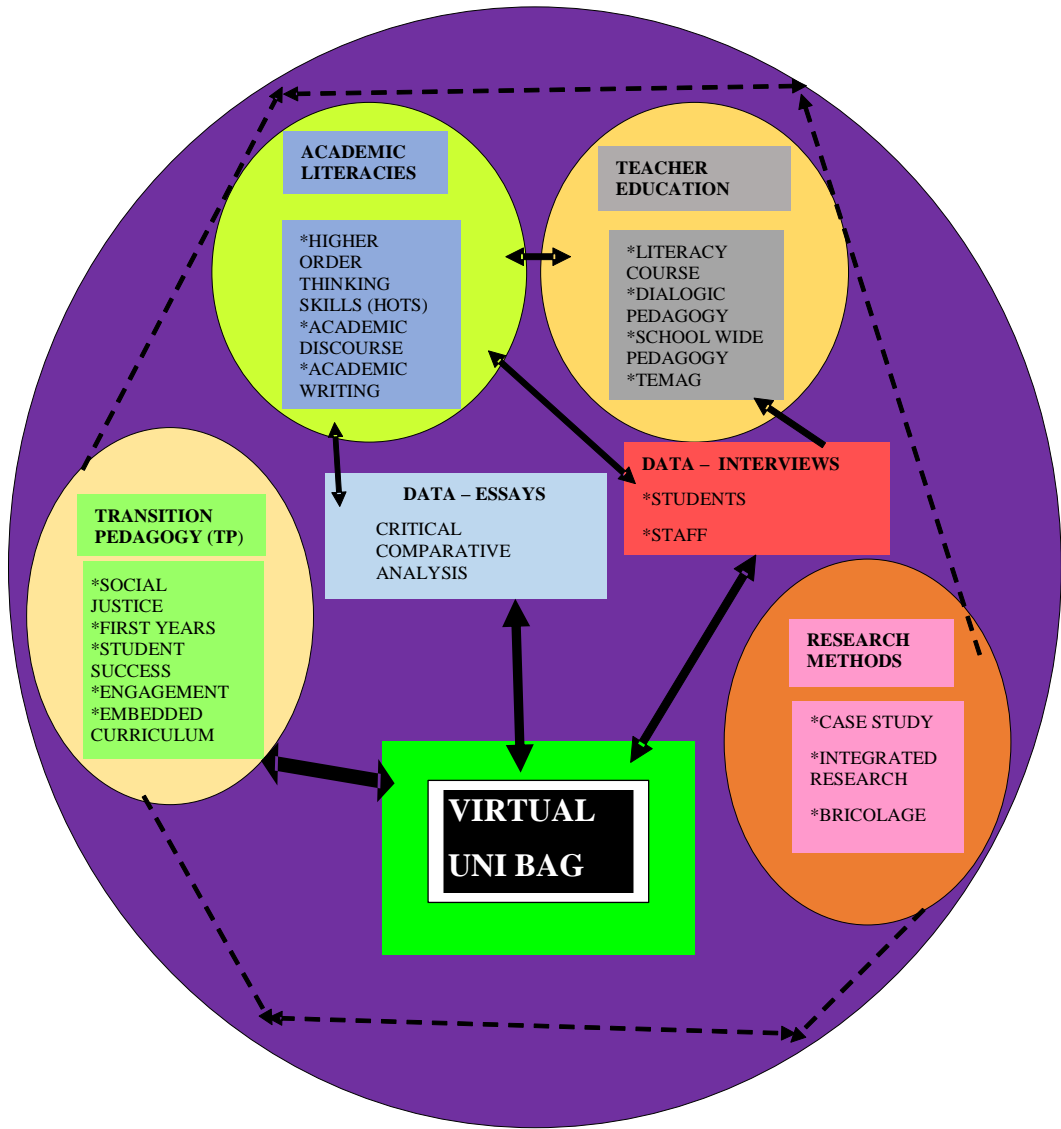


Figure 1.1. Thesis Map

1.8. Thesis Map

Figure 1.1 provides a guide for the reader and shows how the various aspects of the complexity of the thesis relate to each other. The total context is set in TP with its emphases on social justice, first years, student success, engagement and embedded curriculum. The dotted lines show how this encompasses the whole. They also show how the research methods affect the whole thesis. The solid arrows show how the virtual uni bag contains the essay and interview data which reflect the skills and abilities students bring with them. The staff interact with those qualities in the context of a teacher education programme in assessing the essay in the context of the academy demands regarding academic literacies. In this thesis academic literacies consist of three elements; higher order thinking skills, academic discourse and academic writing.

Research question one relates to the experience of the SWs in writing their critical comparative essays. To discover this their writing had to be analysed and placed in the context of the demands of the university regarding academic literacies. The literature about reasons for attrition and various ways in which attrition is countered especially concerning attitudes to the writing and linguistic skills students have when they start led into the concept of the *virtual uni bag* (VUB). Constructivist pedagogy requires working with what the student already knows and can do hence the VUB which contains the skills and knowledge new students bring with them when they start. To identify those skills, data was collected from student writing and staff and student interviews. The data was then analysed in terms of a case study using integrated research in the paradigm of bricolage. The results of the analysis showed evidence of HOTS as well as academic literacies and aspects of teacher education.

Research question three asks how TP can enhance the writing experience of first years and this is answered by identifying the contents of the VUB so that teaching academics can use that information regarding actual academic skills, HOTS as well as social, cognitive and cultural capital, and enhance the skills in their teaching.

1.9. Summary

This research has been conducted in the context of the need to discover how to enhance the experience of non-traditional students³ as soon as they enter the university and are confronted with their first big assignment. This might seem to reflect the national equity agenda although that has ‘softened’ and economic drivers seem to be more powerful now. Attrition is still an issue of concern despite different perspectives expressed, and although TP is no longer in the forefront of studies of the first year experience its principles of diversity, engagement and embedded institutional curriculum remain important in current thinking. This study aims to provide information relating to the HOTS and academic literacies that new students bring with them when they start at university so that curriculum developers and lecturers can provide learning experiences that will enhance their experiences and enable them to progress and succeed thus in diminishing the attrition rates of HEIs.

³ The term non-traditional students encompasses a range of descriptors that includes, mature age, FIF, women in non-traditional areas, people from non-English speaking backgrounds, people with a disability, rural and isolated students and people from socio-economically disadvantaged backgrounds. Where it is important for a specific term to be used it will be. Otherwise it is almost assumed that the term includes all students who are under-prepared because of their life circumstances and would benefit from the results of this study.

CHAPTER TWO: LITERATURE REVIEW

2.1. Introduction

This Literature Review reflects the Theoretical Framework (Figure 3.1) which will be discussed in Chapter Three. It shows the construct of TP as the larger context for the study with its given emphases of: attrition, diversity, curriculum and engagement. The study then focuses on the identification of the academic literacies required for success in university. They include academic discourse which includes academic writing and higher order thinking skills (HOTS). The data to be used to identify these skills is first year student writing in the genre of comparative analysis. The research questions prefigure this framework. Part of TP is knowing the students and their perceived needs and motivations. The issue of engagement and embedding it in the curriculum follows and then literature from the UK and the US, who have similar HE contexts, will be drawn on to inform the discussion. This is followed by literature reflecting the Australian experience which leads to the issue of academic literacies and the expectations of universities in that regard and then how to analyse student writing in ways that acknowledge and respect their literacies and thinking skills.

2.2. Transition Pedagogy

TP as a construct grew out of concern about attrition rates among first year students at university. Attrition statistics tell us that many students are at risk. At risk students are those who are likely to drop out before completing their first year of study. In January 2017 statistics were published that report that one third of students enrolled at university will not complete their courses within six years (Martin & Koob, 2017). They mention that this also represents a large debt to the Commonwealth. On the other hand, Universities Australia Chief Executive Belinda Robinson (Robinson, 2016), as mentioned earlier, cited a recent discussion paper produced by an expert panel in which they problematised the issue of retention and completion and claimed that the situation is not a crisis. It seems furthermore, that there is expectation that the government will assist universities to support students most at risk. The cost of

attrition to Higher Education Institutions (HEIs) and governments is enormous and working on ways to prevent it is a significant industry in academia (Milburn, 2012). This was discussed in more detail in 1.5. It is not a new concern in the West and there is also research in other countries where university education has previously been available only for an elite layer of society, and where those historically and traditionally excluded from university education still struggle for access. In the meantime, the western world has developed inclusive and widening participation agendas for their universities and the calls to increase retention and progression have become stronger, casting the spotlight on the different ways in which HEIs tackle this. All universities seek to diminish their attrition rates and enhance their retention and progression rates and they do so by means of programmes that are developed to suit their contexts. Many of the programmes are reported on in organisations like the Association for Academic Language and Learning (AALL), Higher Education Research and Development Society of Australia (HERDSA), the First Year Experience in Higher Education (FYHE) and Students Transitions Achievement Retention and Success (STARS). What programmes seem to have in common is that they are piecemeal and located variously in support units, as well as in faculties, schools, courses, and programmes; and all report varying degrees of successes and failures and strive to be able to work more closely with other colleagues engaged in the same endeavours.

TP is about enabling all students coming into university for the first time to transition from their previous experience into the university, and to become equipped with the tools to be successful in their studies. It focusses on at risk students and in Australia specifically, it has become a defined construct through the work of Sally Kift and her Australian Learning and Teaching Council (ALTC, and later Office for Learning and Teaching (OLT, now also redundant)⁴) team at Queensland University of Technology (QUT) (Kift, 2008, 2009a, 2009b; Kift et al., 2010; Nelson & Kift,

⁴ In the discussion paper ("International student numbers surge to record high," 2017) it is noted that in the 2018 budget, awards for University learning and teaching excellence will be made by Universities Australia thus giving the sector "more responsibility for recognising and rewarding excellence in teaching and learning" (p.49).

2005; Nelson, Kift, Humphreys, & Harper, 2006), where third generation TP was defined as pedagogy that emphasises whole of institution change and the provision of an engaging curriculum for first year students.

Transition pedagogy (Kift & Nelson, 2005) is a conceptualisation that has the optimal capacity to deliver an integrated and holistic [First Year Experience] FYE, when intentionally designed first year curriculum is harnessed to mediate the learning experiences of diverse commencing cohorts (Kift et al., 2010, p. 2).

What is notably lacking in this literature is detail as to what this curriculum is likely to look like in the classroom⁵. Terms such as “engagement” are used liberally but there is little detail and there is likely to be considerable debate as to what it means ‘at the chalk face’ in all the different disciplines. There is literature that describes how changes can and have been made to the pedagogy practised in the classroom. For example, Weimer (2013) in the US, provides significant detail on how to develop and change curriculum to increase student engagement and enhance student learning, and she also provides rich references to how different academics have changed their approaches and courses. However, not much about specific and detailed pedagogical practice is recommended in the Australian literature on the subject.

2.2.1. Diversity.

2.2.1.1. A social justice agenda.

The Australian story began in 1990 with the government discussion paper *A Fair Chance for All*. According to Wingate (2015) two developments have led to the diversification of student populations in English-speaking countries: one is government policy such as *A Fair Chance for All*, and the other is internationalisation. The principles of the government policy mentioned above are contained in the following statement by the Director of the Centre of the Study of Higher Education, University of Melbourne in their review of the participation in

⁵ This term is used to encompass all learning spaces, online, other forms of distance communication, laboratories and so on.

higher education of people from low socioeconomic backgrounds and Indigenous people:

The work of the project team was informed by the principle of individual social justice: access to higher education and success in higher education should not be determined by class, ethnicity, geographical location or other personal characteristics. This principle has underpinned the Australian higher education sector's advanced equity policy framework since its inception in the early 1990s (James, 2008).

As expected, the overall numbers of students in universities have increased since, as has the diversity of university student populations. Wingate (2015) writes about university populations in the Anglophone world increasing dramatically and with that the diversity of their student populations. The latest perspective of the composition of that diversity is contained in a Universities Australia press release by their CEO, Belinda Robinson:

...the majority of university offers in 2016 – 60 per cent – went to students who didn't apply straight from school. That group includes people in the workforce or vocational education seeking to go on to a university qualification. Of the Year 12 applicants who got an offer, nearly a quarter had an Australian Tertiary Admissions Rank (ATAR) over 90, and two-thirds had an ATAR over 70. Conversely, only 2.9 per cent of all offers went to applicants with an ATAR of 50 or less. This equates to 8,215 out of a total of nearly 286,000 offers. "We know that with the right support, students who come into university on a low ATAR can achieve attainment levels comparable with far more advantaged peers (Robinson, 2016).

Sixty percent of new first year students entering university in 2016 will not have had a traditional preparation for university. Add to that the 2.9% who had ATARs of less than 50 and then include the large numbers of international students, and it seems that a large percentage of the new intake for 2016 were non-traditional students and would have been likely to require significant initial support if they were to integrate with the university's expectations and progress. It is notable that no mention is made of increases in Indigenous students nor any specific mention of other equity categories except what is inferred to be mature age amongst those who have not come straight from school to university. Many students mentioned above fall into at risk categories and are expected to require initial support.

2.2.1.2. *At risk categories.*

Who are these diverse students? O’Keeffe (2013, p. 606) identifies some at risk categories (as cited in Heisserer & Parette, 2002, p. 2): they include ethnic minorities, [the] academically disadvantaged, students with disabilities, students with low socio economic status (SES), and probationary students. Some of those categories are echoed in the Australian government’s targets as well. According to McMillan and Western (2000, p. 225) the Australian government discussion paper *A Fair Chance for All* (1990), more than twenty-five years ago, identified six equity groups for priority action: “Aboriginal and Torres Strait Islander people, women in non-traditional areas, people from non-English speaking backgrounds, people with a disability, rural and isolated students and people from socio-economically disadvantaged backgrounds”. According to Norton and Cakitaki (2016) those categories have not changed.

The current statistics show that low SES and Indigenous students are underrepresented in the student demographic. The *Participation and equity* report (James, 2008) contains speculation as to the reasons for this underrepresentation and while financial reasons are suggested for both groups, there are also different and other specifics. For the low SES group, it is suggested that:

(P)eople from low SES backgrounds are more likely to have lower perceptions of the attainability of a university place, less confidence in the personal and career relevance of higher education and may be more likely to experience alienation from the cultures of universities. (p. 3).

The issues for Indigenous people are their “special circumstances”. Nakata (2012), writing about Indigenous students in HE, develops a perspective on those circumstances and develops an Indigenous standpoint theory, which

...is a distinct form of analysis, and is itself both a discursive construction and an intellectual device to persuade others and elevate what might not have been a focus of attention by others...People’s lived experience at the interface is the point of entry for investigation, not the case under investigation (p. I-6).

Nakata (2012) says that this will reveal “the workings of knowledge and how understanding of Indigenous people is caught up and implicated in its work”. He

states two other principles but the one given here is chosen because it resonates with the construct of the VUB, which all students bring with them when they enter the university. He concludes with five take-away points. They have been adapted to apply equally to all students, not only Indigenous students. He recommends that whatever works, should be used in support of the students; secondly, that focus on the here and now must be maintained; thirdly, that future graduates will be working in complex and changing terrains; fourthly, that we need curriculum designs to build on what the students can already do and know; and fifthly, that “educators need themselves to develop their scholarship in contested knowledge spaces of the cultural interface...” (p. I-7). The fourth and fifth points, curriculum design and educators developing their knowledge of the “cultural interface”, resonate strongly with what has come to be known as TP in Australia. TP will be explored in this thesis and provides a useful context. The following statistics support a strong argument for widening participation:

- In 2014–15, new skilled graduates entering the Australian workforce grew the nation’s economic activity by \$26.4 billion (as measured by GDP).
- Every graduate entering the workforce increases Australian GDP by \$124,450.
- Due to higher economic activity driven by new university graduates entering the Australian workforce, government revenue increased by approximately \$5.1 billion in 2014–15 (Cadence, 2016, p. 4).

It seems that all the arguments also strengthen the social justice arguments for making university education more accessible to more of Australia’s population. However, when the statistics for encouraging international students to study in Australia are provided, the economic arguments become stronger and questions about the value to Australia in the longer term might be asked.

2.2.1.2.1. Internationalisation.

According to the OECD (2013), cited by Wingate, (2015) Australia has the highest percentage of international students, out of Australia, Canada, Ireland, the UK and the US, with 19.8% of all enrolments. Between 1999 and 2004, according to Murray (2011, citing Cook, 2008), Australia’s on-campus international student numbers

increased by 95%. Birrell (2006) claims that some international students were admitted to university courses, even if they had not acquired the required IELTS (International English Language Testing System) level, because they were entering a degree course in an occupation listed for extra points in the migration visa process viz. accounting. Alternatively, they might have gained entry by another pathway that did not require IELTS band 6, like another study course in which case they would not have to do another IELTS test before gaining admission to university. He claims that universities cope with numbers of students whose English is not adequate for their studies by “lowering the standards in the courses they teach” (Birrell, 2006, p. 62), in subjects like accounting and IT. He claims further that the professional accrediting bodies in areas like accounting, IT and engineering do not specify minimum English standards.

At the time of writing this thesis, (2017) according to the Australian Government Department of Immigration and Border Protection website, the English language requirements for skilled migration 457 visas now require IELTS level 6 in all aspects. Student visas require IELTS 5.5 if packaged with ten weeks of ELICOS (English Language Intensive Courses for Overseas Students) or 4.5 with twenty weeks of ELICOS. "Department of Immigration and Border Protection") Bretag (2007) has mentioned that expenditure on tertiary education in Australia fell by 16.8% during 1995-2003 and that Australia had the lowest share of public expenditure on HE of all the OECD countries reported. This has led to continuing aggressive recruiting of fee-paying students from overseas without appropriate language support systems being put in place and without universities having the budgets to provide sufficient and appropriate supports (Bretag, 2007, p. 14).

In another press release issued by Universities Australia, its CEO stated that international student numbers have increased from 2015 by 10% and “international education exports have now reached a record \$21.8 billion.” The phrase “international education exports” recurs in the literature and evokes a non-human sense of those students whose parents and governments have committed themselves to paying large sums to ensure that they receive a quality education in the medium of English. The latest survey of international students also showed that 89% were either

‘satisfied’ or ‘very satisfied’ with their experience ("International student numbers surge to record high" 2017). The presence of international students also boosts local economies and adds diversity to Australian communities. However, many international students do not have a good command of academic English, as noted, and therefore will have to access student support on their campuses.

In 2011, according to Barthel (2011), the ratios of Academic Language and Learning (ALL) staff to students varied from 1:885 to 1:7429, with the average ratio being 1:2540. He did a separate calculation for international students and the average there was 1:646. There are no more recent figures but it would be expected that the ratios would remain similar, which suggests a poor outlook for international students in terms of the availability of ALL support for them. Then the question must be asked if ALL support is what is most needed. It is possible that supporting these students into the culture of Australian universities and introducing them early on to the academic literacies required might be more valuable. If the institutional curriculum supported the areas of need in incoming students’ VUBs (which this study plans to identify) it is likely that there would be less need for remedial support.

Wingate (2015) problematises this in detail with her analysis of the actual type of support for academic literacies required to enable students to integrate into university. Wingate (2015) cites Swales (1990, pp. 24-27) about the inextricability of academic literacies and the teaching of the subject. She argues that the teaching of academic literacy and language outside of the discipline classroom is not the best way to support students and that academic lecturers should be enabled to take responsibility for teaching the literacies specific to their discipline. Wingate (2015) uses the term “academic literacies” in the same way it has been used in this thesis, to include academic discourse and academic writing as well as Higher Order Thinking Skills (HOTS), although she is less specific about the HOTS.

It is not only international students who have trouble with English, and Murray (2012, p. 234), for example, reports growing concern about “student levels of communicative competence”. He cites Bretag (2007) and Sawir (2005) as saying that sometimes academic staff are forced to tone down and adjust their delivery of course content to make it more accessible to students with weak language skills. Bretag

(2007, p. 14) further notes that “funding cuts to the tertiary sector have meant that international students’ fees are not necessarily channelled back into these support services.”

The issue of numbers of international students is not integral to this thesis because none of the participants identified as international. However, their presence in the larger picture of the demographic of first year students in Australia has clearly become more significant, and it is the presence of a larger percentage of students who enter university from those varied non-traditional pathways to which Kift (2008, p. 15) refers in her discussion about TP. International and Indigenous students are classified in equity/at risk groups, but are not included in the following section because none of the students in the data collection identified as either Indigenous or International.

2.2.1.2.2. *Low SES.*

McMillan and Western (2000) developed an argument for measuring the SES category of individual students based on the occupation and education of their parents while they were at high school. They made the point that measurement proved difficult for this group as the postcode methodology was not sufficiently accurate. They also made the point that there are several variables that need to be considered, including the issue of mature age students. Heagney and Benson (2017, p. 217) stated that by 2010, 28% of all Australian first-time entrants were aged 25 years and over. In support of this claim they cited OECD, (2013) and continued, citing Harvey et al., (2016 b) that “more recent research suggests that mature age students comprise approximately 40% of the commencing student cohort. This might be because the explosion of technology makes it possible to study on line.

...the proportion of students studying off-campus has increased since the early 1990s to 17 per cent in 2014 (the drop from 2000 was due largely to declining international student off-campus enrolments). In the rest of the higher education sector the off-campus share is growing. The small decrease in 2014 is due to a significant fall in student numbers at Open Universities Australia; in the rest of the higher education sector the off-campus share is growing. (Norton & Cakitaki, 2016, p. 24)

This factor among others, has increased enrolments across the board. (Norton & Cakitaki, 2016, p. 25), without proportional increases in staff complements (p. 32).

2.2.1.2.3. *First in family.*

O’Keeffe (2013) cites Collier and Morgan (2008, p. 426), who define ‘first generation students’⁶ as those, neither of whose parents have completed a four year HE degree, and they include them in the at risk category. They cite one of the issues sometimes associated with their lack of success as not having a family context to develop the “cultural capital” needed for persistence.⁷ Pascarella, Pierson, Wolniak, and Terenzini (2004) studied FIF students in the US and found that in general they were disadvantaged in terms of their academic success. Theirs was a detailed and complex study, which also considered the academic benefits of out of class activities, where FIF students could build some cultural capital from their more advantaged peers.

In their comments on a table showing the relevant statistics, Norton & Cakitaki (2016 p.27) commented that

Despite these increases, SES differences in university participation remain large. Table 3 reports on educational participation or attainment of people aged 20-24 in 2014, classified according to their parent’s occupation. It shows that 20 per cent of the children of machinery operators, drivers and labourers were in higher education or had a degree. By contrast, 57 per cent of the children of managers and professionals were enrolled in or had completed higher education. All groups have increased their attainment since 2009.

2.2.1.2.4. *Non-Traditional entry pathways.*

An implication of growing diversity is that more students enter the university by pathways that are described as "non-traditional". Kift (2008, p. 15) refers to “multiple entry points”, while McNaught and McIntyre (2011), for example,

⁶ Here they will be referred to as ‘first in family’(FIF).

⁷ Persistence, progression and success are terms used interchangeably here.

describe a programme that targeted students who had entered the university via a Cert IV TAFE pathway and who required support in the development of academic literacies. Many universities are also developing partnerships with their local TAFE colleges to develop pathways into university and most universities have bridging programmes designed to provide access for students who identify as underprepared.

2.2.1.2.5. *NESB.*

In addition, there is a large cohort of students from non-English speaking backgrounds (NESB) (Wingate, 2015, see also Chapter 1), many of whom are from diverse cultural backgrounds, who have not been prepared for the ways of thinking and writing required by the Western academy. Bretag (2007) describes the problems encountered by international students from different learning cultures and traditions, while Murray (2012) addresses the issue of how best to support students whose academic literacies are not well enough developed to enable them to access the curriculum.

2.2.1.2.6. *Other at-risk factors.*

In addition, James, Krause, and Jennings (2010, p. 27), in their large and comprehensive report on the first year experience, found that,

There is a bundle of factors identifying students at risk of failure in the system. These include low achievement, pressure from financial commitments, perceived lack of parental understanding and social support, lack of preparation for university study, and excessive hours of paid work. Coupled with these factors is the likelihood that students at risk are also less likely to study with other students, to report working consistently through the semester, and to be enjoying their courses.

O’Keeffe (2013, p. 426) also mentions students who have a mental illness and McKenzie and Schweitzer (2001) conducted a study into factors predictive of success and discovered that previous academic performance was a highly predictive factor. Robbins et al. (2004) have made a similar observation. Therefore it can be assumed that students entering with low entry qualifications would also be at risk.

For applicants with high ATARs, ATAR will continue to be a key selection tool. At these higher levels, ATAR successfully identifies applicants with a good chance of

completing a course in a reasonable timeframe. Re-using school results is efficient for both universities and applicants. No alternative or additional selection tool has yet been found to predict future outcomes more reliably in a cost-effective way.

For applicants with low ATARs the issues are more complex. Their non-completion risks create dilemmas for universities. They want to create opportunities for higher education yet taking students with poor completion prospects could be unethical if there is high risk that the student will not benefit from their enrolment. (Norton & Cakitaki, 2016, p. 31)

The above authors discuss another form of entry test for a medical school that involves personal interviews and individual written pieces, however it will be part of the argument in this thesis that an indicator of a potential students' HOTS would be a useful addition to the screening of potential applicants for university study.

2.2.1.2.7. The University of Southern Queensland (USQ).

The university in which the case study in this thesis is being conducted, the University of Southern Queensland (USQ), is classified regional and in tune with the 1990 Labour government policy of widening participation in universities (*A Fair Chance for All*, 1990), previously mentioned, has attracted a large proportion of student enrolments that are often classified as at risk. They are drawn from the so-called equity categories that have already been mentioned above (O'Keeffe, 2013; McMillan & Western, 2001).

According to the USQ Annual Report 2016 (*USQ final 2016 annual report*, 2016), 28% of the student population was from low SES post codes, and it is frequently assumed that such students will be underprepared for university (McMillan & Western, 2000; O'Keeffe, 2013; Robbins et al., 2004). The USQ Annual Report of 2012 (*Annual Report 2012*, 2012) (these figures were not included in the 2016 Annual Report), reported that 58% of starting students were women, many of whom were likely to be mature age and single parents; 55% were drawn from regional areas; 2.2% were Indigenous; 1.8% were international (and it is assumed that they would have issues with English) (Birrell, 2006; Bretag, 2007); and the median age was 28 years, which suggests that they would have been away from a study environment for some time. Rovai (2003), in his study of persistence in distance and

online students, suggested that older students were affected by financial concerns, and also tended to have support structures that were not related to the university, which affects their integration and commitment to the institution.

These statistics at USQ have increased from previous years. Indigenous numbers were 1.8% in 2010 and in 2016 they have increased to 2.9%. Students with disabilities increased from 837 (.07%) in 2010 to 1708 (.15%) in 2016, which indicates a growing diversity in the starting cohort of first year students, which also suggests that there could be more students at risk of dropping out. The Annual Report claims a retention rate of 79.5% in 2010 and 76.4% in 2016. Another aspect of the USQ educational offering that has increased is the Tertiary Preparation Programme (TPP). This programme is aimed at assisting underprepared students to enjoy a positive university experience at the completion of the programme. Currently over 70% of TPP students are mature adult learners and 33.4% of domestic students are from low SES backgrounds (Morrison, 2016).

2.2.1.2.8. Information about the students represented in this case study.

Eighteen students responded to the request for participation in this case study. Eight of them identified as being first in their family to attend university, while ten were mature age and twelve had had no prior experience of university. Some identified in more than one category. That information will be set beside some of the scholarly literature which describes such students in general. Part of knowing the students is to have a sense of the typical first year psychological profile, and Bye, Pushkar, and Conway (2007) develop this theme in their definitions of traditional and non-traditional students. They identify higher levels of intrinsic motivation to learn in non-traditional students, who, according to their definition are students who have not come straight from school. Whereas traditional students, those coming to university straight from school, are more likely to show extrinsic motivation and a lower affect. Crossan, Field, Gallacher, and Merrill (2003, p. 55) also write about non-traditional students, and suggest that their learner identities can be “fragile, contingent and vulnerable to external changes”. Negy (2003) found that married undergraduate students experienced additional relationship stresses and recommended that special attention needed to be paid to such students by student counsellors. O’Donnell and

Tobbell (2007) explored the possibility of adult students' transition into higher education being assisted by them participating in an informal community of practice, thus learning about the practices of a higher education institution and strengthening their sense of belonging to that community.

Pascarella et al. (2004) wrote about FIF students with a view to comparing their experiences and achievements with their peers. Collier and Morgan (2008) also concerned themselves with FIF students, they found differences in expectations between traditional and FIF students and attached those differences to what they conceived as their mastery of the student role. Southgate et al. (2014) developed Australian research into the FIF discussion that resonated with the US research referred to, for example, in Collier and Morgan (2008) above, they found correlations with the poorer academic outcomes of FIF students.

In other research Boyd, Hunt, Kandell, and Lucas (2003) analyse different identity processing styles in undergraduates and relate it to their academic success or not. Murphy and Roopchand (2003) shed light on motivation and self-esteem in traditional and mature students in the north-east of England, while Kahu, Stephens, Leach, and Zepke (2013, p. 800), in their study of mature age and distance students, found that,

Both older students and distance students were better able to integrate their learning with their work experiences. While other researchers have noted the conflicts between life experience and academic knowledge and the difficulties this brings for adult students (Bamber & Tett, 2000; Henderson et al., 2009; Toynton, 2005), the current findings highlight the positive. The ability and opportunity to relate their learning to the 'real' world of work may compensate for the reduced opportunity or desire to interact with fellow students.

Related to knowing the students, for successful strategic interventions to secure retention it would be useful to have clarity about what the incoming student cohorts need in terms of TP. The Queensland University of Technology has become the exemplar and centre of research into TP in Australia and their project, which is ongoing, provides a useful model for other HEIs (Nelson, Quinn, Marrington, & Clarke, 2012). However, most universities internationally recognise the need to provide support for first year students and each, according to their locus, will provide

what seems to work for their institution (Faragher, 2012). However, Tinto (2006-2007) has recently observed that "...substantial gains in student retention have been hard to come by . . . [and] there is much that we have not yet done to translate our research and theory into effective practice" (cited in Kift et al., 2010, p. 2).

This indicates an ongoing need for contributions to TP that might enhance the FYE and address the ongoing issues of attrition and diversity. It is widely accepted that 'engagement' is essential for progression and success and there is a range of markers of engagement applied in various contexts.

2.2.2. Engagement.

Engagement is a critical issue in universities around the world and the Australasian Survey of Student Engagement (AUSSE) is a comprehensive survey of Australasian university students. It is closely related to the American National Survey of Student engagement (NSSE) (Coates, 2010). First, it is concerned with "students' involvement with activities and conditions likely to generate learning". Second, it looks at "the policies and practices that institutions use to induce students to take part in these activities". One of the instruments used within AUSSE (Coates, 2009 p. ix) is the Student Engagement Questionnaire (SEQ), which provides statistics for six items on student engagement. The mean academic challenge score in 2008 was 47.0. The variation between the different disciplines was 42.6 for information technology to 49.9 for education. Students considered education more challenging than information technology. The AUSSE also compared the results between staff and student perceptions and in education: staff scored 52.1 against the students 49.9, indicating that the staff saw the work as more challenging than did the students. Then the Active Learning Scale examined students' participation in experiences that involved constructing new knowledge and skill.

Only 5.9% of all students report never asking a question in class, ..., yet a quarter (24.9%) report not having made a class or online presentation during the current academic year. As with communication, collaboration is important in many areas of professional work, yet 16.1% of Australasian students report never having worked with other students during class, a figure like that for out-of-class work (14.6%) (Coates, 2010, pp. 6-7).

Up until the time of writing, only the Queensland University of Technology (QUT) has been able to report success in embedding TP in their “whole of institution curriculum”. At QUT they have succeeded in promoting a whole of institution process to identify at risk students and assiduously to pursue it, while at the same time promoting the idea of teaching differently to engage students in their studies and encourage them to commit to the institution (Kift, 2008; Nelson, Quinn, Marrington, & Clarke, 2012). Other universities have similar processes in place but little is specified, in the context of TP, about teaching and assessment methodology in the classroom.⁸ A wide range of initiatives is reported in papers at annual conferences and symposia run by organisations like AALL, STARS, HERDSA, International Society on Leadership in Pedagogies and Learning (isLPAL) and there will be others not mentioned here as well, in Australia and internationally. However, the idea of embedding institution-wide pedagogical change in learning spaces, from a teaching and assessing perspective, with a view to enhancing the experience of first year students and enabling their enhanced progression, is not immediately obvious.

Part of the Student Success Programme (SSP) at QUT was articulated by Kift et al. (2010, p. 8), who, as mentioned above, identified a need for “intentional first year curriculum design that carefully scaffolds and mediates the first year learning experience for contemporary heterogeneous cohorts”, and that can “address and redress” the issues of “increasing diversity in entering cohort preparedness”. They recommend tailoring the first-year curriculum to suit a diverse cohort that they assume will require a curriculum that will promote engagement and provide support. Their institution put in place a range of support mechanisms implemented mainly by administrative and professional staff. They claim academic involvement in their strategies but there is no mention of specific pedagogic changes being discussed, promoted or implemented in the classrooms. However, on an economic level, “using data from a cohort of 469 students in only one faculty”, they claimed that their SSP,

⁸ Charles Darwin University (CDU) have an at risk kit incorporated into their learning management system (LMS) which is Blackboard. (Personal information, Henk Huijser) USQ has an 'early warning system' run by the student services administration that is focussed on students' use of the university intranet.

which was based on the support mechanisms mentioned above, "...caused 75 students in that cohort who would otherwise not be enrolled to be still enrolled by the end of second year. This represents retained income of over \$1.8 million across a three year degree." (p. 13).

Other HEIs might want to follow this lead but a complicating factor for individual institutions in Australia, is that the incoming cohorts are so diverse (c.f. 2.2.1 above). They come from a range of high schools with very variable exit skills; from a range of family backgrounds varying from supportive to hostile; they are of varying ages from 17 years old to very mature age; their linguistic backgrounds vary through a range of local varieties of *AusE*⁹ to very little proficiency in English; some have disabilities, some are single parents; some are clear about why they are at university, some are giving it a try to see if they like it. The list can continue without being repetitive but what they have in common is that they can read and write English (in the Australian context) well enough to have gained access to the university. Birrell (2006) and Bretag (2007) problematise IELTS tests and suggest that they pitch access at too low a level. That may be correct, however, it is a reasonable assumption that the entry students all have life experience, which would involve thinking and potentially also some HOTS, which would thus constitute some of the contents of their VUBs.

2.2.3. Embedded curriculum.

Reason et al. (2006) conducted a large and complex survey of first year colleges and students in the US and at the end, in their distillation of all their results, they found that two factors were critical: first mentioned was "students' perceptions of the campus environment as supportive was the most powerful predictor of growth in academic competence" and the form of engagement most recommended was that "faculty members should provide opportunities for first-year students to engage in and practice advanced cognitive activities including opportunities to analyse,

⁹ Australian English, which like other national versions of English has its own vocabulary, slang and structures.

synthesize, judge, and apply information” (Reason et al., 2006, p. 170). This latter factor becomes a central issue in this thesis. What happens in the classroom also varies between and within institutions:

While there are a range of perspectives on student engagement, the dominant approach in tertiary education sees student engagement as ‘both the time and energy students invest in educationally purposeful activities and the effort institutions devote to effective educational practices’ (Kuh, Cruce, Shoup, Kinzie, & Gonyea, 2008, cited in Kahu, Stephens, Leach, & Zepke, 2013, p. 792).

Some crucial phrases are used here – “educationally purposeful activities” and “effective educational practices” to which TP theorists have not, thus far, paid much attention. The focus has not been on the classroom but on the students’ lives outside the classroom.

Reason et al. (2006) have suggested that those students who had a more appropriately challenging learning experience tended to proceed better than the others, and Kahu et al. (2013), in their work on assessing levels of engagement and satisfaction of mature age distance students in a New Zealand university, emphasised the academic engagement aspect of engagement and quoted Tinto and Kuh to support this; not to the exclusion of emotional and social engagement but including cognitive development and critical thinking as correlates of engagement, which are key indicators of success and likelihood of persistence. Halx and Reybold (2006, p. 312) make a strong point that the culture in which the pedagogical process is situated plays an important role in the development and application of critical thinking. The context in which Halx and Reybold (2006) were writing was an investigation into how academics were promoting the practice of critical thinking in their students. Three research questions guided the inquiry:

(1) How do faculty members define critical thinking in the undergraduate classroom? (2) How does this definition of critical thinking influence their pedagogical choices? and (3) What is the role of institutional culture and ideology in the development and maintenance of critical thinking? (p. 298)

Their third question related to the institution’s culture which should have the development of critical thinking skills embedded throughout as the TP theorists recommend. If the course does not have, as an overt purpose, the development of

critical thinking, is it reasonable to assume that student writers (SWs)¹⁰ should demonstrate such skills? The conclusions to be drawn from the above are clearly that an engaging curriculum will also be an intellectually challenging one.

2.3. The UK Experience

Developed western countries such as the United Kingdom (UK) and the United States of America (USA) have been concerned about their first year attrition rates as well, so research was done into their respective experiences and to see what Australia can learn from them.

Significant studies of first year students have been conducted in the UK. Crossan et al. (2003) studied adult students and the issues of identity they experience, and they also introduce the idea of HEIs as Communities of Practice. Gourlay (2009) focuses on the challenges for first year students involved in learning to write as academics. O'Donnell and Tobbell (2007) further reflect on the community of practice idea and do empirical research to understand the adult learners' experience. Pampaka, Williams, and Hutcheson (2012) tackle the issue of transition, and the ways in which students experience it. They develop a statistically quantifiable instrument to measure the students' experiences of transition and gauge how these relate to their outcomes; in their case the focus was mathematically demanding programmes in university (p. 1042). The idea was to assess the dispositional profile of successful students, but their findings were not conclusive. However, their instrument for gauging disposition might be of value in measuring the degree of emotional response to the knowledge they are gaining. Trotter and Roberts (2006) compare courses with different retention rates in the same university to gauge what practices could enhance the first year experience. Yorke and Thomas (2003) also compare institutions and their attrition/retention rates and draw conclusions about ways to enhance retention.

¹⁰ The students who produced the data which have been analysed will be referred to as 'SWs' in future, to distinguish between them and the children in the classrooms to whom they refer variously as students, pupils and children. I will refer to the children in the classrooms as 'children'. At other times the term 'student/s' will be used to refer to university students other than those in my data.

The commonly stated motivation for the above studies was to explore ways to enhance the FYE by finding ways to support students better and teach better, and thus improve the university's retention performance. What none of the above scholars do is focus on how to test and develop HOTS in their incoming students.

2.4. The US Experience

There are also many retention-focused studies in the US and a key figure among the researchers responsible is Vincent Tinto who has been writing on the subject since the early 1970s, *inter alia* (Tinto, 1974, 1987, 2009a, 2009b). He focusses strongly on integration, as well as motivation, and on classroom pedagogy. Hand and Payne (2008) conducted research in a university in an historically economically depressed area and investigated the effects of poverty and being FIF to attend university. Pascarella et al. (2004) focussed exclusively on FIF students. They identified three categories of research with regards to these students: comparing them with mainstream students in terms of preparation, understanding the transition from high school to post-secondary education, and examining persistence, attainment and post-degree employment. The general conclusion drawn is that FIF students appear to perform less well and later in their careers continue to be at a disadvantage. Reason et al. (2006, p. 170) report on a study involving over 6000 students and over 5000 academics, and they sought to test the effects on academic development of certain aspects of the first year. They found that a sense of being supported by the institution was a primary positive predictor. Findings in the study also suggested that a coherent institutional first year package was more likely to promote academic competence. This resonates strongly with the TP at QUT. Robbins et al. (2004) meta-analysed 109 studies to assess the relationship between psychosocial and study skills factors (PSFs), and academic outcomes. They focussed on retention and GPA achievement and used nine constructs as their testing variables: achievement, motivation, academic goals, institutional commitment, perceived social support, social involvement, academic self-efficacy, general self-concept, academic-related skills, and contextual influences. The latter, in turn, were divided into three constructs: financial support, institutional size, and institutional selectivity (Robbins et al., 2004, p. 166). Of these, academic goals, academic self-efficacy, and academic-related

skills were shown to be the strongest predictors of college retention (p. 274). It was a complex study merging two different sets of literature and testing against current assumptions. A common thread in all the above studies is the need to recognise the obstacles that the more diverse members of the first year cohort encounter, and how those obstacles potentially cause them to give up their studies and drop out of university. The obstacles tend to be similar to what has appeared in the Australian research, part-time students are often financially challenged, they are all time-poor, the challenges of adapting to academic discourse is a common theme and will be discussed in more detail. Some of the success factors are also found in the Australian literature e.g. engagement, self efficacy, success at school ... The above literature is related in that the countries are all predominantly mainstream English-speaking western democracies, which makes comparisons between them valid and potentially mutually useful. Specificities and histories differ but there are strong resonances between them, as has already been mentioned. The context for the development of TP in Australia has been influenced by the research in the US and UK and provides parameters for this study.

2.5. The Australian Experience

2.5.1. The Bradley Review.

The Review of Australian Higher Education was initiated by the Australian government which stated that it was “committed to making Australia one of the most educated and highly skilled workforces in the world in order to secure national long term economic prosperity” (Bradley, Noonan, Nugent, & Scales, 2008). The government’s response to this report was to provide an additional \$5.4 billion to support

... high quality teaching and learning, improve access and outcomes for students from low socio economic backgrounds, build new links between universities and disadvantaged schools, reward institutions for meeting agreed quality and equity outcomes, improve resourcing for research and invest in world class tertiary education infrastructure. (Bradley et al., 2008)

The authors of this Review recognised the challenges faced by specific groups in the first-year cohort and, amongst other findings, identified that Australian students were

less engaged than their counterparts in other countries. Bradley et al. (2008, p. 73) comment on declining satisfaction rates, as reported in the Course Experience Questionnaire, which covers areas “such as the nature of the learning experience, whether workload levels hindered deeper forms of learning and the impact of the course on the desire to continue learning”. They also commented on the comparatively low engagement statistics reported by Australian students in the AUSSE, 2007 (p. 76). The 2012 AUSSE survey report does not indicate a big change in this situation, although there are some improvements in some of the engagement markers like academic challenge, active learning, staff and student interaction and higher order thinking. However, in active learning, the results are still below 60% which still indicates a relatively low level of engagement with their learning (AUSSE, 2012, p. 78).

2.5.2. The Report on Good Practice Principles.

The Bradley Review generated a range of responses, among them The Report on Good Practice Principles (GPP), which was produced by the Australian Universities Quality Agency committee¹¹ (AUQA, 2009). It studied the language needs of international students who were not adequately prepared for university study in Australia. This Report generated two important responses: Murray (2012) focussed on the idea that poor English language proficiency inevitably causes students to have difficulty in accessing the curriculum, while Harper, Prentice, and Wilson (2011) problematised and critiqued some of the tensions in the Report. In addition, a further Report has been written that provides advice on developing and maintaining English language standards for all students in Australian higher education (DEEWR, 2010).

2.5.3. Students in transition.

A range of assumptions and knowledge about students in transition is also reflected in other recent studies conducted in Australia. Ashwin and Trigwell (2012) concentrate on evoked prior experiences of learning and how these can influence a

¹¹ This organisation has now morphed into the Tertiary Education Quality and Standards Agency (TEQSA).

university experience, while Brinkworth, McCann, Matthews, and Nordström (2009) followed up on a previous study at their university, conducted by Crisp et al. (2009), in which first year student expectations and those of teachers were compared. Furthermore, Brownlee, Walker, Lennox, Exley, and Pearce (2009)'s interest is in students' epistemological beliefs about knowing and how these can influence their success. McKenzie and Schweitzer (2001) researched a group of students at the end of their first semester and found that the best predictors of success were previous academic success, self-efficacy and engagement while McKenzie et al. (2013) studied the differences in achievement according to what sort of school the student had attended. Adding to the preceding studies, *The First Year Experience in Australian Universities* (James et al., 2010) is a study that was started in 1994. It reports every five years and develops a detailed profile of first year students that provides essential insights into this cohort and its developing trends, including increasing diversity. It also includes in-depth information as to what causes students to drop out or defer their studies in their first year. Another set of studies by Lizzio and Wilson (2013) and Wilson (2009) has developed predictors of success, which is also central to understanding the development of TP in Australia. Among those predictors are engagement, motivation and self-belief. According to (Baik, Naylor, & Arkoudis, 2014, p. 1) the years 2009 – 2014 have seen changes in the profiles of first year students, the diversity trend has continued and the students are more positive in outlook than they were before, they “had a strong sense of purpose and identity, were excited to be at university, and were very satisfied with their course experience.” They were also better prepared for transition, but they were less socially engaged with campus life and approximately 30% still find getting motivated and coping with university life a challenge.

2.5.4. The classroom.

The Australian research is generally focussed on the larger issues of students' lives outside the classroom except where they explore the students' sense of satisfaction, which is focussed on their attitude to study and the quality of teaching in their university. The James et al. (2010) study goes into this issue in some depth but, as might be expected in a study as rich as this one, in terms of numbers of participants, there is wide variation in what it is about their classroom experience that students

find satisfying. However, it is significant that high levels of satisfaction exist among students who are engaged and proceeding well in their studies, while those in the lower success levels all belong to members of at risk groups. The pedagogical recommendations of the reviews appear to be that academic curriculum planners should be aware of the information and use it towards diminishing their dropout rates. However, specific pedagogical recommendations are not proposed in the Australian literature. Furthermore, according to Baik et al. (2014) patterns of classroom engagement have not changed significantly since 2004.

Reason, Terenzini, and Domingo (2006, p. 166) added to this perspective when they focussed specifically on what effect on students' academic competence their first year had had on them, and the result of their survey showed that those students who had been exposed to more challenging classroom experiences felt that they had developed most. This finding has a potential pedagogical purpose and could provide guidelines for teachers. In the 2014 survey (Baik et al., 2014) two items relating to intellectual challenge had changed significantly over the two decades; enjoyment of the intellectual challenge and getting satisfaction from studying. In both cases the "Agree" response had risen significantly. Students' academic literacies will materially affect their first year experience therefore to develop the focus on pedagogical principles and changes that could enhance the first year experience it will be useful to consult the literature on academic literacies.

2.6. Academic Literacies

According to the theoretical framework envisaged in this thesis (discussed in the next chapter) deriving from Wingate (2015), academic literacies consist of academic discourse, academic writing, and HOTS. The writing is the output in texts, the discourse is the behaviour that will be evidenced, inter alia, in the writing, and the HOTS are the thinking skills that will also be evidenced in the writing as well as in the behaviour. The literature relating to what academic literacy is and what it means to academics and students, and how it is acquired or what skills it involves, will be explored next.

2.6.1. Academic discourse.

The range of academic discourse skills that were required in the assignment to be analysed, are covered in the following: the ability to read academic texts interactively, the ability to demonstrate subject knowledge, the ability to select and synthesise information into arguments, the ability to demonstrate professional expertise in their subject area, and the ability to use referencing conventions and understand academic genres, particularly that of critical, comparative analysis. In terms of the assignment in this study, they also had to analyse and critically compare two transcripts (T1 and T2) in the light of the theories taught in the course and refer to them correctly. Their assignments had to demonstrate a correct interpretation of the task and conform to the genre of the academic essay, as mentioned above. This is assigned a specific mark in the rubric, which also has another writing-related descriptor in addition to genre: their competence in language, literacy and APA style, and together these are worth 30% of the total mark. Wingate (2015) makes the point that, "...academic writing is assessed right from the beginning of their study, and in the absence of explicit and appropriate instruction, some students are doomed to either low achievement or early failure."

Academic discourse encompasses a range of writing skills as well as behaviour that is appropriate in the university. It includes an interest in knowledge for its own sake, critical thinking, exhaustive enquiry, specialised knowledge, disputation, openness, tolerance, reflection, scepticism, honesty, respect for intellectual property, collegiality, critique and academic freedom (Wallace, Schirato, & Bright, 1999, pp. 15-21). Students need to demonstrate all the above qualities in their work as well as the specific skills included in academic writing skills. Other markers of what constitutes academic discourse include argument, referencing conventions, scientific discourse, and academic genres, some of which were mentioned above and are confirmed by Archer (2008, p. 384) in her account of an innovative communication course aimed at developing academic literacy practices. Campbell and Green (2006, p. 3) cite Gee (1990, p. 143) who refers to "A Discourse" as "...a socially accepted association among ways of using language of thinking, feeling, believing, valuing and acting that can be used to identify oneself as a member of a socially meaningful group or 'social network'."

Bizzell (1992, p. 168) problematises the issue of academic discourse by suggesting that beginning students often have a different world view from the world view required by the college. She asks the question, “What world views do basic writers bring to college?” Bizzell (1992, p. 99) espouses the cause of students who come to the university without the natural advantages of having been prepared for the experience by their lives, and who suffer from the disadvantage of not being able to produce the discourse required by the university. She suggests that such writers should be invited into the academic community on the understanding that that community has rules and conventions that they can adopt to gain access, but with the acknowledgement that it is not the only discourse community available to them. She further argues that we are “into a period of discursive change in the academy” (Bizzell, 2005, p. 323). She grapples with ways to improve her students’ writing and calls for inspection of the “hidden curriculum” of the accepted norms and standards and world view of the elitist cultural hegemony of the university as it was and as it presented an opaque set of values that individuals from outside that world assumed to be the only correct ones and assumed that they had to discard their own values and attitudes to succeed. She used discourse analysis with the students, to facilitate its examination (Bizzell, 1992, p. 99). Bizzell (2005, p. 322) further proposes that academic discourse is not a fixed practice, but that

...the diversification of academic discourses enables not just new styles but new ways of thinking, new modes of analysis, and these new discourses are emerging not simply because academics want to make their analyses clearer to broader audiences but because the new discourses enable new kinds of analysis that are needed now to cope with new exigencies confronting our society.

This is not an argument for sloppy thinking or writing, but rather a plea for the recognition of the value of the diversity of the discourses brought by non-traditional students, who have joined the university as part of the widening participation agenda referred to earlier in this thesis. Other scholars have tackled this issue. Burgess and Ivanič (2010), for example, explore the issue of the ‘self’ that every writer brings to the task of writing, to the context of that writing, and to the probability of that ‘self’ changing over time. They raise issues of power relations between writers and readers and the possibilities of writers being co-opted, albeit subconsciously, into power

structures and ways of writing and behaving that could be antithetical to their own values.

Krause (2006, p. 4) mentions that one of the challenges new students face is the learning of a “new language”, as well as some of the practices and traditions of the institution that might seem alien to new students. Priest (2009, p. A73) discusses the alienation experienced by low SES students who do not have mastery of the language and discourse of the university. She draws on Bourdieu and other research that shows that such students can find the world of the university exclusionary and too difficult to enter and remain in, because the language used reflects the dominant discourse. She claims that low SES students are at a disadvantage because they lack the familiarity that other students might have with academic discourse and are more likely to find it “remote and unfamiliar” because it is “allied with the language of cultural privilege” (p. A-73). In addition, it is more than language that is confronting these students; it is also the “values, attitudes and perspectives” that are contained in the language, which might be unfamiliar and alienating for them. This alienation could be counteracted if students were carefully inducted into the “mysteries” of academic literacies. Fernsten (2005), in her case study of two African American students, and Bizzell (1992, p. 20) both demonstrate the alienating effect that the language of the university can have on those who are not able to participate in academic discourse. Inducting new students into the university sensitively enough to counter the inevitable feelings of alienation is not an easy task. Haggis (2006, p. 523), in her study of differently prepared students, argues that

...beginning students at all levels, no longer necessarily ‘know what to do’ in response to conventional assessment tasks, essay criteria, or instructions about styles of referencing. Rather than seeing this situation as an indication of falling standards, or of the need to ‘dumb down’, [...] it implies the need for a change of perspective.

The change of perspective she advocates relates to creating a curriculum that is more closely aligned to what the students already know and can do, and which responds to the question contained in the following quotation:

The question in relation to learning then changes from being ‘what is wrong with this student’ to ‘what are the features of the curriculum, or of processes

of interaction around the curriculum, which are preventing some students from being able to access this subject? (p. 532).

Worthman (2008) compared the pedagogical processes and outcomes of two adult education literacy teachers who had contrasting approaches. One of them taught her students how to conform to the language and mores of their society to achieve power in that society. However, Worthman's theory was that that process did not actually empower them. The other teacher enabled her students to critique the ways the society worked, thus practising a "reverse discourse" (p. 461) and enabled her learners to develop a critical stance. This highlights some of the tensions in the simple ways in which the assumptions around academic literacies have been presented thus far in this literature review. Bizzell (1992, p. 99) used the term "deracination" this suggests that if students change their identity to conform completely to the norms of the institution they will lose their personal identity. The argument in Worthman's (2008) article was that the best outcome was that the students should develop a critical stance thus liberating themselves from the hegemony of the dominant culture. However, the question is still begged as to what sort of discourse and language should the student practise to be successful academically. It suggests the desirability of a sort of Janus-like identity whereby the students can conform outwardly but retain their sense of personal value and identity.

There is a strong resonance here with the concept of the VUB. In another study, Green and Agosti (2011) used the contents of their students' VUBs to enhance the academic literacies of post-graduate international students. To discover those 'contents' their first step was to diagnose the students' needs, and they selected four areas to assess,¹² based on the authors' previous experience. They made a strong case for teaching the students to conform to the discourse community they were entering (p. A-25). The important aspect of this programme is that it did not focus exclusively on language issues but included referencing, specialist vocabulary, and broader academic expectations.

¹² "selecting and structuring of appropriate, critical analysis, appropriate use of scholarly literature, hedging" (Green & Agosti, 2011, A-22).

Referencing conventions particularly, cause consternation among students. Green and Agosti (2011, p. A-26) address the referencing issue directly in their course on academic literacy:

In relation to the value of in-text referencing and writing a reference list as syllabus items, many positive comments were made. All students expressed their lack of knowledge of in-text referencing protocols. A Russian student strongly questioned on several occasions the need to include sources in her writing in order to substantiate knowledge that she already had from years of teaching experience.

The introduction to referencing protocols was a topic the students appreciated even more after their first semester of studies. One student observed: “We didn’t lose marks and got compliments on our reference lists and felt really sorry for other students who did lose marks in such a silly way” (p. A-28).

Academic discourse and academic writing are closely related, and in this study it is proposed they will be studied separately and together, the focus on writing output is more on technical aspects. An example of this is Hyland (1997), who is heavily referenced by Donesch-Jezo (2010), who in turn describes a course in a Polish university in which she taught students to use meta-discourse items, including hedging, boosters, self-mentions, and engagement markers, to create academic texts that would be appropriate in an Anglo-American context. These items will also be of value in this study because they provide descriptors that enable the implementation of the distinctions mentioned above and add depth to the analysis of the student writing that will be undertaken in this study.

2.6.2. Academic writing.

Part of knowing the students and being able to provide the sort of first year experience they need with which to enhance their possibilities of success, is understanding the specific issues they face upon entering the world of the university, particularly the issue of academic writing and its role in assessment. Regarding academic discourse all disciplines will have their own specific requirements, and students will have to provide evidence that they have mastered those requirements. There are generic standards which most universities in Australia articulate in their Graduate Attributes and Skills, and which are subscribed to by the different

disciplines and developed with discipline-specificity. They all contain some references to the use of academic discourse and academic writing, demonstrating critical or higher order thinking skills, as well as a range of other academic and non-academic qualities, depending on the institution and discipline. Some of the texts quoted in this section resonate with the description and discussion of academic discourse but primarily deal with writing. Bailey and Huang (2011, p. 350) wrote in a K-12 school context and focussed on outcomes. They included vocabulary knowledge specific to academic texts and complex grammatical structures such as comparatives, prepositions and logical connectors. They also included organisational patterns like comparing and hypothesising as being marks of academic writing (p. 351). Coxhead and Byrd (2007) write about how to teach university students to acquire academic language and included a list of markers that will be of value in this research. These markers include a range of linguistic and grammatical issues: vocabulary, logical connectors, hedging, nominalisation, transition, framing and endophoric markers, evidentials and code glosses, abstractions and metaphoric grammar, long complicated noun phrases, words of Latin or Greek origin, passive voice, and specific sets of words. Knoch (2008, p. 36) adds certainty markers, attributors, attitude markers, and commentaries to the above. Here too the presence or absence of those markers will add information towards discovering what the SWs do when they write a critical, comparative analysis.

The implications of not being able to write appropriately for the university are serious. Murray (2012, p. 234) demonstrates the assumption that a lack of English language skills has the potential to exclude students from the university as well as from employment:

Without the language skills needed to access program content, interact effectively and reach their full potential, these students risk finding themselves at a considerable disadvantage as graduates hoping to enter an Australian workforce that is increasingly particular about the qualities it expects of its employees. (see also Birrell & Hawthorne, 1996; Birrell & Healey, 2008; Burch, 2008)

AUQA's Good Practice Principles (GPP) takes this further: "With widening participation across tertiary education and the increasing numbers of international students, it can no longer be assumed that students enter their university study with

the level of academic language proficiency required to participate effectively in their studies.” (AUQA, 2009, p. 2).

The above attitude from the GPP has been extended (DEEWR, 2010) to include all students entering university for the first time and those who demonstrate deficiencies in their English language skills. There is an assumption that language deficiency inhibits academic performance. In their analysis of the GPP, Harper et al. (2011, p. 40) comment that Principle 7 demonstrates a “deficit view” of student writing and uses a “pathological analogy” when they suggest that students’ linguistic proficiency should be diagnosed and remediated. Murray (2012, p. 234) makes the point that there is a growing body of research that reports concern among academics that student levels of linguistic ability are too low to enable them to “access program content, interact effectively and reach their full potential”. There seems to be a clear perception that apparent insufficient linguistic ability is linked with insufficient intellectual ability.

Bradley et al. (2008) make the point that increasing numbers of students requiring access to learning and language skill development services cost the university extra expenditure to maintain such services. They also voice a need for language support (Bradley et al., 2008, p. 42). Moreover, they focus on international students and highlight the fact that, “...the OECD has praised the New Zealand approach to addressing concerns about quality by strengthening ‘language admission requirements and foundation program(s) to ensure that students are adequately prepared to begin their studies, both academically and linguistically.” (OECD 2008a, vol. 2, p. 285, cited in Bradley et al., 2008, p. 103).

From this it might be inferred that universities should be providing extra steps to their admission processes to add to the likelihood of first year students progressing successfully, and here too the focus is on language and its relationship to academic success. The obvious other impact of the problem is the students themselves. Many of them have been encouraged by the government’s inclusion agenda to enter the university but find themselves marginalised because they do not have control of the necessary discourse to demonstrate their ability to satisfy the requirements of assessment. Fernsten (2005) writes about students in the U.S. who are disempowered

by their perceived inability to write like academics. She places her observations in the context of the demands of academic writing in universities, and the construction of those who did not conform as deficient writers and intellectually deficient. She describes how she interacted with those students' perceptions and assisted them to develop more confident writer identities. However, she also acknowledged that she did not achieve complete success.

The literature around this problem suggests a belief that students entering university without the necessary language skills will be unable to access the curriculum successfully because they have come from backgrounds that have not provided them with the language and behaviour required for success. The assumption of intellectual deficiency mentioned by Fernsten above is widespread and potentially prevents university teachers and the students themselves from recognising that there is more to academic discourse than simply language. The students often possess a range of other skills in their VUBs that could possibly be utilised in their studies but because they have not mastered the language of the institution that opportunity might not happen. All the above assumes that the discourse of the university, as it was understood by the "white, male academic establishment" of the past (Bizzell, 2005, p. 323), is the only acceptable discourse. Coleman (2012, p. 326), in her article about recontextualization, visits some of the New Literacy Studies writers and cites Jones and Lea (2008, p. 208) who "...regard literacy as a social practice and use the plural conceptualisations of 'literatecies' to signal 'an engagement in a range of different social practices around texts, depending on the specific context, rather than just individual cognitive ability'".

She develops her argument around the idea that writing is one of a range of "literacy practices" that are "always social, signalling that specific language uses, mediated via spoken, written or multimodal texts, do not exist in isolation" (p. 327). The idea of multimodal texts being able to demonstrate students' learning is useful but not immediately applicable to this research, which is based on written and oral texts. However, when Coleman (2012, p. 328) embarks on her argument for recontextualisation, based on Bernsteinian theory, it becomes more relevant to this

study, as one of the objectives of her research is an understanding of what diverse students bring to the university when they begin their studies:

Within educational settings, recontextualisation, according to Bernstein (1996), functions to bring knowledge forms into a special relationship with each other ‘for the purpose of their selective transmission and acquisition’ (p. 46). Recontextualisation, therefore, describes the process whereby *knowledge produced outside the curriculum is selectively appropriated and transformed into teachable material within the curriculum, making the curriculum in its broadest sense a main recontextualisation outcome.* (my emphasis)

If the data in this study is analysed in the context of what the SWs brought with them in their VUBs, then a more positive perception of their thinking is made possible than simply assuming that their poor English and limited understanding of the concepts learnt is symptomatic of incompetence. Coleman says that the choices available to agents of recontextualization are contested and constrained, and she cites Shay (2011, p. 317) who argues that they are “shaped by the norms of the prevailing socio-political order.” As has been mentioned, this “order” in our context is an unstable field, but the statistics suggest that the HEI student demographics are likely to show more students entering in equity categories than before, which suggests a need to reconsider the standard external values of academic discourse and, where writing is concerned, give the students time to develop appropriate writing skills if they show relevant HOTS. Related aspects of writing are a vocabulary count, and idiosyncratic expressions and they are included as descriptors also on the basis that they proved useful in the pilot study referred to above.

2.6.3. Vocabulary count.

The relationship between the size of a student’s vocabulary and their academic success has been hypothesised extensively. Malvern and Richards (2002) wrote about testing vocabulary diversity in interviews and observed that “lexical diversity is notoriously difficult to quantify reliably” (p. 87). Perhaps this is a *caveat* that should be borne in mind while reading this section. Different scholars have measured students’ vocabularies and created measures and techniques to identify university students’ lexical needs and achievements (Lenko-Szymanska, 2000) and Crossley et al. (2012, p. 244) who cite Henriksen (1999) to make the point that “the complexity of a lexicon and the processes involved in acquiring words may, in fact, make it

impossible to develop a unified construct of lexical competence”. The warnings are noted and judgements made in this regard will depend on the contribution made by the vocabulary count to the research results.

Crossley, Salsbury, and McNamara (2012) used a computational tool to investigate lexical competence across language levels. They note “that understanding L2 lexical acquisition in relation to its deeper, cognitive functions can lead to increased awareness of how L2 learners process and produce language” (p. 244), which is an idea that forms part of the thinking underpinning this research. Crossley et al. (2012) further claim that their results “provide strong evidence to support the link between lexical competence and language proficiency” (p. 255). Several scholars support the idea that vocabulary knowledge in use is important for academic success. Most of the research on this issue relates to L2 language acquisition, but as the language acquisition processes are similar, the research and experience of analysing vocabulary should also be similar. Crossley et al. (2012, p. 244) cite Daller et al. (2003) as saying that “L2 competence is also a prerequisite for academic achievement “.

Khani and Tazik (2013, p. 210) claim that vocabulary is a crucial linguistic feature of academic texts and can have a determinate role in being able to write an acceptable research article. Laufer (1994, cited in Khani, 2013, p. 210) notes that “... in EAP contexts writing progress can be measured through lexical progress, since lexical quality and writing quality are interconnected”. He believes that a well-used rich vocabulary positively affects the learners’ writing ability. Laufer, Elder, Hill, and Congdon (2004, p. 203) further state that lexical knowledge “has been shown to be related to success in reading, writing, and general language proficiency as well as to academic achievement.” This article is about a range of different vocabulary tests and he makes the point that “A learner’s passive vocabulary is always larger than his or her active vocabulary. This indicates that many words are first acquired passively, and that active knowledge is a more advanced type of knowledge.” This could be an important observation for this study when the written vocabulary is counted.

Barbeiro et al. (2011, pp. 322-323), is in line with those who believe that lexical competence is a necessary resource for academic writing and claims that lexical

competence is a basic resource in linguistic tasks. However, they approached their research from a different perspective from that shown by the other scholars. They also tested an assumption that there is a correlation between lexical competence and academic ability, and they compared a cohort of mature age (over 23 years) students who had either left school before year 12 or had been out of school for many years, with a cohort of school leavers. They tested the two groups' lexical competence and found that the older age group's performance scored lower than the younger. The purpose of the test was to find out what the weaknesses were in the older group so that support could be targeted specifically when they started their university courses. According to this perspective, other elements of experience besides formal education should be part of learning... The challenge is to enhance the relevant knowledge brought by this personal experience to the learning that students should achieve in higher education.

They argued that the students could mobilise their lifelong experiences through the tests they did and then work on them to establish the relationship between them and the new knowledge they were acquiring. They cited Kirby et al. (2010) that "In so doing, they are adopting the 'life-wide' perspective," they claim. "According to this perspective, other elements of experience besides formal education should be part of learning." (Barbeiro, João et al., 2011, p. 322). This last comment resonates strongly with the research in this thesis where the idea is to reveal the contents of the VUBs to enable targeted curriculum. Part of those contents are necessarily going to be the words they used in their essays. What they can do is partly represented in their writing and that inevitably consists of the words they use, so it was decided, *inter alia*, to assess their vocabularies.

Finally, Li and MacGregor (2010) also assumed a relationship between vocabulary size and academic success. They described their tests for vocabulary size and related it to the needs of students in Hong Kong. They found that their data represented poor vocabulary levels but decided that this was probably an underestimation of their ability, because there is not a defined corpus of Hong Kong English, and many of the words used in their comparison list would not be necessary for their students. They (p. 239) worked with the assumption that "without vocabulary size reaching a

minimum threshold, learners will be unable to successfully engage in either receptive or productive language use.” They discussed different ways of measuring their students’ productive vocabularies and concluded that their performance was poor, which surprised them because the students had not been performing badly in their studies. They suggested, in their conclusion, that the test words were not sufficiently “representative of the vocabulary used in the linguistic environment relevant to the test-takers” (p. 248). This is an important observation for this study in that finite judgement cannot be made about the vocabulary counts of the SWs in this study, given the constraints of an essay topic and the number and types of words it is likely to require.

2.6.4. Idiosyncratic expressions.

Other measures that could be employed to discover what the students have in their *oeuvre* of tools, or VUB, are their use of idiosyncratic expressions, their use of metaphor and markers that show what academic literacies they have.

Recognising the difference between ‘wrong’ English and *AusE* will add to the understanding of what it is that students do when they engage with their assignments. A complaint sometimes heard in staffrooms is that students often write as they speak¹³, and as many of them speak Australian English (*AusE*), it is useful to have a background in how to recognise Australian English, which, like any other national English, has its own idiosyncrasies. *AusE* has been studied and analysed by linguists of all aspects of the spectrum since the earliest days of the colony: Mitchell (1965) wrote a book on the pronunciation of English in Australia; Blair and Collins (2000) and Leitner (2004) also wrote books on Australian English, the former in a series on varieties of English around the world and the latter on Australia’s “many voices”; and Wierzbicka (1997) included a chapter on Australian key words and key cultural values in her book on understanding cultures through their key words. There is also an interesting and relevant exchange of scholarly opinions in which William

¹³ Personal anecdotal reference based on professional experience which is based on innumerable readings of students' writing.

Ramson and Anna Wierzbicka cross swords on the relationship between words and their meanings as expressions of culture (Ramson, 2001), (Wierzbicka, 2001). It is a scholarly exchange of ideas between two people who approach the issue from a position within their respective disciplines, but it is of interest here because it shows how *AusE* has developed and how the data to be analysed could be affected by that. If the contents of the students' VUBs are going to be determined, the origins of the language they contain will be of value as it demonstrates what they bring to the task of communicating their thinking in the assessment. They also have recourse to comparisons between what they know and what they are trying to communicate, and this often occurs in the form of metaphors. Pugh et al. (1997, p. 23) show how a metaphor can function as an heuristic, a device that can "lead us to knowledge".

2.6.5. Linguistic Skills and Academic Success

A lack of linguistic and discourse skills has caused mainstream academics to assume that some students' linguistic and discourse disadvantage also indicates an inability to display an intellectual capacity for success. This conclusion is drawn because the discourse of the literature suggests remediation and support – it all adds up to a perception that this cohort of students is doomed to failure because they do not have the right language abilities. Subsumed into the above is the concept that language proficiency and the use of appropriate discourse is all that is vital to academic success. This is supported directly in the literature by Oliver, Vanderford, and Grote (2012) who conducted a large quantitative study to establish whether the entry English language requirements of their institution were adequate to ensure academic success, and they concluded that there was a correlation between higher English levels and academic success. They also mentioned the reality that there are many other factors that contribute to academic success. In addition, there is a wide range of research conducted, particularly in the US, which mostly focusses on school children from NESBs and in bilingual situations. However, Graham (1987) suggested that, based on the research done up until that time and about international students, it was not possible to claim correlations between English proficiency and academic success in the short term. Elder, Bright, and Bennett (2007, p. 27) concur and found that "English proficiency makes an important but complex contribution to the study experience but, for a range of reasons, this is not always reflected in academic

outcomes”. However, later in the paper they give the following caveat: “Language proficiency here and in other institutions where such research has been conducted, plays a definite role, but its contribution is nevertheless limited with about 90% of the variance in GPA explained by other factors.” (p. 49).

The writings of Birrell (2006) suggest that Australian universities are graduating students who have a low level of English when they graduate. His major concern is international students who have completed tertiary courses in Australia and have been granted permanent residence. They have to do an English test and about a third of the 2005-6 cohort to whom his study applies did not achieve the “competent” IELTS band 6 English standard. This suggests that many international students graduate without having an adequate functional English ability and so they cannot present themselves as desirable employees when looking for work. Bretag (2007) also addresses the issue of international students but from the perspective of the university lecturers’ difficulties in managing all the expectations. There is a cynical thread in her article, which assumes that international students are worth millions of dollars to the Australian economy and so are treated differently from all the other students, especially where penalties for plagiarism are concerned. This is related to a long period of funding cuts experienced by Australian HEIs and the need for international income. The 2017 Higher Education Budget reveals further extreme funding cuts and new burdens on students in repaying their funding loans (Croucher, 2017). The funding cuts have forced universities to minimise their student support services as well. According to AUQA (2009), many new students do not have the necessary language skills when they enter the university and that lack of skill jeopardises their ability to access their studies successfully. Wilson (2009) further makes the point that members of minority or disadvantaged groups, who are often associated with low English language proficiency, are also more likely to drop out. Elder et al. (2007) make the link between vocabulary count and language proficiency (p. 27). However, the bulk of their paper is about the language proficiency of international students and how to develop this to assist them academically. The literature suggests clearly that language deficiency inhibits academic performance, but the lecturers Bretag (2007) interviewed confirmed that they treated international students’ work differently. Those assumptions of deficits will be tested in this

research by analysing the writing and the thinking skills demonstrated from data drawn from first year students.

Despite the implication here that English language proficiency is not the *sine qua non* for academic success, universities are situated in an environment in which academic discourse skills are vital for students to participate fully in the academic discourse community, which is in turn a prerequisite for passing their degree courses. Academic discourse skills include the ability to produce academic discourse, demonstrate higher order thinking skills and write correct academic English. However, there is no reason why, in the processes of learning and using those abilities, the students cannot also be empowered by developing a critical stance within their disciplines. To do this they will need to be engaged in the classroom in activities that are engaging, challenging and designed to develop their HOTS.

2.6.6. Higher Order Thinking Skills

The issue of Higher Order Thinking Skills (HOTS) will be explored as they are often identified as a vital component for academic success.

2.6.6.1. Evidence of thought in writing.

Higher order thinking skills are part of most universities' desirable graduate attributes and the relationship between thought and language has been hypothesised through many generations of philosophers and psychologists. To develop the idea that student writing can provide insights into their HOTS, the work of Vygotsky (1962) and two students of his work, Kozulin (1990) and Wertsch (1985), can be considered. According to Kozulin (1990, p. 183), literary discourse becomes a model for the reconstruction of individual consciousness. "Literature does not invent life... it reveals such capacities of human consciousness and communication which remain under-developed or invisible in other media of expression". This seems to support the idea that the quality of the thinking, and the cognitive and metacognitive processes associated with it, would be reflected in the writing. Wertsch (1985, p. 208) consults the work of his contemporary Vygotsky scholars to develop a more accurate unit of analysis of mental functioning than the word, and he argues that

“tool-mediated, goal-directed action is the appropriate unit of analysis in Vygotsky’s approach.”

The analytic unit of action avoids the shortcomings of word meaning while preserving its strengths. Regarding the latter, it is a unit that applies to the interpsychological as well as the intrapsychological plane, and it provides an appropriate framework for mediation.

If it can be assumed that the “tool-mediated, goal directed action” is writing, then it could be seen to be a unit of analysis that will provide inter-psychological as well as intra-psychological understanding of the actors. In addition, a range of researchers have all done work relating to assessing and developing thinking through the medium of writing.

Bissell and Lemons (2006) describe how they tested critical thinking in conjunction with content knowledge in a Biology course. Flateby (2010) describes a writing and thinking assessment tool that has been developed over thirteen years of iterations and is now in use across faculties and online at her US university. Their research could potentially become part of what could be done in the development of a HOTS assessment tool based on this research.

On a slightly different tack, Gammill (2006) describes a process whereby students learn and build knowledge by writing. She cites Carr (2002) to claim that “the physical act of writing plays a large part in the development of metacognitive skills” (p. 755), while she also claims that when writing, “students are encouraged to use a variety of problem-solving skills and thought processes, fostering critical thinking skills” (p. 754). Her research and thinking contribute to the idea that the writing provides evidence of the thinking.

Grimberg and Hand (2009) move close to the themes of this research in their paper. They also claim, like Gammill, that “... writing *per se* constitutes a learning process.” They developed a coding system for the analysis of their students’ writing up of a laboratory activity, which was guided by a Science Writing Heuristic (SWH). The analysis was based on a complexity scale that started with clarification and ended with argumentation. Their analysis included differentiation between high- and low-achievers, which featured in their intentions for the study. They could determine

students' reasoning processes and compare the cognitive involvement of low- and high-achieving students.

Menary (2007, p. 621) argues, also like Gammill (2006), "that writing transforms our cognitive abilities". He develops the thesis that writing is thought, using a series of phrases like "writing is thinking in action", "written sentences ... shape the cycle of processing that constitutes a mental act." He continues:

Consequently, there are two complementary senses in which writing is thinking, firstly there is the sense in which the act of writing is itself a process of thinking. Secondly there are the enduring products of this process, the vehicles of thought – written sentences. (p. 623)

Furthermore, Menary (2007, p. 631) argues: "If we take up the position of cognitive integration and see the external processes involved in writing working with the neural processes, then we understand *the entire co-ordinated result as an act of thinking.*" (my emphasis)

This way of viewing writing contributes to this research insofar as the discovery of HOTS in the writing of the participants is concerned. It is a basic premise that writing and thinking are inextricably linked and, if this is the case, then Menary's (2007) argument is supportive of this process.

Changing the focus slightly again, Leong (2013) uses a definition of critical thinking that aligns, to some extent, with Costa (2008) and his contribution to Marzano (2001) and Marzano and Kendall's (2007, 2008) HOTS, which will be discussed in more detail in the next section. He analysed a body of students' writing in a similar way to what is intended in this study, and he used a "discovery" (p. 579) approach, which aimed to explore the students' writing. He found that most of the students focussed on surface issues and he recommended ways of teaching that would enable the students to recognise deeper issues and write about them.

Finally, Roberts and Billings (2008) describe a process in which they teach school children how to think. They see the language skills as all being closely related to thinking. The preceding scholars all have in common the idea that writing reflects or constitutes thinking, and thus they all contribute to the underlying intent of this

research. If their methods and ideas are to be incorporated into this thesis as well as potentially into a follow up, a taxonomy of thinking skills is going to be important.

2.6.6.2. A taxonomy of HOTS.

If higher order thinking skills (HOTS) are to be examined, a taxonomy of such skills would be useful. The SOLO taxonomy of thinking skills was studied in relation to finding a usable taxonomy to apply to the student writing data to be used in this study, but the work done by Marzano (2001), Marzano and Kendall (2007, 2008), and Costa (2008) was favoured instead. This decision was made because the SOLO taxonomy analyses the extent to which subject matter has been learned (Maddern, 2012) and (Lake, 1999), while what is needed here is more about what thinking skills were used in the production of the assignments and about what can be identified in the writing. Marzano (2001), in *Designing a New Taxonomy of Educational Objectives*, worked with Bloom's Taxonomy of Learning Domains and developed it further. The hierarchy of Marzano's taxonomy works differently from Bloom's. Marzano's starts from the top, the highest level being Level 6 – self system thinking, in terms of which students determine their motivation and self-efficacy. After that the metacognitive system comes into play to determine goals and processes, and finally the actual cognitive systems start working on the problems and issues.

This is unusual when thinking of taxonomies of skills, especially if Bloom's taxonomy is the standard used. Marzano sees the process in terms of agency not of complexity, and therefore the behaviour he sets at the top is the self system, which is where the learner decides to engage with the task and once that is achieved, the metacognitive system sets goals and strategies and finally the cognitive system processes the relevant information (Marzano, 2001, p. 11). In addition, he considers how each processing level interacts with three domains of knowledge: information, mental procedures and psychomotor procedures. Costa (2008) adds dimensions to this, relating to the ability to push the boundaries of convention and explore the unknown, as well as generating trust. Marzano's highest level, the self system, resonates with Wilson's (2009) work in that one of the indicators of success she identifies is that students should be "purposeful", which is one of the indicators of

strong self system thinking. Self system thinking also aligns with self-regulation, one of the commonly used indicators of higher order thinking (Bekele, 2009). Marzano's taxonomy and subsequent work in Marzano and Kendall (2007, 2008) and in Costa (2008) should make it possible to develop an assessment of what sort of thinking students have done in the production of their assessments, by breaking it down into component parts. Their taxonomy includes details about all levels and types of thinking but says little about the use of metaphor as evidence of thinking.

2.6.7. Metaphor.

Metaphor is used as an analytical tool because writers often have recourse to metaphor to make meaning. Lakoff and Johnson (1980b, p. 37) suggest that metaphor is "a way of conceiving of something in terms of another...", while Pugh, Hicks, and Davis (1997, p. 18) suggest that the use of metaphor assists in constructing meaning, exploring the unknown, discovering underlying knowledge, and formulating arguments. (Faragher, 1995, pp. 59-60) noted that, "...the generation of successful metaphors indicates the ability to think analogically, which arguably is a complex intellectual process. It involves the construction of mental models and comparisons that interact and cause reformulation of the communication by the receiver."

Use of metaphor can also indicate higher quality writing. Kim, Lee, and Lee (2012) found that more creative writers used more content words and more proper nouns (an identified feature of academic writing), and that they had an individualistic perspective and tended to think in unconventional ways. According to Coulson (2002, p. 335), citing Lakoff and Johnson (1980), "metaphors offer the linguist a window into the mind." Coulson also asks if language and cognition are separable, and she quotes Cacciari's three reasons for why we use metaphors: firstly, to help us understand and express relevant parts of our inner lives, secondly to extend pre-existing categories, and thirdly because literal language is not very good at expressing the complexity of perceptual experience (Coulson, 2002, p. 339). The role of figurative language and how it connects to cognition supports the idea that the metaphors generated in student writing might contribute to understanding the thought processes that the students bring to the writing of their assignments.

2.7. Summary

This Literature Review reflects the search for appropriate authorities to support the research planned to discover answers to the two research questions that ask about the first-year student experience in writing an essay in the persuasive genre, and how TP can enhance that experience. Some of the critical threads explored are ways of describing first year students, criteria for analysing their writing and discovering the thought processes involved in that writing. The Higher Order Thinking Skills (HOTS) as defined by Marzano, Marzano and Kendall and Costa seem important for discovering the thinking skills needed for success. In addition, possible authorities for describing academic literacies, including writing and discourse have been identified. This is important for this study because it will facilitate analysis of the students' essays and enable the identification of the contents of their VUBs so that future academic curriculum planners and assessors will have more knowledge of what students are likely to be able to do when they start their studies and what is needed to enhance their learning experience.

CHAPTER THREE: THEORETICAL FRAMEWORK

3.1. Introduction

There are two main strands in the following account that develop from the pre-story in the Background (1.1) above and the Literature Review (Chapter 2). They derive directly from the research questions which, in short, amount to: How do first year students in a literacy course in education experience the writing of a critical comparative analysis essay in the persuasive genre, which encapsulates all the main themes and principles they have learnt that semester? And how can that experience be enhanced? The first question is answered by reading their essays and interviewing them and some of their lecturers, and the second by revealing what they already can do and developing hypotheses about how to enhance that. To do the above it was necessary to develop theory and concepts about their existing skills and describe them so that they can be related or compared with those normally required for academic success. Central to revealing what they already can do was the use of the construct of the VUB which was mentioned earlier (1.6).

It is the exploration of the VUB that leads to studying the essays and interviews as forms of evidence of what students can do. The university requires a range of academic literacies to be present and available for use in each student, including a range of higher order thinking skills (HOTS). The academic literacies of discourse and writing are well researched, but the HOTS are more difficult to identify. It was decided, based on the literature review, to use Marzano (2001) and Marzano and Kendall (2007, 2008) and Costa (2008)¹⁴ to find appropriate descriptors for this analysis. In addition, scholars who have studied academic discourse, metaphor and vocabulary will be consulted to add to the dimensions of academic literacies. However, before any of that analysis could be done a decision had to be made about

¹⁴ These works will be referred to as Marzano et al. in future.

research methodology, and a case study method was ultimately chosen, (for a justification, see Chapter 4). Figure 3.1 shows the context of the study, principles central to TP, how academic literacies are constituted and the sources of the data and how they all relate to each other.

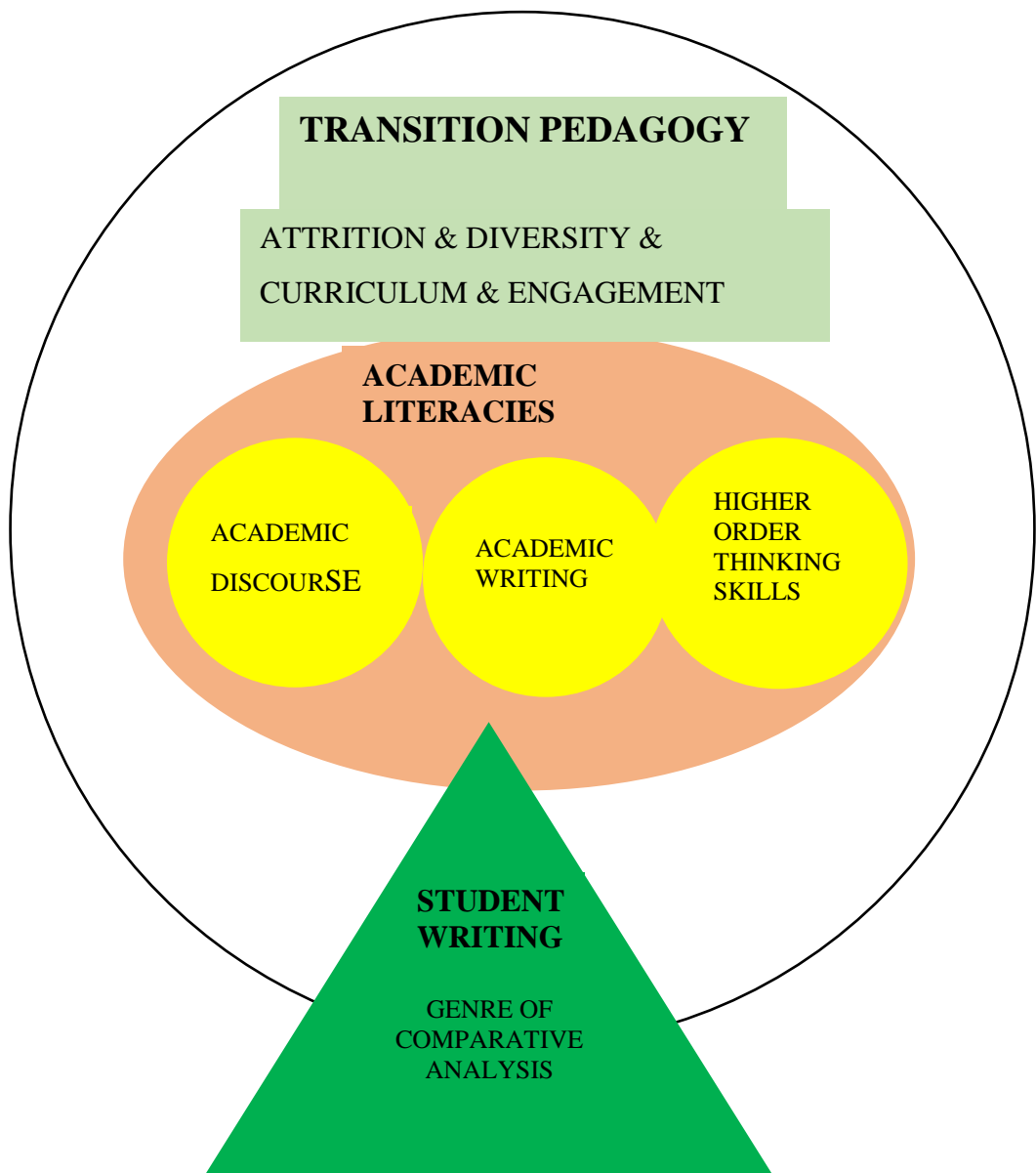


Figure 3.1. Theoretical Framework

3.2. Higher Order Thinking Skills (HOTS) – Marzano and Kendall

Marzano, (2001) and Marzano and Kendall's (2007, 2008), taxonomy of higher order thinking skills is based on Bloom's Taxonomy but works in two dimensions and, in a way, in reverse order. In their taxonomy they place the self system at the top because that is where they place motivation, which includes importance, efficacy, and emotional response (in a type of trinity that constitutes overall motivation). They are all qualities that need to be present for SWs to be successful. This is coupled with the metacognitive system, which has four functions: specifying goals, process monitoring, monitoring clarity and monitoring accuracy. They suggest that these functions are responsible for "executive control" (Marzano & Kendall 2008 p. 21). This is followed by the next four levels which comprise the cognitive system, where the details of thinking that apply to particular disciplines and skills are developed. The highest order thinking is placed in the self system and the metacognitive system. They also added three more domains of knowledge to the entire picture; the domain of psychomotor procedures, mental procedures and information. These are then set alongside, and together with, the levels of processing in a two-dimensional picture. However, the domains of knowledge cannot be assessed through writing so they are only mentioned here to give a more complete idea of Marzano (2001) and Marzano and Kendall (2007, 2008)'s work.

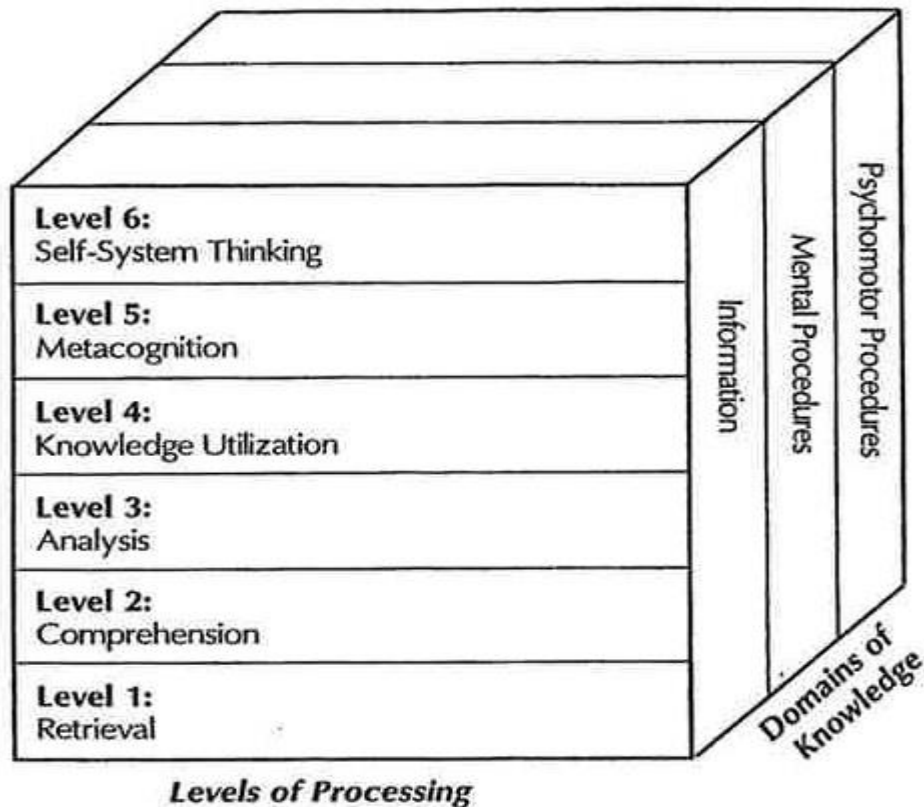


Figure 3.2. Marzano's Levels

Note: Reproduced from *Designing a new taxonomy of educational objectives* (p. 60), by R. Marzano, 2001, Thousand Oaks, CA: Corwin Press, Inc. Copyright 2001 by Corwin Press, Inc.

The purpose of Marzano et al.'s work is to enable teachers to activate and develop their school students' thinking skills whereas in this study their goals have been used as assessment criteria to assess the level and types of thinking skills present in this sample of student writing and interviews. It was necessary to adapt some of the criteria to be able to apply them to the data but that was always done within the limits of the descriptors provided in Marzano et al.'s literature. When the descriptors were studied in detail it was found that they could be applied equally to the HOTS desirable in university students as school students with the necessary *caveat* that the learning material is usually different.

3.2.1. Self system thinking – the top level of the taxonomy.

Marzano worked with Bloom's Taxonomy and introduced an additional level at the top of the hierarchy, unlike Bloom's which had the top skill at the bottom of the hierarchy. They saw self system thinking more as the first step in a learning process

and the most important because it summarises the abilities present in a self-regulated learner. In Marzano (2001) the self system was described as containing a network of interrelated beliefs and goals that are used to make judgments about the advisability of engaging in a new task. It is also a prime determiner of the motivation brought to the task. The following quotation sums up how the three elements interact: “If a task is judged important, if the probability of success is high, and positive affect is generated ...the individual will be motivated to engage in the new task...” (p. 11). This shows how the system includes importance, examining efficacy and emotional response. He argues that emotional response, with importance and efficacy, are incorporated into a type of trinity of overall motivation, as mentioned earlier. For a SW to be assumed to have a high level of motivation they must have a strong sense of efficacy and importance, and their emotional response to the task must be positive. This is the highest level of HOTS. It is the most important for this case study because it is the highest indicator in Marzano (2001) and Marzano and Kendall’s (2007, 2008) taxonomy, and can therefore be assumed to be a strong indicator of potential learning success for SWs in this study. However, Marzano and Kendall (2007, p. 57) make the point that different situations and contexts might evoke different responses to the sense of efficacy. In the context of writing a critical comparative analysis relating to a pedagogical situation that is relevant to the content of their course, the SWs in this study could be expected to have a sense of efficacy. In an aggregated analysis like this, if most students show evidence of all four self system levels then it is assumed that incoming students have such skills in their VUBs and can therefore be assumed to have the potential for academic success. The next section describes the four levels that constitute the self system.

3.2.1.1. Examining importance.

The first issue for a learner, when faced with a new learning task, is to decide if it is important for them. This is an adaptation of the Marzano theory insofar as Marzano is concerned with the individual’s sense of a certain sort of knowledge as being important to that person for the realisation of their personal goals. In this case evidence in the written data of the SWs’ sense of the importance of learning to teach

and to enable children to acquire literacy, is a potential measure which is supplemented by the interview data.

If a student has strong self system thinking they can be described as self-regulated. Marzano (2001, pp. 107-108) cites Bandura (1997, p. 174), who argues that, “A fundamental goal of education is to equip students with self-regulatory capabilities that enable them to educate themselves. Self-directedness not only contributes to success in formal instruction, but also promises lifelong learning”.

Faragher (1995) argued that her L2 writers showed self-regulation according to Vygotsky’s criteria, although their writing in English was non-standard. In this thesis it is argued, admittedly according to a different set of criteria, that many first-year students demonstrate HOTS and those who show self system thinking can be described as self-regulated and are likely to be academically successful.

3.2.1.2. *Examining efficacy.*

According to Marzano (2007, p. 57), beliefs about efficacy “address the extent to which individuals believe they have the resources, ability or power to change a situation.” Relative to this research when the SWs examined the efficacy of the teacher’s practice and the mother and auntie’s so-called teaching activities with the little girl. They covered ground that would be covered in self system questions relating to efficacy, such as Can you improve?, How well do you think you can do?, and How well can you learn?

3.2.1.3. *Examining emotional response.*

Examining emotional response is an area where there is a possibility of confusion. Marzano and Kendall (2008) intend this to be a situation where the learner examines their own emotional responses to learning tasks in all three domains. It needs to be separated from Costa’s (2008) empathy, which is more about understanding how others are feeling. However, it was explored in the interviews to help obtain a better measure of this response and it added to the identification of the SW’s HOTS. Marzano and Kendall (2007, p. 111) explain this further:

The key feature of this type of self system thinking is the identification of a pattern of thinking or experiences underlying a given association along with the reasonableness of this pattern of thinking. There is no particular attempt to change these associations – only to understand them. This said, an argument can be made that awareness of one’s emotional associations provides the opportunity for some control over them.

The descriptor refers to the personal, emotional response of the learner to their learning so it will be necessary to test the SW’s sensitivity to the effect of emotion on their learning in the children they are teaching.

3.2.1.4. Examining overall motivation.

The complication in identifying this descriptor in the data is that it is considered as an *omnibus* self system process, and incorporates the other three aspects of the system: importance, efficacy and emotional responses. Marzano and Kendall (2008) put it like this:

...as a coordinated dynamic, motivation is under a student’s control when it is recognized as a decision as opposed to a reaction on their part. Students can be presented with the notion that being aware of their thoughts regarding the importance of a task, their sense of efficacy about it, and their emotional response to it provides them with some control over their level of motivation in a given situation. With this awareness in place, students can be presented with the simple strategy of asking and answering the following question as a technique for monitoring their overall motivation: “Is my level of motivation sufficient to obtain the results I desire in this situation?” If the answer to this question is negative the student can make the necessary alterations in one of, or more of, the constituent elements: ascribed importance, sense of efficacy and emotional response (p. 165).

To use this as a guideline for the purposes of this research, additional evidence within the evidence of motivation, must be found of the other three aspects as well. (c.f. Table 5.1)

3.2.2. Metacognition.

“The *metacognitive* system has been described by researchers and theorists as responsible for monitoring, evaluating and regulating the functioning of all other types of thought...these functions are ...responsible for executive control.” (Marzano & Kendall, 2007, p. 53).

This is when the self system has decided that the task will be attempted and goals need to be set, as well as strategies designed, to achieve those goals. (Marzano & Kendall, 2007).

3.2.2.1. Goal specification.

The metacognitive process of specifying goals involves setting specific goals relative to one's understanding or skill at a specific type of knowledge and developing a plan for accomplishing the goals (Marzano & Kendall 2007, p. 117).

3.2.2.2. Process monitoring.

This is usually to do with checking on personal progress but it is linked to specified goals (Marzano & Kendall, 2007, p. 102), and in this study can be used where the literacy learning process is evaluated in terms of the transcripts.

3.2.2.3. Monitoring clarity.

Marzano and Kendall (2007, pp. 104-106) provide examples of the sort of questions they might use in a classroom to find out what a child finds confusing about an area of knowledge being taught. Coding would depend on the SWs saying what they found confusing or difficult to understand about an aspect of what was being tested in the assessment. This is an issue that was further explored in the interviews.

Marzano and Kendall (2007, pp. 104-106) show that this is to do with their children's own sense of clarity about what is being taught and learnt. In this study, this descriptor will be used to discover what mental processes the SWs engaged in to ensure that their writing would be well understood. In the interviews SWs were asked about their writing process and if they monitored their clarity.

3.2.2.4. Monitoring accuracy.

Marzano and Kendall (2007, p. 105) explain that this is different from monitoring clarity although it is related. SWs can be clear about some knowledge and understand it well but not be accurate in their representation of it. For this descriptor

to be in place they must “reference some outside source as proof of their assessment of accuracy.”

The next level down is where they apply knowledge. These next levels are collectively described as the **cognitive system**.

3.2.3. Knowledge utilization.

The processes in this category are all of those that are employed when individuals wish to accomplish a task. “The student’s mental activity is focused on a specific situation that is enhanced because of the knowledge” (Marzano & Kendall, 2007, p. 91).

3.2.3.1. *Decision-making.*

“Decision making involves selecting among alternatives that initially appear equal” (Marzano & Kendall, 2008, p. 93). This node is expected to be used often because it speaks directly to the essay task which was to distinguish between the most effective learning processes and environments depicted in the two transcripts.

3.2.3.2. *Problem-solving.*

“The process of problem solving is used when an individual attempts to accomplish a goal for which an obstacle exists (Rowe, 1985). (...) At its core, then, a defining characteristic of a problem is an obstacle or limiting condition” (Marzano, 2001, p. 46).

In the case of the teachers/adults in the transcripts, the goal was learning and the SWs had to identify the obstacles or limiting conditions to the accomplishment of that goal. They also had to identify strategies for overcoming those obstacles or limiting conditions.

3.2.3.3. *Experimental inquiry - generate and test hypothesis.*

Marzano (2001, p. 47) explains that “Metaphorically, experimental enquiry might be described as the process used when answering questions such as, How can this be explained? Or Based on this explanation, what can be predicted?”

According to Marzano and Kendall (2008, p. 104) “A critical feature of experimenting is that the data be newly collected by the student”. In this essay the writers were not expected to collect data and test hypotheses but if they generated one it was credited under this descriptor, and could have been introduced by the subjunctives – ‘could’ or ‘might have’.

3.2.3.4. Investigation.

This is different from experimental inquiry because it involves using opinions and information gathered from other sources, not original data (Marzano & Kendall, 2007, p. 98). This skill is characterised by actions like taking a position, defining features of a phenomenon, explaining how’s and why’s of an event, and speculating on what would have happened *if*, (Marzano & Kendall, 2008, p. 116). This essay topic was a critical, comparative analysis of two transcripts of teacher talk and if it was successfully undertaken, the whole essay fitted into this category of skill.

3.2.4. Analysis.

This is the next category and Marzano (2001, p. 38) explains that “as a function of applying the analysis processes, an individual elaborates on the knowledge as comprehended”. It also goes beyond “localised inferences” and the “identification of essential versus non-essential characteristics”. It “involves the generation of new information not already possessed by the individual.” Fine detail is required, and this potentially generates new conclusions (Marzano & Kendall, 2007, p. 79). Five analysis processes are involved: matching, classifying, analysing errors, generalising and specifying.

3.2.4.1. Matching.

According to Marzano and Kendall (2008, pp. 55, 59, 64), matching involves identifying similarities and differences – *compare and contrast* or sort, or create an analogy or a metaphor (p. 55). Matching focuses on similarities and differences and the abstract relationships between them. However, there is potential conflict with metaphor, a criterion outside of Marzano’s levels, and this was coded separately because metaphor creation is a richer version of matching, as it relates to the writers’

efforts to create meaning for their readers and put their thoughts into words by means of images.

3.2.4.2. Classification.

Marzano (2001, p. 39) reflects that, “Classification refers to organising knowledge into meaningful categories. Like matching, it is basic to human thought.... People make the unfamiliar familiar by organising the myriad stimuli that bombard their senses into like categories.”

This goes beyond simple matching. “It forces the learner to organise knowledge into hierarchic structures” (Marzano, 2001, p. 40). “Classifying goes beyond organising items into groups or categories...(it) involves identification of superordinate and subordinate categories into which the knowledge can be organised as opposed to identifying similarities and differences only.” (Marzano & Kendall, 2007, p. 65).

3.2.4.3. Error analysis.

According to Marzano and Kendall (2007, p. 85), error analysis always involves information that is false or inaccurate. However, Marzano and Kendall (2008, p. 72) later included identifying problems, issues and misunderstandings in this descriptor as well as the following actions: assess, critique, diagnose, evaluate, edit and revise. This represents a development from an earlier Marzano (2001) conceptualisation, where only errors that occurred in argument were included.

3.2.4.4. Generalising.

Marzano and Kendall (2008, p. 86) argue that “Generalising is a fairly sophisticated skill as it relates to organising ideas. It involves the articulation of new generalisations and principles based on known generalisations and principles”. In an earlier text, Marzano (2001, p. 44) goes into more philosophical detail about the processes involved here, and he suggests that generalising is neither purely inductive nor purely deductive and uses the term *retroduction*, because it is a more “fruitful approach to understanding the nature of inferential thinking. [It is] the act of

generating and shaping an idea based on one or more cases. ... Generalising within the New Taxonomy then is best described as a retroductive process that is oriented more towards induction than deduction, but involves both during different aspects of the process.” (p. 44).

He cites an earlier work (Marzano et al., 1997) in which the following steps were suggested:

1. Focus on specific pieces of information or observations. Try not to assume anything.
2. Look for patterns or connections in the information you have identified.
3. Make a general statement that explains the patterns or connections you have observed.
4. Make more observations to see if your generalisation holds up; if it does not, change it as necessary.

The SWs in this case study were required to write a critical, comparative analysis of two sets of discourse in the persuasive genre; this should involve all the processes described in generalisation according to the Marzano Taxonomy

3.2.4.5. *Specifying.*

“This skill involves making and defending predictions about what might happen or what will necessarily happen in a given situation” (Marzano & Kendall, 2008, p. 87). On the face of it, it seems very similar to experimenting or hypothesis, however it seems that it deals more in certainties whereas the experimenting/hypothesising is more tentative and therefore arguably more aligned with the requirements of Academic Discourse.

3.2.5. *Comprehension.*

“...comprehension involves the identification and representation of the more important versus the less important aspects of that knowledge.” (Marzano, 2001, p. 64).

3.2.5.1. *Synthesis or integrating.*

“Integrating involves identifying and articulating the critical or essential elements of knowledge” (Marzano & Kendall, 2008, p. 43), and using those elements to support their statements using logic and organisational skills. Evidence that they have effectively synthesised knowledge is presented in a statement about the important or critical facts of that knowledge (Marzano, 2001, p. 35). They will have distinguished between critical and non-critical facts (Marzano & Kendall, 2008, p. 43). Details will be referred to in support of the generalising that led to the integration of the information, and the distinction referred to above (Marzano & Kendall, 2007, p. 73).

Text was coded at this node when actions like the following were frequently employed:

- Described how or why (or both)
- Described the key parts of
- Described the effects
- Described the relationship between
- Explained ways in which
- Made connections between
- Paraphrased
- Summarised (Marzano & Kendall, 2008, p. 43).

3.2.5.2. *Symbolising.*

Marzano (2001, p. 35) explains this as a non-linguistic, i.e. symbolic, expression of knowledge. He suggests that graphic organisers are an example of this. However according to Marzano and Kendall (2008, p. 48) this “does not mean that language is incompatible with symbolising tasks”. The above does not imply that accuracy is not part of the depiction of the knowledge; Marzano and Kendall (2007, p. 75) claim that “... the process of symbolising assumes an accurate integration of knowledge. Consequently, to demonstrate symbolising knowledge, a student would necessarily have integrated that knowledge.” In that way integration or synthesis interacts with symbolising.

3.2.6. Retrieval.

Marzano (2001, p. 31) sees this first level of the cognitive system as simply about memory and describes retrieval “as the activation and transfer of knowledge from permanent memory to working memory, where it might be consciously processed.” He includes organising ideas and details in the knowledge to be transferred. In his definition, working memory is where inferences and reasoning take place. In Marzano and Kendall (2008), following Marzano and Kendall (2007), three types of retrieval are mentioned: recognising, recalling, and executing.

3.2.6.1. *Recognising.*

Marzano and Kendall (2008, p. 25) note that recognising involves determining whether incoming information is accurate, inaccurate, or unknown. “Recognising organising ideas involves identifying accurate statements about generalisations and principles” (Marzano & Kendall, 2008, p. 31). Indicators of the presence of recognising would be:

- Select from a list
- Identify from a list
- Determine if the following statements are true...

For any of the indicators to be present it would have been necessary for the data being analysed here to include lists and statements.

3.2.6.2. *Recalling.*

“Recalling involves producing accurate information as opposed to simply recognising it...in-depth knowledge is not required” (Marzano & Kendall, 2008, p. 33). It involves generating as opposed to simply recognizing information (Marzano & Kendall, 2007, p. 69). This is the only one of the three indicators of Retrieval that applies in this case. Executing would not apply directly because it does not apply to the domain of information and requires students to carry out a procedure.

Interestingly an example of a procedure Marzano uses is writing a persuasive essay, but they expand that and say that it can be the highest level of expectation for complex processes (2008, p. 42). They also make the point that executing with

mental procedures involves being able to perform the procedure without being able to explain how it works.

This covers descriptions of Marzano's taxonomy of thinking skills and provides an idea of how the definitions can be applied to the analysis of the data. However, Costa (2008) worked with Marzano (Costa & Marzano, 1987) and developed the thinking skills in strongly related ways, but because his work has a different focus, it was decided to separate the two sets of descriptors.

3.3. Higher Order Thinking Skills – Costa

Costa's focus is more on emotional intelligence and the importance of understanding the other person and being able to paraphrase and empathise with their interlocutors. These are important skills. He also sees the ability to 'think out of the box' as important and empowering for his students as is the ability to push themselves beyond their own limits. In Costa (2008, p. 23) he writes about "Thinking together", he advocates building an "ecology of thought" through collaborating. He acknowledges that collaboration is difficult because among other things it means "relaxing our grip on certainties and opening our minds to new perspectives, ...". He claims that "as learners become part of a whole they will not lose their individuality, only their egocentricity." He cites Steil and Blommelje (2007) who argue "that learning to listen with understanding and empathy ... is one of the most powerful skills of intelligent problem-solvers" (Costa, 2008). Costa advocates "instruction in and practice of focusing mental energy on understanding others; summarising and paraphrasing others' thoughts; empathizing; setting aside judgments, solutions and autobiographical responses." In addition the ability to think 'out of the box' subsumes pushing their own boundaries. It is these activities that were examined in the SWs' writing and interviews in this study.

3.3.1. Generating new ways of viewing a situation outside the bounds of standard conventions.

In terms of the data in this study it is too early in their student careers to expect to see this sort of evidence in their essays. However, it was discussed in the interviews.

3.3.2. Focusing mental energy on understanding others and empathising.

Empathy and understanding are different from the emotional responses described in the Marzano descriptors, it represents the ability to imagine how the child in either the home or the classroom was feeling in their learning situation.

3.3.3. Understanding and paraphrasing others' thoughts.

Costa relates this skill to empathy and understanding ...

...the teacher should reinforce the skill of valuing others' viewpoints by reminding all students to paraphrase, clarify, or question what their peers in other groups report, so that they can better understand each group's conclusions rather than judging them (Costa, 2008, p. 22).

Costa directs the focus to understanding rather than judging, which adds a dimension to the activity. Leong (2013, p. 576) deepens the sense of Costa's descriptors of empathy and understanding when he uses an interesting definition of critical thinking, which consists of a two-stage process. The second stage incorporates the idea of paraphrasing, drawing on Dobson and Feak (2001, p. 186):

The second stage, *creative reasoning*, requires one to create a new, logically defensible text, whether oral or written, related to the original one. In short, critical thinking means more than simply comprehending a text well enough to summarise it or agree or disagree with it. It requires ... not merely 'knowledge-telling' but 'knowledge-transforming'.

3.3.4. Setting aside judgements, solutions and autobiographical responses.

Costa adds 'setting aside judgements, solutions and autobiographical responses' to his list of HOTS. In the context of Costa's (2008) article, I think this is about SWs imposing personal attitudes and judgements on another person's behaviour. Costa

intends that we should be open to other ideas “temporarily suspending what I, individually, think.”

3.4. Metaphors also Grammatical Metaphors which Connect with Academic Discourse

This discussion of metaphors has been placed in this position because it is a bridge between HOTS and academic discourse and writing. It is used more in the argument about HOTS than it is in the writing area. Marzano’s category of Matching (Marzano & Kendall, 2008, p. 55) includes the creation of metaphors and symbolising; however, Woodward-Kron’s (2008) discussion of ‘grammatical metaphor’ introduced another possibility. In her paper it was shown that by nominalising initial phrases in a sentence, it was possible to expand the noun phrase to include a definition of the subject under discussion. In her paper this nominalisation led to a greater abstraction, hence metaphors of the original statement, and it demonstrated her students’ richer understanding and expression of the technical terms with a field-specific meaning in their disciplinary discourse context:

... the presence of grammatical metaphor in the student texts, how it was realised, and its association with abstraction was important to identify and investigate to determine: i) whether it featured in the successful students’ writing as the literature suggests, and ii) whether it played a role in the specialist language of the learner educational discourse (p. 238).

There is a process of development in which grammatical metaphors evolve into abstract technical terms with a field specific meaning (Woodward-Kron, 2008, p. 239). However, in terms of developing the argument that writing, in which the creation of metaphors is a feature, is better writing, Woodward-Kron’s (2008) concept of grammatical metaphor and the work that derives from Lakoff and Johnson (1980) and Pugh et al. (1997) occupy parallel universes.

Woodward-Kron’s view is strictly related to the role of metaphors around the development of technicality in student writing and Lakoff and Johnson (1980) and Pugh et al. (1997) are more concerned with creating new universes. It was decided to

include metaphor in the analysis of this data because the Marzano descriptors do not include it directly, except in Marzano and Kendall (2008), which is about assessing objectives. They mention it in their Level 3 Analysis (sub category Matching) in the list of terms that might be used to identify ‘matching’ (p. 55), and then in the context of describing a task in which the students must identify “abstract similarities when there are few or no concrete similarities” (p. 59). It seems that the ability to generate and use metaphors is likely to be a potential marker for SWs’ ability to think abstractly and creatively. In support of this contention, Kessler and Quinn (1987, p. 179) cited Di Pietro:

Metaphor is defined as ‘the relating of disparate objects and ideas to find a communality among them’. The ability of a metaphor to point up a surprising similarity between apparently unlike things demonstrates creativity in language that extends beyond grammatical innovations observed in syntactic complexity. As linguists and philosophers alike argue, the nature of human thinking is essentially metaphoric and the metaphorising process is the primary means for creating and, especially, transferring meaning from one universe of knowledge to another (Di Pietro, 1976; Kaput, 1979; Nietzsche, 1971).

The writers in the data under analysis here might have recourse to transferring meaning from their universe of knowledge, i.e. their *virtual uni bag*, to the universe of knowledge of their essay. To do that, they might create a metaphor in which they compare “disparate objects” drawn from their own knowledge and culture to make meaning in their essays. Pugh et al. (1997, p. 8) suggest that “metaphorical ways of knowing endeavour to press established relationships between language and meaning into new fields through imaginative comparison.” They suggest that,

Metaphor becomes, ... a device for exploring the unknown in terms of the known, for helping us to discover and understand new knowledge. It is a tool of insight. It provides us with a perspective for comprehending something unknown by comparing it to familiar objects and experiences. (p. 18).

The same writers devote a chapter to exploring Ways of Knowing. They suggest that there is a variety of possibilities of showing what is ‘known’; “one can employ different ways of knowing at different times and use them in relation to each other” (p. 35). They suggest that standardised tests might not always reveal what students are good at, that there is a range of possibilities involving creative activities that could be better indicators of the abilities of students who do not ‘fit’ the standard

mould. This research is aimed at discovering what the SWs can do, as shown in the data, so that they might be assessed in terms of their abilities rather than their deficits. Revealing the metaphors they have used in their essays, and therefore in their arguments, could contribute to that endeavour. Lakoff and Johnson (1980, p. 46) said that: “Metaphors structure more than language: they structure thoughts, attitudes and actions and come from our experience. They assert that this structure is reflected in our ‘literal language’.” Furthermore, metaphors “express and convey cultural knowledge” (Bock & Winburg, 1993, p. 69). There seems to be the potential for discovering more about the SWs’ backgrounds and experiences in the revelation of their metaphors as well as discovering their quality to add to their VUBs.

An added dimension to this discussion comes from Lindqvist and Nordanger (2010, p. 57),

New metaphors have the power to create a new reality, allowing us to discover something new in a world we have not previously been able to discover. When a new metaphor enters the conceptual system that we base our actions on, it will change this system and eventually also the ideas and actions that the system has given rise to. Bäckström (2003) argues that what is unique about metaphorical thinking is that the metaphor creates its own system of association and is thereby not tied to conventions. Instead, it links things and objects that one normally does not link. Thus, it lays bare a routine use of the language through alienation, which suggests that the metaphor itself creates its own laws and rules to some extent.

Rather than meaning, the metaphor is characterised by the fact that it does something; instead of accounting for thoughts, it creates thoughts. It functions as a destabiliser of meaning. (Bäckström, 2003, s. 234).

They wrote this in the context of research into teachers describing their experience and insights and they developed an argument about metaphors that became institutionalised and ‘died’ but that they can be brought back to life. This is germane to this research because many of the jargon terms used in this essay would appear metaphorical to a lay person so it is possible that they are still living metaphors and should be credited to the SWs who have used them.

3.5. Conclusion to Higher Order Thinking Skills

Ways of reading student essays have been suggested in the above descriptions of Marzano et al.'s theories and descriptions of desirable thinking skills including the use of metaphors. The theory underlying and guiding other aspects of the contents of the VUBs, the presence of the use of academic discourse and the evidence of academic writing; vocabulary; idiosyncratic expressions and/or *AusE*; will be discussed next.

3.6. Academic Discourse

Academic discourse as reflected in the literature review includes behaviour, like critical thinking, disputation, openness, tolerance, reflection, scepticism, honesty, respect for intellectual property, collegiality, critique and academic freedom (Wallace, Schirato & Bright 1999 p.p. 15-21). As previously mentioned, other markers of what constitutes academic discourse are argument, referencing conventions, scientific discourse and academic genres. The use of referencing conventions is discussed here and academic genres are also mentioned.

Specific markers of academic discourse that will be evidenced in the writing are discussed in the works of Hyland (1998) and Donesch-Jezo (2010). They use the term *metadiscourse* to refer to the writer-reader interaction. Donesch-Jezo (2010) suggested that “The interactive dimension helps to organize propositional information in such a way that the reader finds it coherent and convincing” (p. 33). Hyland (1998, p. 438) supports this by saying that “metadiscourse is recognised as an important means of facilitating communication, supporting a writer’s position and building a relationship with an audience”. They include the following categories: transition markers, frame markers, endophoric markers, evidentials, code glosses, hedges, boosters, attitude markers, self-mentions, and engagement markers as providing ways in which writers communicate their intended meanings.

The first point, conjunctions, in the following list of metadiscourse markers, is an example of some overlap between the descriptors for academic writing and academic discourse. It appears in the Hyland/Donesch-Jezo list but is arguably a descriptor also well suited to academic writing.

- In their discussions of conjunctions (transition markers) Leech, (1975), cited by Crystal (2004, p. 318) claims that they facilitate phrasal links, which are “especially useful when considering alternatives and explaining things – important features of academic and technical writing.”
- Frame markings are another technique commonly used in academic discourse and according to Hyland (1998, p. 443) “provide interpretive framing information about longer elements of the discourse”.
- Endophoric markers according to Hyland (1998, p. 443), “... play an important role in making additional ideational material salient and therefore available to the reader in aiding the recovery of the writer’s argumentative intentions.”
- Evidentials are different between evaluation and citation – Hyland (1998, p. 443) makes the distinction: “Citations are seen here as both reporting previous work and providing an assessment of that work. Evidentials advance the writer’s position by demonstrating an awareness of prior research and acknowledging an allegiance to the academic community.”
- Code glosses is a strategy used to “help readers grasp meanings of ideational material” (Hyland, 1998, p. 442). The term refers “to the writer’s act of supplying additional information to ensure the reader can recover the writer’s intended meaning, either by explaining, comparing or expanding what has been said.” (p. 443).

These metadiscourse markers strengthen the theory about the interactional dimension because according to Donesch-Jezo (2010, p. 33) they involve readers in the text and open opportunities for them to contribute to the discourse through interpersonal metadiscourse. They have added further linguistic structures to this end because Hyland (1998, p. 453) makes a strong case for recognising the following as integral to academic writing. He says metadiscourse is “critical to the overall purpose of language use”, and “In this way academic argument is an independent creativity shaped by accountability to shared experience and shared conventions of discourse practices.” Here the idea of “shared conventions of discourse practices” is the focus. These SWs are working at sharing the conventions of discourse practises. Other markers of academic discourse are:

- Hedges - Hyland (1998, p. 443) says that hedges “are items which mark the writer’s reluctance to present or evaluate propositional information categorically.” He also reminds his readers that hedges “can mark statements as provisional and seek to involve readers and participants in their ratification” (Hyland, 1998, p. 444).
- Boosters “imply certainty and emphasise the force of a proposition.” (Hyland, 1998, p. 444) but they must also “observe the community’s rules concerning rhetorical respect for colleagues’ views” (Hyland, 1998, p. 444).
- Attitude can also be shown in the use of certain evaluative adjectives and adverbs, “Attitude markers express the writer’s affective attitude to textual information in a more varied way than hedges, conveying surprise, obligation, agreement, importance, and so on.” They also “imply a stance towards the reader” (Hyland, 1998, p. 444).
- Related to attitude but less evident were self-mentions and engagement markers. Hyland (1998, p. 444) makes the point that self-mentions, (in his case “person markers”) “reflect the importance of the degree of author presence in contributing to the variability in tenor of the text.”
- He also comments on engagement markers which he calls “relational markers which are supposed to draw the reader into a participant position in a persuasive text. (Hyland, 1998, p. 444).
- An important quality of academic discourse is the appropriate use of discipline jargon, which shows the SW’s grasp of the discipline concepts and discourse. Woodward-Kron (2008) uses the term *technicality* in a functional linguistics sense. The paper referred to relates to the writing of pre-service education students and is therefore especially relevant to this study.

... the specialist language of a discipline is intrinsic to students’ learning of disciplinary knowledge; students need to show their understanding of concepts, phenomena, relations between phenomena etc. by incorporating the specialist language and terminology of their discipline into their writing accurately. They also need to adopt the specialist language in order to make meaning and engage with disciplinary knowledge. This paper has demonstrated that adopting the specialist language of the discipline is intrinsic to learning disciplinary knowledge (Woodward-Kron, 2008, p. 246).

It might be fair to assume that if SWs have a rich vocabulary of *technical* terms that they are on their way towards mastering the appropriate academic discourse including subject jargon.

Another aspect of academic discourse behaviour is the practice of referencing which has been discussed in detail in the Literature Review and elsewhere later (7.2.1.2). Register is also an important aspect of academic discourse; Elander, Harrington, Norton, Robinson, and Reddy (2006, p. 78) develop theory about register in academic writing and cite Fabb and Durant

Our choice of register when we write displays our attitude towards our reader and towards the subject matter we are writing about. ... One of the main characteristics of the register appropriate for academic writing is that it does not resemble the register of conventional speech. (Fabb & Durant, 1993, pp. 72, 74-75)

3.7. Academic Writing

The criteria for judging these SWs' attempts to use academic discourse and practise academic writing are conventional and based on the "assumption that the discourse of the academy, as it was understood in the 'white, male academic establishment' of the past," (Bizzell, 2005, p. 323) is the only acceptable discourse. Nevertheless, the context of the inclusive university's agenda is kept in mind during the analysis because of the tension between the urgency that writing should be understandable and sensible to the academic markers as well as reflective of the students' varying world views. The issue is that writing and discourse techniques can be learnt and relatively easily taught, so that beginning students should not be penalised where they are not yet in place in their VUBs. They are also visible whereas the HOTS are less visible and arguably less easily taught.

Some of the literature covered earlier suggested that this is a contested terrain (Bizzell, 1992, 2005; Coleman, 2012; Edwards, Ivanič, & Mannion, 2009; Ivanič, Edwards, Satchwell, & Smith, 2007; Lea & Street, 1998; Lea & Street, 2006; Lea, 2004; Lillis, 2003; Lillis & Scott, 2007; Mannion & Ivanič, 2007). They wrote about student experiences mainly in a Further Education context but their arguments revolve around the need to validate and honour the life experiences and knowledges

that students bring with them to their studies and writing. This is an intricate and complex field and it is not within the scope of this study fully to engage it. However, the sense that academic discourse and writing are evolving practices is important here.

The descriptor, academic writing, refers to the actual writing done by the students. The list of qualities classified was generated using a range of scholarly references, central of which was Coxhead and Byrd (2007, p. 134): “The major point here is that academic prose is made up of a variety of grammatical features all working together in that environment, or even more accurately, all working together to create that environment.” They were writing for language teachers of university students and they distinguish between generic grammar and the grammar of academic writing that involves “clustering grammar by functional purpose”. Included in their list of grammatical structures are long complicated noun phrases, long nouns derived from Greek or Latin, lots of different words, much use of simple present tense verbs, frequent use of the passive and the use of adverbial phrases to indicate location inside the text.

Another academic writing theorist Woodward-Kron (2008), discussed nominalisation, in the context of functional linguistics. Woodward–Kron (2008) shows that *nominalisation*, or the development of the noun phrase (in a sentence) to include more aspects of its identity in the sentence, results in more complex sentences, and this is an important aspect of academic writing. “As processes are repackaged as participants, academic texts become more abstract and complex, and much of the complexity is due to the nominal group structure (Jones, 1988, cited in Woodward-Kron, 2008, p. 238).¹⁵

The use of the passive voice is another characteristic of academic prose as mentioned above. Crystal (2004, p. 143), says that “passives are frequently used in all kinds of academic discourse”, although “only about 25% of the verbs will be in the passive. But this is enough to provide the impression of detached objectivity which has long

¹⁵ Processes are also known as verbs and participants as nouns or subjects in a sentence

been fostered as a desirable feature of Western academic enquiry.” He continues (p. 144) to claim that “short passives occurring in clusters produce a uniformity of style which is often succinct and elegant in its rhythmical parallelism”, and that such writing adds a tone of authority (p. 145).

3.8. Vocabulary Count

There is also research into how to measure HE students’ vocabularies, and Coxhead (2000b) has produced an Academic Word List (AWL), which, together with the British National Corpus, has provided a definitive list of words that are essential for university students to know to achieve academic success. The importance of the word has been recognised for generations. Vygotsky (1986) considered the word to be the single most important element in the language. He argued that it encapsulates the concepts and gives them sense and meaning (cited in Faragher, 1995, pp. 45-47). However, the discussion of the additions made by Wertsch (1985) (c.f. 2.8.1) in this regard should also be noted. He argued that “tool-mediated, goal-directed action is the appropriate unit of analysis in Vygotsky’s approach.” Knowledge of the vocabulary used in student writing, which is to be analysed in this research, will further enable the exploration of what knowledge and skills the students have brought to the task.

3.9. Idiosyncratic Language

The theoretical basis for the inclusion of this category is that their personal language is part of what the SWs used to write their essays and is therefore part of the contents of their VUBs. There is also an expectation that there will be evidence of the use of *AusE* in the essays. It is all part of how the SWs create meaning and construct their assessments.

3.10. Summary

The theoretical fundamentals upon which the analysis of the data will proceed has been described and discussed. The large context for the study is the original TP with its key aspects of attrition, diversity and curriculum and engagement. The narrower

context is captured by the research questions that relate to experiences of a group of first year education students in writing a critical comparison essay in the persuasive genre. Those experiences will enable the identification of which academic literacies accompanied the SWs in their VUBs with a view to informing curriculum developers and assessors. The theoretical justification for the analytical criteria according to which the essays and interviews will be analysed and discussed has been made. Defining academic literacies and enabling distinctions to be made between academic discourse (including academic writing) and higher order thinking skills was enabled by the work of Wingate and the work of Marzano et al. Together, this work was instrumental in providing analytical criteria for analysing the HOTS evident in the texts of the SWs. Furthermore, in terms of the descriptors for academic writing and discourse, much use was made of the work of Hyland and Donesch-Jezo as well as Woodward-Kron. The groundwork has thus been established for the next chapter on methodology.

CHAPTER FOUR: METHODOLOGY

4.1. Introduction

In this chapter, the design of the research will be discussed; how the samples of data, written essays and verbal interviews, were selected and collected. Specific types of research - quantitative, integrative, mixed, bricolage and case study - will be described as well as how they are used, resonate and articulate with each other. The use of NVivo will also be described and how the analysis of the data was undertaken. Finally, the way the vocabulary count was undertaken is described.

4.2. Research Design

The methodology adopted to explore answers to the research questions consists of a blend of research methods. Quantitative research is featured as well as a range of qualitative methods including integrative research, case study research and bricolage. Rigour is maintained throughout, as well as transferability, reliability, validity, dependability and confirmability. The first research question was concerned with how first year students experienced the writing of a major essay in the persuasive genre of critical comparative analysis and what skills they had already in place to do the task. The next question was how those skills could be enhanced and the third question was about the lecturers' perception of the writing task and how they perceived the challenges of (TP). The order of these questions was changed to reflect a clearer logic – the issue of the staff perceptions was placed after the question about the student experience because they commented on how to enhance the student experience and then the whole was reflected in how TP could reflect that enhancement. In addition, from now on the construct of TP will include the conceptualisation of 'pedagogy for transition', rather than 'transition pedagogy' (TP). Pedagogy for transition (PFT) aligns better with this research because the focus here is squarely on classroom practice rather than the broader support that was emphasised in the original TP.

4.3. Data Collection, Processes, Ethics and Achievements

The data to be analysed in this case study are drawn from three sources: the writing of first year students in a foundational course in teaching literacy, interviews with some of the students, and interviews with some of the staff. After receiving ethics and faculty permission to approach students and staff, I twice spoke to on-campus students in a tutorial. I also approached the students in my own online tutorial classes. Requests for participants were also posted on the university's online LMS. Altogether eighteen students volunteered to participate: twelve of them identified as having had no prior experience of university, eight were FIF, ten were mature age, two low SES, five had low entry qualifications, one was a single parent and one had a disability. Seventeen essays were made available for analysis and five students and three staff responded to the interview requests. Some students did not respond to their university email addresses, which was the only avenue I had of contact. Some emails bounced, which might indicate that they had either completed their studies or dropped out. Originally, it was assumed that there should have been more participants, however, Gerring's (2004, 2007) work on defining the case study suggests that numbers of units is not important, and that the essays in this study could be described as separate cases or "units of study" that combine to form a single study. In this case the sample of essays is described as "purposive" and Guest et al. (2006, p. 61) suggest that "the common element is that participants are selected according to predetermined criteria relevant to a particular research objective."

In this case the predetermined criteria are that the data should have been produced by students who had completed the course. Guest et al. (2006) noted that most books and articles they consulted on the question of the size of the sample recommended that it "be established inductively and sampling continue until 'theoretical saturation' is reached." The authorities they consulted made numerical recommendations which varied significantly and included other constructs; the one most closely matching this study was Kuzel (1992, p. 41) who recommended six to eight interviews for a homogenous sample and twelve to twenty data sources "when looking for disconfirming evidence or trying to achieve maximum variation." Guest et al. (2006) were engaged in a field study, which consisted of collective interview data only, and

they found that after twelve interviews they had reached saturation. This term implies that as the data were analysed no new themes or information was evidenced. In this study once all the essays and interviews had been analysed the themes were categorised and in most cases had shown repetitions indicating that it was not likely that anything new or surprising would appear.

To collect oral data, the five SWs who had responded to emails requesting interviews, were interviewed using Zoom which has a recording facility. The interviews were transcribed and analysed using NVivo which enabled them to be included in the already existing themes as well as to reflect new themes which added to the 'contents' of the VUBs and filled the gaps in the HOTS's analysis that could not be completed using written data.

Six members of staff were approached to be interviewed and three agreed. The three who agreed were the original Course Examiner, and two lecturers, one of whom had not taught the course recently but with whom I had co-taught in its first iteration. These interviews were also conducted in Zoom, transcribed and analysed using NVivo, where again, additions to the themes were enabled and new and relevant themes were generated, thus providing responses to the third research question.

The essays are the major assignment in the course constituting 60% of the overall assessment, and form the bulk of the data; they are the primary drivers of the case study. Seventeen essays were provided, thus, according to Kuzel (1992) providing "maximum variation". The SW interviews filled gaps in the descriptors where the essays were silent and introduced new themes. The staff interviews provided background and depth and introduced new themes.

The SWs had to write a critical comparative analysis of two transcripts of instructional discourse in the persuasive genre. One transcript (T1) consists of a conversation between a mother and her six-year old daughter in which the mother takes on the role of teacher and helps the child do some simple mathematical calculations. The child's aunty then appears and together they read the story of the Gingerbread Man; this dialogue also demonstrates some pedagogical 'moves'. The other transcript (T2) has a teacher introducing a lesson with a small group of children

with the stated purpose of using a well-known story to introduce the lesson. The lesson quickly derails, and the transcript ends with the children squabbling. The SWs are required to write within the genre of the persuasive essay and use specific theory in their analysis and critique of the two transcripts. The whole would demonstrate the SWs attainment of some of the key learning objectives of the course which included:

- A strong sense of socio-cultural context and its importance for learning
- Understanding the importance of bridging children's social worlds between the learning contexts of home and educational settings.
- Having a foundation of explicit knowledge about language
- Understanding the connection between home and school literacy
- Exploring how oral interactions between teachers and students organises formality, status and power in relationships.
- Analysing and critically reflecting on the characteristics of classroom talk for the improvement of students' literacy learning and development.
- Identifying how teachers scaffold students' learning through their choice of language and their explicit use of standard English.
- Explain why the environment in educational settings is important in children's language and literacy development (O'Neill, 2015).

To demonstrate the above they had to identify the moves made by the mother and aunty in T1 and the teacher in T2, and link them to the theories that were taught during the semester. They were expected to make judgements as to the effectiveness of the experience for the learners, as well as to write the assignment in appropriate academic discourse, including correct APA style formatting and referencing.

4.4. Research Methods Adopted and Why They Were

Quantitative Analysis, Qualitative Analysis, Mixed Methods and Case Study Research were all explored and used in the research process for different reasons, and they complemented each other. In addition, the concept of *bricolage* was introduced and used to provide an overview perspective of the entire process. (c.f. 4.4.2.2)

4.4.1 Quantitative analysis – yes or no?

“Data presented in number form are labelled *quantitative*” (Merriam, 1998, p. 68), and in the pilot study this is how the initial analysis of the SWs’ essays was presented. The analysis of the texts was done according to discourse analysis, which, in terms of evidence relating to SWs’ attempts to use academic discourse and academic writing, included how they used cohesion techniques, how they organised the content, how well they adapted to the context of the topic and how cogently they presented their arguments (Gee, 2007). The descriptors relating to HOTS were adapted from Marzano (2001) and included:

Retrieval –recognising and recalling

Comprehension -synthesis or integrating and symbolising

Analysis – matching, classifying, analysing errors, generalising and specifying;

Knowledge Utilisation - decision-making, experimental inquiry, investigation, problem-solving;

Metacognition - goal specification, monitoring clarity and accuracy, process monitoring;

Self system Thinking - examining efficacy, examining emotional responses, examining importance, examining overall motivation.

They were presented numerically and the results were used to support the qualitative arguments. The same criteria were also used to analyse the data in this study as were Costa’s additions.

Costa’s additions (Costa, 2008) - Empathy, Monitoring clarity in communication, Setting aside judgemental solutions and autobiographical responses, Summarising and paraphrasing others’ thoughts and ideas; Generating new ways of viewing a situation, Generating trust and maintain own standards.

In addition, the descriptors of vocabulary, use of metaphor, and idiosyncratic expressions were identified. The numbers of instances of each descriptor across the

data were aggregated and displayed in numerical terms and were used to support the central arguments relating to TP and the VUB. These results were expected to provide insight into the academic writing and discourse and into the HOTS demonstrated in the writing, which could serve as guidelines for future curriculum development in this course. It is assumed that although the research refers to this specific course, the data occur in a standard academic genre, a persuasive essay with the task of conducting a critical comparative analysis, so the results should be able to be generalised to other disciplines. Academics will be able to apply the methodology and results in their own courses where there is focus on academic literacies including HOTS. This could be “an opportunity to shed empirical light on some theoretical concepts or principles” (Yin, 2014, p. 40).

The study is striving for “analytic generalisations...that may potentially apply to a variety of situations” (Yin, 2014). Although this process appears to be purely numerical and objective, the decisions about the descriptors and evidence of the performance are based on the researcher’s judgement and could be described as subjective, thus conforming to the description of qualitative, social constructivist or interpretivist research as well as to the subjective aspects of quantitative research involving the researcher’s decisions. There is an aspect of quantitative research intended but it will combine with qualitative methods in a case study, couched within the broader perspective of bricolage.

4.4.2. Qualitative research.

In explaining qualitative research Noor (2008, p. 1602), cites Denzin and Lincoln (1994) who state that qualitative implies an emphasis on processes and meanings that are not rigorously examined, measured (if measured at all), in terms of quantity, amount, intensity, or frequency. Thus, there are instances, particularly in the social sciences, where researchers are interested in insight, discovery, and interpretation rather than hypothesis testing. The interest in discovery particularly applies to the research being undertaken here. The specificity of the case study will be discussed during this section, but it particularly supports the possibilities of developing insights and interpretations related to, and derived from, the data to be collected and

analysed. Gerring (2007)¹⁶ has noted that the choice between quantitative and qualitative research is the choice between knowing more about less or less about more. The former is the choice that has been made in this study, because the tools of analysis are detailed and refer to the persuasive genre of writing a critical, comparative analysis essay, which, as has been mentioned, is a standard exercise in higher education. Therefore, it is expected to be generalizable beyond this course of study, particularly regarding the principles of discovering abilities and building on them. Curriculum and course designers might be able to build in processes that will enhance the skills already in place and thus enable more students to develop skills and arguably knowledge as well, to higher levels than before.

To add to the definitional discussion, according to Merriam (1998, p. 5), qualitative research is an umbrella concept covering several forms of inquiry that help understand and explain the meaning of social phenomena with as little disruption of the natural setting as possible¹⁷. Qualitative researchers *are interested in understanding the meaning people have constructed*, that is, how they make sense of their world and the experiences they have in the world. It is assumed that meaning is embedded in people's experiences and that this meaning is mediated through the investigator's own perceptions (p. 6). This suggests that researchers necessarily bring their own experience and perceptions to the inquiry as is the case here where the researcher has declared a personal interest in the potential discoveries and what they might mean for future generations of first year students and teachers. Since qualitative research focusses on process, meaning and understanding, *the product of a qualitative study is richly descriptive* (Merriam, 1998, p. 8). Words, and the images they evoke, rather than numbers, are used to convey what has been learned.

¹⁶ This book is on a *Kindle* and as such has no page numbers.

¹⁷ Subsequent application of the principles of *bricolage* contradict this view in that the purpose of the research is to disrupt the existing situation with a view to changing it and enhancing the student experience. This could be an uncomfortable experience for both lecturers and students.

Yin (2014, p. 23) cites Schwandt's 2007 *Dictionary of qualitative enquiry* to provide definitions of some of the terms that are central to qualitative inquiry. Thus *realism* is characterised as,

...the doctrine that there are real objects that exist independently of our knowledge of their existence" (p. 256), *relativism* as "the doctrine that denies that there are universal truths" (p. 261), and *interpretivism* as a term that has "occasionally been used as a synonym for all qualitative enquiry" (p. 160)

This characterisation of *realism* resonates with the identification of the multiple realities that are mentioned in the following discussion of the ontology of this research. This study is grounded in the reality of TP the Good Practice Principles for English Language Proficiency for International students at Australian Universities (GPP) (AUQA, 2009), and the problems and issues in the first-year experience (James et al., 2010). In terms of the latter, there is significant research aimed at showing that poor language proficiency is the major problem experienced by poorly performing students (Birrell, 2006; Bretag, 2007; Elder et al., 2007; Murray, 2012; Oliver et al., 2012). This almost has the status of a *universal truth* which Schwandt suggests is not possible. According to him, *relativism* is "the doctrine that denies that there are *universal truths*" (p. 261). Furthermore, there are other realities that will be explored, which are based on the actual writing by first year students, and perceptions by other scholars about what constitute the problems of the first year (Bizzell, 1992; Fernsten, 2005; Gourlay, 2009; Priest, 2009; Tinto, 2006-2007, 2009a, 2009b). All the above is part of the epistemology of this research. An empirical case study of a real-world phenomenon will be undertaken involving in-depth analysis conducted in a real-world context (Yin, 2014, p. 16). According to Yin (2014, p. 17) case study research can accommodate a relativist perspective in which the perspectives of different participants might illuminate the topic of study; it is expected that the interviews of staff and SWs will reflect a range of different perspectives that will impact on the conclusions of this research. In this case the ontological assumption is that the different perspectives will resonate with the themes arising out of the data analysis (Creswell, 2013, p. 21).

Creswell (2013, pp. 36-37) practises interpretivism, when he includes all the interpretive frameworks under one heading, Interpretive Frameworks. According to

his analysis, Social Constructivism is being used here with a tendency to move towards Critical Theory, as the perceptions of the researcher, relating to the research questions, become richer and more problematic. Although the larger focus is on first year students in general, those deemed to belong to the at risk categories would benefit most from the contribution that this study is expected to make to curriculum development in higher education. The at risk categories are those social groupings identified by Collier and Morgan (2008) and others (e.g. McMillan & Western, 2001; Nelson & Kift, 2005; Nelson et al., 2006; O’Keeffe, 2013; Pascarella et al., 2004; Wilson, 2009). As mentioned in 2.2.1, they include the following categories of students: FIF, mature age, low OP/TER scores, international, Indigenous, low SES, students with a disability and Non-English-Speaking Background (NESB) students, single parents, and students with a mental illness. In the context of the university they are the most disempowered groups.

Although the bulk of the data will be analysed and presented in what appears to be a quantitative mode, the decision to use a qualitative research approach in this case study was made because the ontology, epistemology and axiology belong more to an interpretivist/critical theorist approach (Creswell, 2013, p. 21). There is an understanding that ontologically speaking there are multiple realities to be considered and factored into the potential discoveries of what it is that the SWs were able to do when they wrote their critical, comparative analysis essays. Their various identities and life stories all contribute to the content of their individual VUBs as well as their range of HOTS and academic writing and academic discourse skills. Their individual perspectives of what they encountered, in terms of challenges and rewards in writing their essays, will be recorded during their semi-structured one-to-one interviews, which conforms to the epistemology of qualitative research.

Ponterotto (2005, p. 1320) equates naturalistic inquiry and qualitative research and argues that it leads to research methods such as in-depth, face-to-face interviewing and participant observation, which contributed to the data used in this study. It was acknowledged earlier that the researcher’s values are present in the purpose of the research, thus providing evidence of axiological assumptions. Depending on what is discovered during the inquiry process it should be possible for teaching academics to develop curricula that will enhance and enable positive experiences for first year

students, especially those who come from previously marginalised, diverse communities. Qualitative research is inquiry aimed at describing and clarifying human experience as it appears in people's lives. Discovering details of those lives outside of their writing enabled data to be gathered that served as evidence for the researcher's distilled descriptions (Polkinghorne, 2005, p. 137).

Qualitative research, when used as an umbrella term, is not without its detractors however, and scholars have been at pains to respond to their critiques. Riege (2003, p. 81) responded to critics of qualitative research by pointing out that there are techniques that are used to counter some of the main criticisms about: (words in italics are the qualitative correspondents) Construct validity/*Confirmability*, Internal validity/*credibility*, External validity/*transferability* and Reliability/*Dependability*. The tactics in Yin's (2014, p. 45) Four Design Tests reflect Riege's closely and in this research, both have been followed, which should mean that the research design conforms to best practice qualitative research.

For Construct validity/*confirmability* – they recommend the use of multiple sources of evidence, which is the case here – a selection of essays and interviews with their writers as well as interviews with the lecturers. Then they recommend the establishment of a chain of evidence, which is in the documentation that is supplied as part of this study, and then key informants, the SWs and staff (where possible) will review the final report as is promised in the letters of invitation to participate.

For Internal validity, Yin (2014, p. 47) states that it is mainly a concern for explanatory case studies, therefore it is inferred that for an exploratory study such as this, it is not necessary to employ any specific tactics.

In the case of External Validity/*transferability*, Riege (2003) and Yin (2014) both recommend the use of theory in single case studies – there is evidence of this throughout the study. Furthermore, the use of Marzano's Taxonomy provides a replication logic across the multiple units of study, which is explained in the following section. Riege (2003, p. 78) also recommends defining the scope and boundaries of reasonable analytical generalisations, which are followed in this study. It is then recommended that evidence is compared with extant literature, which is

difficult because there is no evidence in the current literature of this sort of study having been done before; this therefore constitutes a contribution to knowledge.

Finally, for Reliability/*dependability*, the use of a case study protocol and the development of a case study database are recommended. The protocol was established for the start of the study and is contained in the Dissertation proposal presented to, and accepted by, the Faculty of Education. The Ethics approval is also part of this protocol. NVivo (Pro) 11 is used for this research and the database is in the files in the NVivo project and contains copies of the essays and their analysis, according to the descriptors used here. The transcripts of the staff and SW interviews are in the same NVivo files and they have been analysed according to the descriptors, including additional descriptors that they introduced. The initial analyses of the interviews as well as a spreadsheet of the participant data and a chart of the data analysis have been developed. Riege (2003, p. 79) also adds: *a full account of theories and ideas* –this has been ongoing as the writing took place; *congruence between research issues and features of the study design* – this is in place as the research issues have been related to student writing and thus formed the data that would be analysed, and the context of the study, Transition Pedagogy as originally formulated; *clarify biases* – this has been done earlier in this section where there was reference to the axiology of this work, and it is implied in the research questions.

Furthermore, Morse, Barrett, Mayan, Olson, and Spiers (2002) developed an argument for following a process of verification during the conduct of a qualitative enquiry rather than to apply arguments for verification after the fact. They argue that post-hoc evaluation of the project does not ensure verification and rigour. They promote five strategies for ensuring rigour during the collection and analysis of the data: (p. 18)

1. Firstly, methodological coherence congruence between the research questions and methods.

This has been monitored throughout this project and the research questions referred to regularly.

2. Secondly, collection of an appropriate sample; the best possible participants for the research.

This is explained more fully in the Data Section (4.3) although mention has been made in the Literature Review of the essays written by participants who offered to be part of this study.

3. Thirdly, collecting and analysing data concurrently to provide iterative interaction between data and analysis.

Because of the pilot study and an exhaustive literature review, changes have already been made in the analytical categories and theory development.

4. Fourthly, thinking theoretically during analysis will build a solid foundation.

As has been mentioned in the previous point, an exhaustive literature review was done continuously so that the analysis of the written data and collection of the interview data took place in the development of a theoretical perspective on the skills and abilities in the SWs' VUBs.

5. Finally, theory development takes place because of movement between the data and the conceptual understanding.

In this case the conceptual framework is placed early in the text, and an outcome of the research process is an enrichment of the understandings of the concepts. As mentioned in the previous point, the conceptual understandings, particularly around the contents of the VUBs, continued to develop so that the analysis of the data was constantly informed by fresh insights.

Thus, Morse et al.'s (2002) "five strategies for ensuring rigour" have been followed and in this way rigour has been ensured. However, it was expected that although a naturalistic paradigm was adopted, and while the philosophical perspectives were adapted, validity was maintained and the terminology used was consistent with mainstream science. This was a concern expressed by Morse et al. (2002, p. 19).

In summary, we need to refocus our agenda for ensuring rigor and place responsibility with the investigator rather than external judges of the completed product. We need to return to recognizing and trusting the strategies within qualitative inquiry that ensure rigor. For too long, we have used the wrong tactics to defend qualitative inquiry. It is time to attend to our own research and work toward finding consensus in broader criteria, appreciating how it is attained within the qualitative project itself, using criteria and terminology that is used in mainstream science.

4.4.2.1 *Integrative research.*

In this research the terminology used by Johnson and Onwuegbuzie (2004) has been adopted. They use “mixed methods” because of its greater popularity, whereas their choice would have been “mixed research”. They also suggest the possibility of “integrative research”, which is used here because it better reflects the spirit of this project which aims to integrate a range of data and methods to answer its questions. They quote Dewey (1948, 1920): “...the bottom line is that research approaches should be mixed in ways that offer the best opportunities for answering important research questions” (Johnson & Onwuegbuzie, 2004, p. 16). This pattern is what has been followed in this work, which also shares a goal “...not to search for corroboration but rather to expand one’s understanding” (Onwuegbuzie & Leech, 2004b, cited in Johnson & Onwuegbuzie, 2004, p. 19). In this case, to answer the central research question concerning the skills the students have when they start their studies, it was decided to analyse essays and interviews and aggregate the findings. The course of actions undertaken have served to expand understanding of the challenges and rewards experienced by some first year students in their writing of a critical comparative analysis of texts. It will identify their HOTS and academic discourse and writing skills and will assist future curriculum development and assessment, which in turn will be a significant addition to pedagogy for transition. The choices outlined above are aspects of *integrative research* (also called mixed methods or mixed research) (Barnes, 2012; Hanson, Creswell, Clark, Petska, & Creswell, 2005; Johnson & Onwuegbuzie, 2004). Reflecting on the Dewey quote above, it is necessary to use whatever will provide the most complex, the richest,

most reliable, trustworthy, valid and appropriate answers to the research questions. The employment of the concept of the role of a *bricoleur* has assisted in addressing this complexity, which will therefore be explained further below.

4.4.2.2. *Bricolage.*

The overarching research approach is conceptualised as bricolage, which presupposes the use of a range of tools, styles and ways of thinking. It also presupposes a social justice agenda for the research and the expectation that the research will motivate changes. In this case the hope is that more underprepared students will be enabled to complete their studies and not be alienated and overwhelmed early on by the demands of the university. To some extent, Pragmatism is the driving philosophy, but it is moderated by Critical Theory because Johnson and Onwuegbuzie (2004) suggest that a weakness of Pragmatism is that it “may promote incremental change rather than more fundamental, structural, or revolutionary change in society” (p. 19). It is hoped that dissemination of the hypothesised results of this study will result in fundamental changes in pedagogy for transition, hence the philosophical bracketing of Pragmatism with Critical Theory. Hanson et al. (2005, p. 228) produced a typology that suggests that when the qualitative and quantitative data have equal importance and weight and both feed equally into the results it can be described as “concurrent transformative” research. In addition, the research questions explicitly frame a transformative agenda thus providing an “advocacy lens”, “...which is usually reflected in the purpose statement, research questions, and implications for action and change”. The research questions and purpose statements of this study carry implicit expectations of the answers being able to feed into change agendas in higher education. It is hoped that the results of this study will contribute to PFT and will enhance first year students’ and teachers’ academic experiences and thus limit attrition rates, enhance progression and promote a social justice agenda for underprepared first years in HEIs in Australia. It is to support and further these aims that the research method and philosophy of bricolage, which includes ‘all of the above’, has been adopted.

As stated earlier here, the theory and practice of bricolage is aimed at promoting social and political change and is used in this research in the hope that the research

will promote educational and pedagogical change at the university in this study and potentially at other HEIs in Australia and beyond. A *bricoleur* is a person who practises *bricolage*. The terms derive from the French words for a tradesperson who uses whatever tools and processes are necessary to complete a task. It is applied in the Arts and other disciplines and has at its heart interdisciplinarity, complexity, interpretivism, philosophical research, hermeneutics, criticality and liminality (Kincheloe, 2005, p. 323).

Focusing on webs of relationships instead of simply things-in-themselves, the bricoleur constructs the object of study in a more complex framework. In this process, attention is directed toward processes, relationships and interconnections among phenomena... (Kincheloe, 2005, p. 323).

It is this interconnectedness and interdisciplinarity that gives this current study added richness and validity. The student writing, which is the subject of this study, is analysed in terms of the contexts of the SWs. Their histories and abilities are all reflected in their writing and are revealed to varying degrees in the interviews. The products of their efforts, when aggregated, are expected to enable planners and curriculum developers to develop suitable tasks and assessments to allow students to do their best under their individual circumstances. This research practice provides a “way of defending what we assert we know and the process by which we know it” (Kincheloe, 2005, p. 325). The study draws on Applied Linguistics, Psycholinguistics, Discourse Analysis, Semiotics, and Literary Analysis to discover the HOTS that the, mainly at-risk, students bring with them when they come to university. However, Kincheloe (2005, p. 327) also warns that “...bricoleurs work to avoid pronouncements of final truth.” This is important because the world of students in academia is an unstable one, and the demographics of the student body change from cohort to cohort, as do the demographics of the academic lecturers. HEIs are subject to constant change and re-structuring when responding to different government policies so the results of this research will need to be able to be applied in principle, and adjusted in practice, according to the needs of the times. If the analysis of the data is conducted with appropriate complexity, resulting in a thick

description, it will be embedded in thirteen notions that underlie the principles of bricolage. These are (adapted from Kincheloe, 2005, pp. 328-330):

1. Explicate and implicate orders of reality – “the explicate order consists of simple patterns and invariants in time” whereas the implicate order “is the level at which ostensible separateness disappears and all things seem to become a part of a larger unified process.”
2. The questioning of universalism – “contextual specificities may interfere with a researcher’s ability to generalize findings to a level of universal application.”
3. Polysemy – “interpretation is always a complex process and different words and phrases, depending on the context in which they are used, can mean different things to different individuals.”
4. The living process in which cultural entities are situated – “...processes may be more fundamental to understanding the sociocultural world than isolated entities.” ...

This suggests that a phenomenon must be studied as its process not as a stage of its development. This is key to this research where the SW’s experience of their process of writing is wanted.

5. The ontology of relationships and connections ... the relationship between self and culture is important. “Culture is not merely the context in which the self operates but also ‘in the self’ – an inseparable portion of what we call the self.”

This has relevance to this research when considering the changes students are expected to make in themselves to become accepted insiders in academia.

6. Intersecting contexts – “...researchers as bricoleurs refuse to lose sight of the ...intersecting contextual fields – that provide separate entities’ diverse meanings.”

In this research, it is difficult to avoid reductionism when aggregating the HOTS and academic discourse and writing evident in the data because there is “always another

context in which a phenomenon can be studied.” (p. 329). It is acknowledged that in this case the context of the essays is singular, that of a specific course, but the contexts of the writers are all separate and are separately identified.

7. Multiple epistemologies – Bricoleurs understand that in the “multidimensional web of reality ...diverse epistemologies will develop in different historical and cultural locales ... diverse peoples of the planet have produced ways of knowing that often have come directly into conflict “...with the mainstream in the West.” “... bricoleurs seek out diverse epistemologies for their unique insights and gain provocative insights into epistemological diversity ... which allow them to ask new questions of epistemology and the research act.”

This research is doing exactly that, asking new questions, and applying different epistemologies to the research act. All of this has great relevance to the issue of enabling marginalised students to succeed at university.

8. Intertextuality – this notion refers to the necessity to find meaning in the ways other research narratives, especially those of the researcher, the consumers/readers of the research, and exterior research narratives, occupy points on intersecting intertextual axes.

In this research the in-depth literature review has gone some way to providing rich intertextuality, as well as the triangulation with the research supervisors. Hopefully in the future when the research is used practically in curriculum design there will be feedback from lecturers and students. Aspects of the research have been presented in conference papers and journal publications and in time there may be feedback to those publications.

Continuing with Kincheloe (2005, pp. 328-330) ...

9. Discursive construction – “Bricoleurs understand Michel Foucault’s (1980) assertion that fields of knowledge take their forms because of the power relations of discursive practices.”

10. The interpretive aspect of all knowledge – “...interpretation is always at work in the act of knowledge production – the ‘facts’ never speak for themselves.... To research, we must interpret; indeed, to live, we must interpret.”
11. The fictive dimension of research findings – any knowledge worker who believes research narratives are simple truths is operating in a naïve domain ... such fictive dimensions may be influenced by a variety of forces, including linguistic factors, narrative employment strategies, and cultural prejudices.”

This reality is important in the analysis of the interview data. “Fictive” is a term Kincheloe uses to mean the creation of something not yet in existence (p. 346), which is what this research aims to create, knowledge of the contents of the SW’s VUBs.

12. The cultural assumptions within all research methods – “As bricolage pursues complexity, it induces researchers to seek the specific ways these cultural assumptions shape knowledge production, their own research processes.”

The axiology of this research and the researcher’s history have been addressed.

13. The relationship between power and knowledge – “The way different research orientations draw boundaries between what is acceptable and what is not constitutes the ideological dimension of the act of inquiry. ... The ability to trace the footprints of power in the research domain is a central dimension in the bricoleur’s efforts to understand complexity and knowledge production.”

It is expected that this research, which has been carefully tailored to the context of a specific university and faculty, will challenge the prejudices and preconceptions current in mainstream academia, especially about the capabilities of at risk first year students.

If the challenge is to be successful, the research must be able to be examined for rigor and validity. Kincheloe (2005) makes claims for rigor and validity in bricolage. He makes the point that rigor requires knowledge and discernment resulting from explorations in the “complex, ever-shifting boundary between the social world and the narrative representation of it” (2005, p. 336). In this research the interview data included such liminal explorations. Furthermore, because bricoleurs use philosophical inquiry, they study the socially constructed nature of what passes as rigor in research. “Doing so, they move a step closer to the complexity of the act of knowledge production. Such proximity helps them redefine rigor in a way that involves developing numerous ways of recognizing and working with this complexity.” (2005, p. 341).

He further claims that epistemological features, such as the empirical and the philosophical, are always embedded in each other so that interdisciplinarity is confirmed and the confusion of narrow-mindedness with high standards is thereby avoided.

In relation to the epistemological position taken above, he introduces the idea of hermeneutics¹⁸ and argues that any act of rigorous research involves:

- connecting the object of inquiry to the many contexts in which it is embedded (*the interviews do this*)
- appreciating the relationship between researcher and that being researched (*c.f. statements about the axiology of this research*)
- connecting the making of meaning to human experience (the meanings made in the data also relate to the writers’ experiences)
- making use of textual forms of analysis while not losing sight that living and breathing human beings are the entities around which, and with which, meaning is being made (*linking the analysis of the essays to the writers by interviewing them*), and

¹⁸“...hermeneutics and critical hermeneutics implicitly underpin qualitative inquiry, both of which emphasize the interpretive act of understanding (Kinsella, 2006, p. 1).

- building a bridge between these forms of understanding and informed action
(*to be written up in the results and conclusion of this research*) (p. 342)

In this research, the activities specified above are all being followed as indicated in the parentheses following the statements, which indicates that this is rigorous research. In addition, "...bricoleurs seek to cultivate a higher form of researcher creativity that leads them, like poets, to produce concepts and insights about the social world that previously did not exist (p. 346). This "rigor in the absence" can be expressed in numerous ways that, in summary, relate to potential and the ability to realise that potential. This idea, applied to at-risk first year students, is central to this research. It enables confidence in the challenge to preconceived ideas about such students' intellectual and academic abilities, based on their linguistic abilities, and allows for the possibilities of those attitudes changing.

Furthermore, validity needs to be addressed, as well as rigor, and Kincheloe (2005) raises the following questions about the mainstream notion of validity:

How do we distinguish between worthy and unworthy knowledge? This question moves bricoleurs into the complex domain of validity. Here they can engage in the contemporary conversation about making judgments about research quality. Are the terms *external validity* and *internal validity* helpful in this context? What does knowledge produced about one context have to tell us about another context? Our philosophical grounding helps us formulate questions about the worth of research that might have never occurred to those without such insights. In this context, bricoleurs, with their philosophical grounding, seriously engage with the purposes of research. In this process, they invent concepts such as catalytic validity, ironic validity, paralogical validity, rhizomatic validity, voluptuous validity (Lather, 1991, 1993), hermeneutic validity, cognitive validity, and pragmatic validity (Kincheloe, 2003).

If answering such questions is not an act of research, then bricoleurs are not sure what research involves (pp. 340-341).

This might seem to be overstating the case; however, the issue of validity has been addressed here previously (4.2.) and this does not conflict with the bricolage position, which provides a useful framework containing the different aspects of qualitative research that feed into this project. However rigorous and valid,

transferable and reliable, confirmable and dependable this research is, Lennon (2012) cites Steinberg (2012) who argues that,

... if a researcher is looking for answers than (sic) bricolage is not a good choice. It is an intuitive method rather than a positivist one for conducting research. The frustration of bricolage is that it asks more questions than it answers and it is never truly finished. It has the capacity to illuminate, problematise, and interrupt the cultural norms, ideologies, discourses, and practices being produced and reproduced in communities, but it can leave the researcher with a sense of incompleteness (Steinberg, 2006).

It is expected that this study will not leave a sense of incompleteness but rather with an urge to move on, find more questions to explore, challenge 'received wisdom' and use it for the advancement of student achievement.

4.4.2.3. Case study.

As a *bricoleur*, to be able to produce a meaningful study in relation to the research questions, it needed a suitable vehicle able to include the principles of bricolage as well as other aspects of qualitative research. The Case Study was selected as that vehicle. Gerring (2004, p. 342) defines a case study as "an intensive study of a single unit for understanding a larger class of units." In his article, he accommodates the possibility of "intensive study of a single unit wherever the aim is to shed light on a question pertaining to a broader class of units" (p. 344). Swales (1990, p. 201) cites Yin (1984, p. 23) who defines a case study as an enquiry which: "...investigates a contemporary phenomenon within its real life context; when the boundaries between phenomenon and context are not clearly evident; and in which multiple sources of evidence are used."

PFT is central to this research and to explore it in its real life context the writing of new first year students was studied thus providing "multiple sources of evidence". Swales justifies using student writing in terms of the above definition of case studies, for discovering a range of factors about the writers. Zainal (2007, p. 4) cites Stake (1995): "...in a collective case study, the researcher coordinates data from several different sources, such as schools or individuals..." and further, "...collective case studies may allow for the generalisation of findings to a bigger population".

Some of the discussion relating to the choice of Case Study research has already occurred earlier in this section (4.4.2.3.). However, there is more to be said in favour of the Case Study as a method of research. Willis (2007, pp. 239-240) quotes Merriam (1988) who lists some of the advantages of case study research as: particularistic, naturalistic, produces thick descriptive data, is inductive and heuristic. The purpose of case studies is not to “predict and control goals of post-positivism ... They seek instead a full, rich understanding (*verstehen*) of the context they are studying”, which applies to this study. Case Study research has been criticised by quantitative researchers and accused of many limitations, some of which were addressed in the section on Qualitative Research (Morse et al., 2002; Riege, 2003; Yin, 2014). However, others vigorously defend the Case Study as a research method (e.g. Flyvbjerg, 2006).

4.4.2.4. *Design of the specific case study in this research.*

This is a Case Study because it seeks to acquire an in-depth understanding of the bounded phenomenon (Merriam, 1998) of first year students who completed the assessment under discussion. In this Case Study the unit of analysis is a sample of data recruited from SWs who completed a specific course in literacy pedagogy. The units of data are the essays and the interviews. Other qualities that define it as a Case Study are, for example, that it seeks to develop, rather than test, a hypothesis. Gerring (2007) goes on to say that the Case Study depends on fewer cases and greater depth, unlike the Cross Case Study that works with more cases and more surface analysis. In this case, the essays were subjected to detailed analysis and then the writers were interviewed to add depth. Merriam (1998, p. 37) further describes two different types of qualitative case study, interpretive and evaluative. Interpretive case studies are the closest description here because, according to Merriam (quoting Shaw, 1978), they are used

...to develop conceptual categories or to illustrate, support or challenge theoretical assumptions held prior to the data gathering. If there is a lack of theory or if existing theory does not adequately explain the phenomenon, hypotheses cannot be developed to structure a research investigation. A case study researcher gathers as much information about the problem as possible with the intent of analysing, interpreting, or theorizing about the phenomenon...The model of analysis is inductive...sometimes such case

studies are labelled as *analytical* which are differentiated from descriptive studies by their complexity, depth, and theoretical orientation.

The purpose of this study was to gather as much information as possible to determine the possibility of identifying HOTS in the writing of first year students and to develop theory to be integrated into the existing PFT theory, with a view to developing an engaging and more equitable curriculum for Higher Education Institutions (HEIs) in Australia. This is a complex study, which has considerable depth given the amount of data studied, and which has a pragmatic and critical theory orientation.

Yet another type of qualitative case study is that with a phenomenological focus and what has been applied here to some extent, is phenomenology (Merriam, 1998, pp. 16-18), in terms of wanting to know how the SWs experienced the writing of their essays, what they thought they learned, and how they felt about gaining access to the university. Merriam (1998, pp. 32, 68, 76) mentions how Case Study research enables the feelings, emotions, reactions and opinions of participants to be recorded and included in the findings of the study. In this study the SWs' cognitive state in the task is of consequence because motivation has been identified as an important factor contributing to student success (Robbins et al. 2004; Marzano, 2001). If such factors are to be included in the new understanding about the VUBs of new first year students, their cognitive state in the task, which includes their feelings, emotions, reactions and opinions, needs to be known.

Furthermore Marzano (2001) and Marzano and Kendall (2007, 2008)'s self system level of HOTS is a detailed elaboration of the student's attitude to their own ability to succeed and incorporates their sense of the importance of the knowledge, their own sense of their self-efficacy and their emotional response to the knowledge they are acquiring. All of this adds up to their motivation, which is an essential component towards their success. In addition, Costa (2008) includes a range of psychological conditions that contribute to HOTS, including the ability to paraphrase, and show empathy and understanding.

Yin (2014, p. 29), in his section on Components of Research Designs, provides the following five necessities for a sound case study:

1. *A case study's questions* – mine are the research questions (the actual 'case' is the writing of a critical comparative analysis by 1st year students in a literacy course); and interviews with some SWs and staff who taught them. It is *exploratory* in that it seeks to discover *how* they think regarding their writing.
2. *Its propositions (if any)* – that first year students bring with them VUBs, which contain the seeds of HOTS and academic discourse and writing as well as many other skills possibly not immediately relevant to the university.
3. *Its units of analysis* – critical analysis essays written in the first semester and interviews with the writers as well as staff.
4. *The logic linking the data to the propositions* - the data will show what HOTS and academic discourse skills and writing skills the students demonstrated in the essays.
5. *The criteria for interpreting the findings* – the essays will be analysed in terms of a set of criteria derived from Marzano's taxonomy of thinking skills as well as other criteria defined in accordance with the relevant literature.

The issues of ethics, reliability, validity, generalisability/transferability and limitations have already been covered. A range of data and lenses were used to find answers and hypotheses to the research questions, and new knowledge has thus been created about first year SWs and writing as well as ways to read it from the point of view of how well they are deploying the qualities they have in their VUBs.

4.5. Method of Analysis

The literature review has provided guidance as to possible authorities to consult in the analysis of the essays. Central among them are: Thomson and Hall (2008) who provided the construct of the VUB which is the image to be used as the 'container' for the skills the SWs brought to the writing of their essays; Marzano et al. provided analytical tools for discovering the HOTS and the major scholars consulted on the detail of academic writing and discourse are Woodward-Kron (2008), Hyland (2003) and Donesch-Jezo (2010, with Coxhead (2000b) providing the criteria for the vocabulary count. Idiosyncratic language or *AusE* are represented by Wierzbicka

(2001) and Ramson (2001) and metaphors by Lakoff and Johnson (1980) and Pugh et al. (1997). All according to the descriptors discussed and described in the previous chapter.

4.5.1. NVivo.

The computer programme NVivo was used to help analyse the data. This programme makes it possible to define categories or nodes, and a tree under such nodes, enabling the keeping of records of occurrences of behaviours. In this research it was used in a basic form to develop a record of the numbers of times certain aspects of the SW's texts and interviews occurred in terms of the descriptors that were chosen. Each descriptor was assigned a node and the essays were read and text appropriately coded at the relevant node. The programme refers to the individual texts as "sources" and the number of times the descriptor is coded in an individual source, are "references" but in this thesis I have called them "instances" to avoid confusion with scholarly references. The descriptors used by Marzano et al. and academic discourse markers; vocabulary count; idiosyncratic language; metaphors and themes emerging from the interviews, are the headings and sub-headings of the nodes. They are all listed in Chapter 3. Where the essay texts and interview transcripts provided examples that can be coded under those headings they were so coded. NVivo provides numerical records of the numbers of the codings and it is possible to generate graphs and tables from that information. This aggregated information provided indicators of the contents of the VUBs, and their strengths and weaknesses

4.5.2. Analysing the essays – some of the adaptations made.

Each essay was read carefully and relevant sections of the texts moved into the appropriate NVivo category. It was necessary to cross-reference between the descriptors in the literature and the intuition and logic of where particular text belonged until a clear understanding of exactly what the descriptors meant was achieved. An example of this was the need to adapt some of the Marzano

descriptors¹⁹ as argued in Chapter 2. The issue of metaphor and matching was resolved upon reading Woodward-Kron's work and further exploration of other writing on metaphors e.g. (Kessler & Quinn, 1987; Lakoff & Johnson, 1980a, 1980b; Lindqvist & Nordanger, 2010; Pugh et al., 1997), but matching remained more challenging.

According to Marzano and Kendall (2008, pp. 55, 59, 64) matching involves identifying similarities and differences – *compare and contrast* or sort or create an analogy or a metaphor (p. 55). Matching focuses on similarities and differences and the abstract relationships between them. There is a high occurrence of this skill in the data, because the essay was a critical comparative analysis. Initially in the first 'sweep' of the coding process many instances were identified but on revision it became clear that distinctions needed to be made within this category, and Decision Making was identified as an appropriate option at a higher level. Thus, where the text indicated that a choice had been made and it was related to the text being analysed it was re-coded as Decision Making (ten references and nineteen instances). Where the text was more descriptive than analytical it remained in Matching. This is an example of how the Marzano descriptors work in terms of a hierarchy of skills. They are carefully divided up into detailed shaded analysis that enabled, at times, nuanced decisions to be made as to where a piece of text belonged.

4.5.3. The interviews.

Each interviewee, staff member and SW, was sent a copy of guiding questions as well as information about the project and a copy of the article, (Faragher & Huijser, 2014). Only L1 and L3 were completely clear at the time of interviewing, about the background and purpose of the interview. Most of the SWs had read what was sent but had not really understood the import. None of that mattered as such except that it turned what had been planned as semi-structured interviews into more free-flowing conversations and probably too much time was spent trying to explain the purpose of

¹⁹ From now the term 'Marzano descriptors' will be used to include Marzano (2001), Marzano and Kendall (2007, 2008) and Costa (2008)

the research and its process. Each interview developed its own momentum and shape and in the moment, some important matters were lost, but then others were richly covered, and new issues raised.

4.5.3.1. *SW interviews.*

In the SW interviews their personal backgrounds were discussed as well as the Marzano self system and metacognition criteria where the essays were silent; the challenges they faced when they came to university; their expectations of university; suggestions for alternative assessment, as well as their emotional reactions. There was also a free space for them to contribute personal reactions and observations. Their personal backgrounds, and their expectations and the challenges they faced were explored to check alignment with the FYHE and original TP literature included in the Literature Review in this thesis as well as to add richness to the profiles created here.

4.5.3.2. *Staff interviews.*

The lecturer interviews were not as focussed as intended but still contributed richness and depth to the project in terms of responding to the research questions. L2 had not taught the course recently but I decided to go ahead with what we could discuss as I considered that it would be likely to contribute to the discussion, and it did relate to ways to enhance the first-year experience. While this case study was central to the discussions, their individual preoccupations tended to dominate the interviews, so the central issues discussed were: teacher education, the course under discussion, and the value of this research. They also produced some new themes according to the specific interests of the individual lecturers. L1 introduced the issues of school-wide pedagogy (SWP) and strongly supported the purpose of the course under study here in terms of its focus on dialogic pedagogy and the role of this research in potentially providing a starting platform for new student teachers. L2's contribution was about the Teacher Education Ministerial Group (TEMAG)

(Craven et al., 2014)²⁰ and hence this university's restructuring of its teacher education programme and how this research would feature in that implementation. L3 focussed strongly on this course and issues involved in transitioning students into the university, thus linking strongly to this research as well as adding to its potential value in future course planning.

All the transcripts were placed in the NVivo project and analysed in terms of the existing themes, as well as the new themes that emerged. In the process of analysis there was ongoing re-assessment and re-categorising of texts. The next chapter shows the final results of that analysis which was arrived at through a thorough process of refining and reflection.

4.6. How the Vocabulary Count Was Implemented

The Academic Word List (AWL) (Coxhead, 2000b) was an important resource for this aspect of the research. It has evolved through several processes starting with Michael West's General Service List (West, 1953). It also incorporates the University Word List (Xue & Nation, 1984), which was a precursor to the AWL (Coxhead, 2000a). Most of that research has focussed on the teaching of students who do not speak English and does not relate to the issue of the relationship between language and thinking, which is central to this research. However, comparing the list of words used in these data with the minimum number of words required at University, according to Coxhead (2000a) can be a useful indicator as to what SWs have in their VUBs when they enter the university.

An academic word list should play a crucial role in setting vocabulary goals for language courses, guiding learners in their independent study, and informing course and material designers in selecting texts and developing learning activities (Coxhead, 2000b, p. 214). Good knowledge of academic vocabulary is essential for success at

²⁰ This will be referred to as TEMAG in future. This Report, The Craven Report, was far-reaching in both its composition and its recommendations. If its recommendations are followed by HEIs responsible for teacher education it will have a significant impact on necessary changes in the initial education of teachers.

higher levels of education (Corson, 1997 cited in Coxhead, 2000b, p. 230). By highlighting the words that university students will meet in a wide range of academic texts, the AWL provides the foundation for a “systematic approach to academic vocabulary development.” (Coxhead, 2000b, p. 230).

The *lemmas/word families*²¹ in the SWs’ essays were listed in NVivo. It was necessary to change the data from their original form for the programme to list only the words generated by the writers themselves. Hence their reference lists were deleted, as were any tables provided in the essay task except for those SWs who incorporated parts of the tables into their essays. The AWL was then copied into a spreadsheet and the lemmas/word families that appeared in the data were marked on the spreadsheet next to the equivalent in the AWL. (Appendix 3) The number of instances of their use was also noted in terms of the definition already provided.

4.7. Summary

This detailed report of the ways in which the written data have been analysed to demonstrate the existence of HOTS and academic literacies is part of the way forward towards discovering what the SWs have in their VUBs that they have used in the creation of their critical comparative essays. It includes the way decisions and choices were made about the use of *bricolage*, case study and mixed or integrative research. What data would be sought and how they would be analysed is also discussed. As suggested earlier, to discover the academic literacies, which includes HOTS, present in the writing and interviews of the participating SWs, the works of Marzano et al. were consulted and with the metaphors used were adapted to identify

²¹ For the creation of the AWL, a word family was defined as a stem plus all closely related affixed forms, as defined by Level 6 of Bauer and Nation’s (1993) scale. The Level 6 definition of affix includes all inflections and the most frequent, productive, and regular prefixes and suffixes (p. 255). It includes only affixes that can be added to stems that can stand as free forms (e.g. *specify* and *special* are not in the same word family because *spec* is not a free form) (Coxhead, 2000b, p. 218).

thinking skills. This was followed by the identification of academic discourse, academic writing, idiosyncratic language or *AusE*, and vocabulary according to the descriptors discussed and described in the previous chapter.

CHAPTER FIVE: HIGHER ORDER THINKING SKILLS IN STUDENT WRITING AND INTERVIEWS

5.1. Introduction

In the next three chapters the results of the analysis of the data from the essays and interviews will be reported, connections will be made to the research questions as well as to the theory and literature review. In this chapter details of Marzano, Kendall and Costa's taxonomies and descriptors of HOTS will be identified and their application discussed. The academic literacies (in Chapter Six) and the additional themes (in Chapter Seven) will be analysed and discussed. Chapter Seven also includes additional theoretical development because its themes only emerged after the data collection and analysis, so the relevant theory could not be included in Chapter Three. The headings and sub-headings reflect the individual descriptors and how they are applied in the analysis. Tables have been used to simplify some of the more complex results and to provide a better picture for the reader as to how the various parts of the main levels add up to the whole level. For example Marzano and Kendall's highest order of thinking skill is the self system; it consists of three sub-levels that together constitute overall motivation. It is possible for a student to exhibit any one or all the three sub levels and there is a table to demonstrate that (Table 5.1).

Exemplary extracts are taken from essays and interviews. The APA guides consulted did not provide a rule so following Corden and Sainsbury (2006, p. 20), extracts taken from the interviews will be written in *italics* for easy identification and differentiation.

The discussion moves from the details of the essay analyses, including some interview data, to analyses of the interviews in which both expected (i.e. HOTS and academic literacies) and unexpected themes emerged. It was possible to relate all the unexpected themes to the issue of enhancing the first-year experience especially for

teacher education students and potentially for other students. They provided rich data on issues such as, teacher education, the value of the findings of this research for curriculum development in teacher education, some aspects of challenges for new students, attitudes to assessment, and moving from university into teaching in the schools. This all added value to the total picture of the SWs VUBs. The following chart provides a comprehensive overview of the results of the analysis and reflects the contents of the next three chapters.

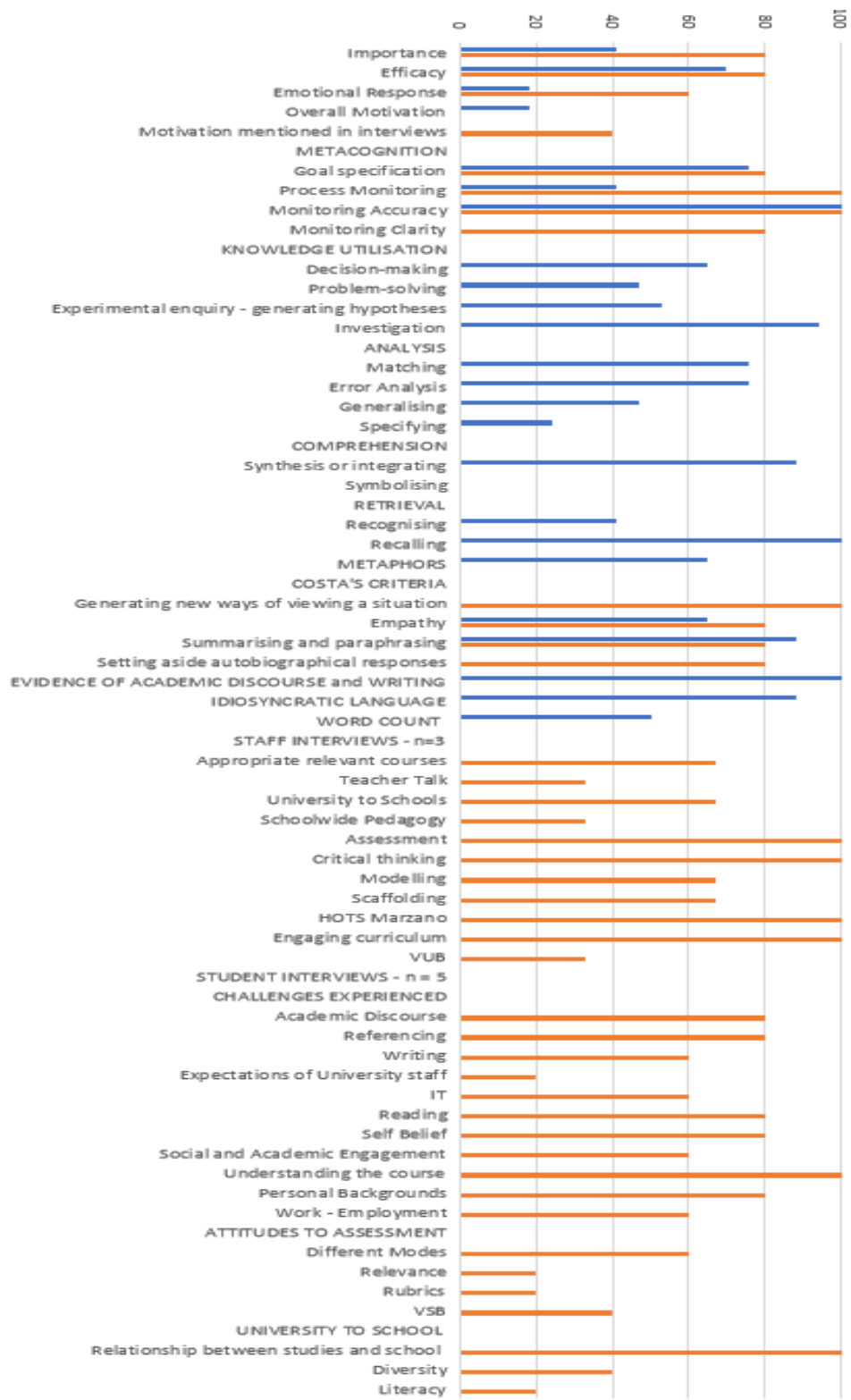


Figure 5.1. Overview of Data Analysis

The blue bars represent written data and the orange bars interview data. All are arranged in order of the sections of the text.

The self system is represented in the first set of bars and the first three pairs of bars show how the essays and interviews compared, then the calculation for overall motivation is shown, followed by motivation discussed in the interviews. Smaller charts will explain the detail as the analysis progresses.

5.2. The “Bricologic”

The data sources were essays (seventeen), SW interviews (five) and staff interviews (three). The richest data came from the essays (seventeen as opposed to five SW interviews and three staff interviews) because there were more units they were the sources for most of the descriptors. They also provided the foundation for the rest of the analysis that emerged from the interviews. Using the principles of bricolage (see 4.4.2.2. for an in-depth discussion of how bricolage is used in this thesis), it was possible to analyse the data finely and build a comprehensive picture of what the SWs could do when they wrote the essay. The whole project was initially concerned with identifying (HOTS) and academic literacies. There is more detail about the academic literacies in the next chapter. The application of the work of Marzano et al. was the starting point for the discovery of the HOTS and the main analytical tool/framework used. Their work provided descriptors within a taxonomy that allowed for the detailed analysis in this chapter. However, they also included descriptors that were not discoverable in the essays, so the interviews were used to fill those gaps and they are therefore included in this chapter, and reflected in the table.

In addition to the HOTS the issues pertinent to academic literacies, discourse and writing were also explored in the essays and are shown in the chart in the sections called academic discourse, idiosyncratic language, metaphors and vocabulary count. The interviews also yielded evidence of idiosyncratic language and that too is shown separately in the chart. The interview sections separately represent issues arising from the interviews, which were not covered in the essay analysis descriptors and are represented individually under staff and SW interviews in the chart. All the data together create a picture of the contents of the SWs’ *virtual uni bags* (VUBs), which goes towards answering the research questions that are guiding this research. They

are the pieces providing the ‘bricologic’²² of the bricolage, the components creating the contents of the VUBs. More detailed discussion of those ‘pieces’ follows this.

They are organised according to Figure 5.1, starting with the Marzano descriptors, essays and interviews (HOTS), before focusing specifically on 5.3.1. Self system; 5.3.2. Metacognition; 5.3.3. Knowledge Utilisation; 5.3.4. Analysis; 5.3.5. Comprehension; 5.3.6. Retrieval; 5.3.7. Metaphors; and 5.3.8. Costa. This is then followed by the academic discourse and writing descriptors: 6.2. Academic writing; 6.3. Textual metadiscourse; 6.4. Interpersonal metadiscourse; 6.5. Use of discipline jargon; 6.6. Idiosyncratic language; and 6.7. Vocabulary count. A section on the themes that emerged from the staff interviews follows, and then the issues from the SW interviews that reflect their experience in writing the essay and how PFT might enhance that experience (in Chapter Seven).

5.3. Interpreting results of essays and interviews - Marzano, Kendall and Costa

These results are derived from the Marzano descriptors (as discussed in Chapter 3).

5.3.1. The self system (including interviews).

That the self system is the highest level of Marzano and Kendall’s taxonomy has been stated multiple times already (c.f.3.2.1), but it is useful to reiterate. All the descriptors at this level and the next one are about what the SWs believe about themselves. However, to discover such beliefs in their assignment essays is difficult, so the interview data were able to fill some gaps.

5.3.1.1. Examining importance.

Examining importance (c.f. 3.2.1.1) was distinguished in the SWs’ writing when they commented that an aspect of pedagogy they had learnt was important. In addition, their comments about importance were mostly set in the context of their

²² With thanks to Professor Shirley O’Neill (personal communication) for this newly minted phrase!

recommendations for solving the problems that occurred in the transcripts and not to self-analytical questions like: “What is important about this knowledge or skill to me?” or “Why is this knowledge important to me?” In terms of the written data, where a SW demonstrated understanding of importance in a way that related to the topic of the essay, and supported their assertion with appropriate insightful comments drawn from the transcripts provided for their analysis, which also resonated with the purpose of Marzano and Kendall’s (2007, 2008) definition, they were coded at this node. In the interviews they responded to the question relating to their own sense of importance and therefore were coded at this node. In the reporting, the oral and written evidence is presented separately but for purposes of assessing the relevant levels it is aggregated.

As the table below (Table 5.1) shows, eleven SWs showed evidence of this skill in nine different written instances. In the interviews, four of the five sources showed this in seven instances giving a total of eleven sources and sixteen instances. Of the written instances coded, most identified the importance of the **home to school divide**,²³ as can be seen in the following extracts:

To have successful learners, teachers must help their students understand the classroom Discourse, how it differs from the home Discourse, and how it applies to them. Campbell and Green (2006) highlight the importance of understanding the home-school connection for each of their students and using this knowledge to scaffold the children’s learning to ensure their success. (SW 9)

...both the school and home environments are equally important. School is a structured educational institution with certain boundaries and has the motives to teach children particular subjects that are taught across every other school. Whereas the home environment is dependent on the child’s will to learn and their parents or guardians influence in what is being taught. A key difference in the school and home environment is the student/ teacher and child/parent relationships and their styles of communication. (SW13)²⁴

²³ Words in bold in this section denote issues covered in their course that are germane to this essay

²⁴ I have not edited the text for grammatical or spelling errors. Part of the inferred argument in this thesis is that such idiosyncratic expressions will drop off over time and that what is important at this stage is that they are making appropriate meaning.

...and the ways in which literacy is learnt in the home...

Sarah's Aunt also showed an understanding of the importance of literacy learning at home. This is evident through her shared reading episode with Sarah. ... and is specifically using the text participant role to engage Sarah with the story of 'The Gingerbread Man'. She draws upon Sarah's prior knowledge ... and focuses on the cognitive strategy of predicting (Seeley, Flint, Kitson, Lowe, & Shaw, 2014, p. 236) when she asks in L52 "What do you think is happening here?" and L54 "Who is he running away from?". Shared reading and reading aloud are important for language acquisition; ... (Miller, 2012, p. 72). (SW 2)

... also the importance of the school recognising the influence of what the child brings from the home in their *virtual school bag* (VUB)(Thomson & Hall, 2008).

On the other hand, most of what is observed in Transcript 1 demonstrates effective literacy learning pedagogy in the *home setting*. Literacy learning experiences in this diverse sociocultural context are especially important for young pre-schoolers and toddlers, who then take this prior learning with them to the classroom (Walker, 2005). (SW 4).

SW15 referred to the contents as 'funds of knowledge', "It is important for teachers to be aware of and use the different funds of knowledge that children have to enable all students equally in participating in literacy learning." She also made a case for **recognising the Elaborate move** in the Scaffolding Interactional Cycle as the most important ...²⁵

... it is this move that really "maximises the learning for all students by focusing on literate language, exploring meaning and inferences, unpacking metaphors, developing metalinguistic awareness and connecting with students' prior knowledge and experience" (Cullican, 2005, p. 13).

...while another emphasised the **importance of clear discourse** in the classroom.

Overall the differences between Transcripts 1 and 2 indicate the success of following a structured scaffolding sequence or pedagogical approach. Both lessons used teacher talk and scaffolding strategies, and demonstrate the

²⁵ The Scaffolding Interaction Cycle (SIC) has been referred to a number of times in the student extracts. It refers to a key concept taught in the literacy course. It is about talk 'moves' teachers make when initiating classroom dialogue and is a process recommended in current pedagogical theory. Culican (2005) is the article prescribed for the students' reading and is much referred to.

importance of clear patterns of discourse as teacher talk methods and conversation directly influence the way students evaluate speech and use it as a tool for their own learning (Mercer, 2010). (SW18).

In the interviews SW16 elaborated at length on what she considered to be important about learning language and while she did not have a good understanding of the language acquisition process, she was clear about the need for children to be confident orally, to be able to write, “...when they are writing something they need to be able to comprehend well what they’ve read and sometimes they will comprehend it more if they’ve got it and can relate it back to their real life situation.”

She elaborated on the usefulness of linking the child’s real life to the classroom learning:

...and even more if they can get motivated about it because if they're really excited about something they've done in their own lives and then all of a sudden you're talking about the classroom, well, they can tell you something...

Like SW16, SW1 did not get personal about this and elaborated on the importance of the course we were discussing and how application of the theory of Vygotsky’s ZPD and scaffolding can enable teachers to develop children.

I think that course was really the starting block of seeing how important it (literacy learning) was...and I made that point about the insider and the scaffolding really struck me to be used of all learning not only literacy, it doesn't matter, the ZPD – that idea of building from where the student is and moving them further on, to me was important. I think we did grammar and all of that as well, but for me I guess those other ideas were much more how one can bring a student on, that was what was important about that course.

SW3 became very animated in response to the question about the importance of what she was learning for herself. This response directly reflects the Marzano descriptor discussed in section 3.2.1.1 Examining importance...

...the knowledge I am gaining is incredibly important for all aspects of my life not just for a person wanting to get into the profession, also as a person, I will have the confidence to have a conversation with a person who is at a higher level of doctor perhaps, ...I am more equipped to get involved, not just to become a teacher. Uni has given me the ability to be a better version of

myself and want to continue to build on it... (hand gestures) get to there... but I have still got to keep going, yes you cannot give up. I am empowered.

SW18 gave a different perspective – she had not found the second assignment engaging and initially found the first one more engaging and useful. I re-read her assignment and reassured her that she did well enough in the assignment. However, the fact that she did not remember it at all, was indicative of her lack of engagement. All this although she was certain of the value of literacy learning after her stint in ESL in Vietnam, which had brought her into the course. She then checked her assignment and remembered how the IRE sequence (I think she intended to refer to the SIC sequence), had come up for her on teaching practicum.

Because it was at the start of my uni journey I didn't really see how to apply it but now I can really see 'o yeah that makes sense' especially now that I have been on prac, I can really see how the teacher talk affects the children Questioning as well, at the time, I didn't really think it was important but now I do.

5.3.1.2. Examining efficacy.

This skill was discussed in detail at 3.2.1.2. It is about self-belief and the SW's sense of their ability to do the job and to improve. As the chart below shows, a total of sixteen SWs were coded as showing this skill in twenty seven separate instances.

This is part of the self system and in the context of the essays when the SWs examined the efficacy of the teacher's practice and the mother and aunt's so-called teaching activities with the little girl, they covered ground that would be covered in self system questions like 'Can you improve?' 'How well do you think you can do?' 'How well can you learn?' Although they are not examining their own efficacy, their comments do give an indication of their sense of efficacy and they were therefore coded as such. All the references coded in the written data showed a sense of what constituted effective literacy teaching practice. This is not surprising as the course is about literacy teaching and the task directed them to compare two transcripts, which showed different literacy learning and teaching situations with a view to providing critical interpretations within the different theories they had studied. However, in the interviews the SWs' own sense of their own efficacy was evidenced and showed

how studying successfully had enabled their self-confidence and personal efficacy to develop.

SW1 did a thorough analysis of how Aunty Jane in T1 effectively applied the moves of the SIC, as did SW2. SW3 focused more on the relationships between the child and the adults in T1 and how the trusting nature of those relationships enabled the child to engage her cognitive skills. SW4 focused on how the shared reading model was...

...an effective tool for explicitly teaching reading and writing behaviours and strategies (Gill, 2006). Shared reading experiences at home (and at school) have been found to play a critical role in establishing students' early literacy framework (Whitehurst & Lonigan, 1998).

She supported this with a list of how the different strategies enhanced the child's chances of becoming a good reader. She also invoked the SIC as a good model of teacher talk:

...the SIC has teachers providing students with high levels of support scaffolding students' cognitive processes of justifying correct answers– with no rejection of incorrect answers – and, thus, replaces the typical question-answer practice as with traditional pedagogies (O'Neill & Geoghegan, 2012).

The SWs also showed their sense of efficacy when they criticised the teacher in T2 for not being effective. SW4 damned him with faint praise, pointing out that he consistently neglects the prepare and elaborate moves. She cited Culican:

Elaborating learner dialogue is a particularly critical move in the application of SIC as it “maximises the learning for all students by focusing on literate language, exploring meanings and inferences, unpacking metaphors, developing metalinguistic awareness and connecting with students' prior knowledge and experience” (Culican, 2005, p. 13).

SW14 agrees that Mr Hammond neglects the “elaboration” move and adds that he...

...focuses on Pedagogy of School which leaves less time for Pedagogy of Literacy Lesson. This is seen by the teacher talk used which requires students to 'guess what is in the teacher's head' (Bull & Anstey, p. 90). This is seen when Mr. Hammond states: “Well you are all right in a way....” (L29) and the students are then left with no clear direction...

SW15 joins the chorus of criticism: “In many instances the teacher in T2 experiences reasoning trouble when he fails to use student responses as sources of information and when students have their contributions dismissed they are less likely to participate in the future (Campbell & Green, 2006)”.

SW6 adds this critical stance to the hitherto positively viewed picture of the mother and daughter scenario, and points out that at first the mother in T1 was more focused on getting a task done than on cognitive processing but later engages in more constructivist dialogue with her daughter.

T1 L39 results in an open-ended question, where Sarah’s suggestion for the eggs as Sunday breakfast (L40) is an example of the Vygotskyan constructivist theory (Hua Liu & Matthews, 2005), that we construct understanding through experiencing the world around us.

Continuing the theme of constructivist dialogue, SW12 makes the point that “rather than rejecting a student’s inadequately prepared response, the SIC allows teachers to evaluate it and provide affirming feedback”.

The quality of the dialogue is approved by SW18 who observed what the child will have in her *virtual school bag* (Thomson & Hall, 2008).

Throughout the interaction authentic adult language is used, and Mum incorporates pieces of new vocabulary such as the word ‘remain’ in place of using the word ‘left’. Children experience most language discourse through their parents, and there is increasing evidence that parental speech is related to a child’s vocabulary growth (Fiano, 2013). . . ., ultimately influencing her academic vocabulary in the classroom (Fiano, 2013). (SW18)

In the interview SW16, a teacher aide, described her sense of her own efficacy when she said, “*There were some times when there was a supply teacher when you thought you could just let them go home you could do a better job than them.*” She also described her approach to making each child in the class feel special, and she suggested

pulling sticks...so that each one has an opportunity because sometimes they are not quite sure about something but if they feel like they are part of the conversation, sometimes that helps them to go on to the next step because you’ve actually listened to them.

She showed her own efficacy there, although it was in the context of describing how she would help the children feel their efficacy.

Three of the other interviewees also described their sense of their own efficacy. SW1, an online SW, had found ways of interpreting the courses and the unfamiliar language: “*When I can I ask, if not I Google!*” She also said that her confidence had grown and had a quick look at the next semester’s assignments and thought they looked quite hard.

But I will always figure it out. Do a bit of reading, do a bit of research on line and eventually you will get your ideas, sort of thing, ...I think it’s given me that confidence so that I can start...

Empowerment was a solid thread in SW3’s interview, and she looked forward to continuing her studies. This, from a person who had not even completed O levels in England and who had done it all online while working full-time and parenting a small child. SW10 was different, she had no doubts about her ability to write essays, as she had learnt that at school, but had found as long she was able to go to the tutorials and have the work checked by the tutor she was confident. Regardless, she passed both assignments comfortably.

5.3.1.3. Examining emotional response.

Similarly, in the case of Examining emotional response (c.f. 3.2.1.3), although the descriptor refers to the personal emotional response of the child or student, if the SW appreciated the effect of the emotional responses on the children’s ability to learn, it was considered that they were sensitive to the role of emotional responses in the learning process and hence their writing was coded at this node. As Table 5.1 shows, three SW essays were coded here in six instances, and three in the interviews in four instances. This represents a total of six students of eighteen who showed an emotional response to the subject. In the essays, appreciation of the role of affect in the classroom was more apparent.

“In the process the child makes a mistake, and rather than (sic) the mother showing negative enforcement she has reassured the child that this was okay” (SW13). SW17 commented on the same incident: “In Transcript One Mrs Green is very positive

after Sarah comes close to performing a task incorrectly; she is very reassuring towards Sarah and does not create a negative situation.” The same SW showed understanding of the importance of emotional responses in learning as follows: “Mrs Green also commends and praises Sarah when she answer (sic) a question correctly, “Yes you’re right. Well done!” (Line 16); this also gives Sarah confidence and encourages her to finish the task she has been set.”

SW16 shows an understanding of the effect of emotional support:

Sarah was able to engage in meaningful conversations with her Mum and Aunty and both adults responded with positive corrections, reinforcement and guidance. These conversations and questions encourage development of cognitive process by which Sarah arrives at her answers through guidance (T1, L32, O’Neill, 2011).

On a different level, SW1 in her interview showed an emotional connection to her studies. When asked if she had found the studies rewarding, she said:

Uhhh...there is dark ages when I feel I don't understand this assignment. This is frustrating, I don't want to do it anymore, but then when you get the assignment finished and you go, 'Wow I can do it,' that's when you go 'yay' and then when you get it back and most of the time I get a good mark. Occasionally I get a bad one and that's when I go OOOOH! I will have pick my game up a bit and try to understand this one a bit better.

SW3 in her interview spoke about having emotional responses to her colleagues’ behaviour but showed her own emotional knowledge and control:

I guess emotional responses are probably at work, I would have a response and then consider it before doing it. Could be with another staff member who...has done something that's irked me, I can't just go in with raw emotion, have to consider...and...All depends on where I'm at...

Furthermore, SW18 spoke about how her job as a receptionist at a cancer clinic was good for her emotional health:

I learn about chemotherapy and learning how to deal with people in tough times, counselling skills, and I think it will help when I am dealing with little people in school, So I think that if was only to go to campus I would be a different person, less reflectional.

The combination of the above analyses will also determine which of the SWs in this data demonstrated Overall Motivation. Table 5.1 shows how this was calculated and who achieved this result.

5.3.1.4. Examining overall motivation.

In terms of the Marzano and Kendall descriptors, for overall motivation to be considered present, all three qualities mentioned previously (the trinity) are necessary: Examining Importance, Examining Efficacy and Examining Emotional Response. Table (5.1) below shows the distribution of the descriptors that constitute the Self system. In this case only five SWs (SW1, SW3, SW16 and SW18) showed this higher order thinking skill completely in their essays and interviews combined and SW13 had a ‘full house’ based on her essay alone. According to this analysis, five out of seventeen, or 29%, of SWs demonstrated Overall Motivation, the highest skill in the Marzano-Kendall taxonomy²⁶. In the interviews however, the other SWs spoke of their motivation. SW1 expressed her sense of motivation in this summary;

I guess my motivation is a double thing, wanting to be a good teacher and wanting to do well in the assignment. I can't think of anything specific to that assignment but in general I want to get the answers and do well. (SW1)

SW10 explained that her motivation level for the second assignment was low because she was on practicum when the tutorials pertaining to that assignment were presented, “*so I wasn't feeling too good about that one.*” Later in the interview she explained that she was dropping out of university and might come back to do a different course. She is a traditional student in terms of her age, and she transitioned straight from school to university. Her decision to defer her studies is not uncommon. James, Krause, and Jennings (2010) report that 23% of first years seriously thought of deferring their studies in the period 2004 – 2009, 5% lower than was reported in 2004. Moreover, some in this category decided this for reasons of

²⁶ There is a complication in the calculations because SW10's essay is not in the data set so it is only possible for her results to be analysed according to her interviews. I had thought of leaving her out of the study but because her interview provided valuable information she remains in. However, this makes it difficult to calculate precisely. This presents one of the challenges of mixed methods research.

emotional health (56%), which seems to be where SW10 was situated. She did not fit into any of the other categories cited as reasons for deferring in this report therefore her decision should not be surprising. McCarron and Inkelas (2006) report from their very large longitudinal study that the majority of first generation students did not ever attain a degree. Bye, Pushkar, and Conway (2007, p. 144) suggest that traditional students have higher levels of extrinsic motivation than non-traditional students and that they show less persistence in their studies. SW10 did not seem to be highly motivated, although she liked the idea of studying art, which she had done at school. There are further indicators of this later in the interview as well. According to Bye et al. (2007, p. 145) this is likely in an undergraduate, at an *identity-forming stage* in their life, who might be experiencing situational interests, which would suggest more extrinsic motivation for learning. Other researchers contribute to the thinking around students like SW10 who are not well engaged with the institution. Collier and Morgan (2008, p. 425), in their investigation into the differences between academic staff's expectations and the students', found incongruities between "faculty and student perspectives" and between traditional and first generation students. They discuss students' mastery of the role of the student and consider that mastery is a form of cultural capital. SW10 had identified herself as being the first in her family to attend university and had not had experience of university study before this course and the other courses she did in tandem with this one. Collier and Morgan cite Tinto's (1975, 1993) model of student success in which he describes what new students bring with them in what has been referred to in this thesis as the *virtual uni bag*:

...new students start with pre-enrolment packages of individual attributes, previous schooling, and family support. These have a direct effect on the students' desire to complete a degree, which Tinto refers to as "academic integration." These variables also affect the students' desire to get a degree at a particular institution, or what Tinto calls "social integration." (Collier & Morgan, 2008, p. 426)

If the idea of "desire" is related to Marzano's descriptor of motivation, SW10 appears to have little motivation and, in Tinto's terms, would not be expected to persist with her degree despite her good grades. Collier and Morgan (2008) turn to role mastery theory because they are not satisfied that academic integration can be

shown reliably by quantitative research using GPAs. Thus, they are moving closer to Marzano's thinking when they argue that "there must be other elements of academic integration that influence GPAs" (p. 426). Marzano's self system theory becomes complex in a case like this, where the SW has no lack of a sense of efficacy but lacks a sense of importance, and her emotional responses are directed towards resolving personal issues rather than positive emotion being directed towards the knowledge to be gained at university. The prognosis for her success would be poor even if she had not decided to drop out. This SW had also not acquired the cultural capital needed to integrate with the university.

Collier and Morgan expand their discussion to a comparison between the success rates of traditional versus first generation students. The traditional students have the advantage because, according to Collier and Morgan (2008, p. 428, citing Lareau & Weininger, 2003), they have the type of cultural capital described by Bourdieu, which enables them to understand what the academic teachers require in terms of...

...mastering both explicit and implicit aspects of the college student role, this points to the importance of: (1) Situations in which instructors evaluate student performance, (2) the assumptions and expectations that instructors use, and (3) the resources that students have for recognizing and responding to their instructors' expectations.

Key terms used here are "assumptions and expectations" and "recognizing".

Students who have been prepared for university, or who grow up in homes where the academic assumptions and expectations are part of the culture of the home, will clearly have an advantage. She went to the sort of school where they would have been groomed for university. Ironically SW10 still did not seem to recognise some of the elements of the culture of university, she still expected to be able to get drafts read and commented on and to get lots of help with structuring her assignments from her tutor, who luckily for her, was prepared to provide that sort of assistance. She had not yet formed an appropriate identity. In other theory relating to the acquisition of an appropriate identity in first year students, Boyd, Hunt, Kandell, and Lucas (2003, p. 156) developed an argument about traditional aged students, which focused on identity formation. They used a model that hypothesized three processing styles:

...an *information identity processing style* would see themselves as prepared for college. They would be expected to adapt well to the academic climate; seek further information when needed; and possibly change their major if warranted. Students with a *normative identity* processing style would also see themselves as prepared for college. They would respond to the expectations of their family and the academic community by performing well; and they would be unlikely to change their major. On the other hand, students classified as having a *diffused/avoidant identity processing style* would see themselves as not sufficiently prepared for college. They would anticipate having difficulty adjusting to personal and academic challenges, and would not have clarified their academic major. (emphasis added)

SW10 exhibits aspects of all the above: she had a sense of self-efficacy, and therefore fitted the information identity processing aspect of the model, and she had a normative processing style in that she performed well, but she also showed an avoidant processing style in that she had not clarified her academic major. The Boyd et al. (2003) study proceeded to a quantitative analysis of incoming students and followed them for four years. They claimed that their instruments predicted degrees of academic success and provided guidelines for counselling guidance once the students had been identified as fitting one of their categories. It would have been interesting to know where SW10 fitted into the above schema. In terms of this research, the important aspect of the article, and the research it reports, is that the researchers are attempting to discover what qualities their incoming students are bringing with them, or their VUBs. In the study mentioned above, the contents of that bag are being explored for the same reasons: to discover how best to enhance the university experience for incoming students.

Returning to the Marzano et al. descriptors it seems that the weak areas in the self system are the sense of importance and the emotional response to their studies, while efficacy is not that strong in the written data either. The numbers suggest relatively low levels of self system thinking and earlier in this thesis it was argued that overall motivation had to be present in the SW for them to be successful. Despite that, more than five of the essays in this data collection passed the assessment! This might indicate a limitation in the data used here. One specific essay and course cannot be expected to yield a fully comprehensive result and indicator of a whole student cohort's abilities. On the other hand, it might suggest that it is possible to pass an assignment without a full complement of self system skills, in which case further

questions would need to be asked concerning the possibility that the pass requirements are being tailored to what the students can do and not necessarily according to the highest expectations of academic rigour. Except that the self system is more about the way the student feels about their abilities and their learning, which might imply more about the longer-term capabilities, progression and retention of students with a fuller complement of self system skills. The aim of this research is not to prognosticate long-term success but to discover what the students can do when they start at university and as such, has gone some distance to doing that.

However, to return to the research theory consulted as underpinning this project (e.g. Merriam, 1998; Kincheloe, 2001; Riege, 2003; Gerring, 2004; Kincheloe, 2005; 2007; Noor, 2008; Van Wynsberghe and Khan, 2007; Yin, 2014), it is possible to draw some conclusions, and further analysis of the data should show evidence of a range of other useful skills and knowledge contained in the VUBs. While the self system is not strongly represented in the VUBs the next level of the Marzano taxonomy is metacognition and shows a stronger representation. It will be explored next to see what it adds to the contents.

Table 5.1

Self System Thinking

	Importance	Efficacy	Emotional response	Motivation
SW1	X (I)	X (E)and XXX (I)	X (I)	X
SW2	X (E)	X (E)		
SW3	X (I)	X (E)and XX(I)	XX (I)	X
SW4	X (E)	X (E)		
SW5				
SW6		XX (E)		
SW7				
SW8				
SW9	X (E)			
SW10		X (I)		Negative emotion re motivation expressed in interview
SW11	X (E)	XX (E)		
SW12		X (E)		
SW13	X (E)	X (E)	X (E)	
SW14		XX (E)		
SW15	XX (E)	XXX (E)		
SW16	XX (I)	XXX (I) and XX (E)	X (E)	
SW17			XX (E)	
SW18	X (E) and XX (I)	X (E)	X (I)	

E = essay data; I= interview data. Green highlight = ‘full house’ of skills and beige highlights = other examples per SW. Multiple X = numbers of instances of the occurrence of the skill per SW.

Multiple Xs indicate more than one indicator of this skill. This will be repeated in subsequent tables.

5.3.2. Metacognition including interview results.

The next level of the Marzano taxonomy is the “executive function” of the higher order thinking system (Marzano & Kendall, 2007, p. 53) metacognition, in which the SWs specify their goals and monitor their process, clarity and accuracy in terms of those goals (c.f. 3.2.2).

5.3.2.1. Goal specification.

Goal Specification occurs in several of the SW essays when they declare their intentions in their introduction and say what they are going to do, and how they are going to do it. When they did this, they were coded as having specified a goal. It

could be argued that it is normal in an academic essay to state the purpose and shape of the essay. However, many of them did not do so, and therefore when they did, they were coded as having specified a goal.

Thirteen SWs were coded in this node in the written data and four in the interview data in a total of nineteen instances (Table 5.2). Although not specifically sought in the interviews, four SWs did produce further evidence. When they had stated their intention and given indications as to how they intended to achieve their goal they were coded as having shown this skill. In the interviews, they spoke of personal goals and how they had achieved them. In the following text, comment will be made on each one. They are largely arranged numerically. In the essays the SWs typically made statements like “In this essay a comparison of two transcripts will occur” (SW1). This might be followed by: “Firstly the transcripts will be compared by...” (SW1), or “This essay will examine examples of teacher talk through transcript one (T1) and transcript two (T2) using the theories of the Scaffolding Interactional Cycle and Bull and Anstey’s three styles of pedagogies that occur in the classroom” (SW2).

This essay will also discuss the evident differences between the two educational settings and will detail how these settings help to foster language development within both contexts. Analysis will also be conducted in relation to the roles of both adults and children in both literacy settings. (SW5).²⁷

SW5 thus declares a further aspect of the set task, which is to discuss the roles of the adults and the children as well as examine the ways in which literacy development is promoted in the transcripts. A clear statement of the theory to be used in the analysis is provided by SW6, while SW16 says that her paper “undertakes an analysis of the effectiveness of Transcript One (T1) (O’Neill, 2009) and Transcript Two’s (T2) (O’Neill & Gish, 2009) effectiveness in achieving the best learning outcomes in an educational setting.” Furthermore, SW8 provides a solid statement about scaffolding and elaboration, all consistent with the course teaching. “It will display that transcript one’s use of scaffolding and elaboration and the consistent application of

²⁷ I did not assume poor writing when the SWs failed to passivize and spoke of the essays as if they were agents. This is a personal dislike but I am increasingly aware of essays, articles and even books being given human attributes!!

purposeful and student-centred learning creates a more effective and resounding educational experience.” SW9 shows knowledge of one of the core principles of the course, acknowledging diversity and catering for it, while SW12 neatly summarises her intentions: “This analysis seeks to identify the types of literacy pedagogies evident, the way the socio-cultural context influences language and literacy development and the implications of teacher talk.” Then SW13, states her intention: “The Scaffolding Interactional Cycle (SIC) and Bull and Anstey will be discussed in detail about the relations of each environment has to(o) both pedagogies.” This SW is the one who was not interviewed and showed all three Self system skills, thus qualifying for overall motivation. However, it will be observed here, as well as in the other quotations of her writing, that idiosyncratic writing is common in her work. SW14 did a classical statement of First...Then next...And finally...Then SW15, also in classical style, provides a summary of what the reader can expect:

By comparing the approaches of teacher with the parents and analysing the transcripts’ similarities and differences this essay will show that transcript one (O’Neill, 2009) demonstrates the most educationally beneficial socio-cultural environment and pedagogies in developing literacy skills when compared to transcript two (Gish & O’Neill, 2009).

Finally, regarding the essays, SW17 wrote a standard statement in which she covered all the instructions of the task set. Moving on to the interviews, SW16, who is already coded in the essays, commented on her goal of wanting the children to be able to get on and use their knowledge and...

...push on and not all be the teacher speaking, There needs to be children using that knowledge, the teacher giving that little bit extra and modelling and understanding and pushing the children on to do that research and to compare and to use their real life experiences.

Then SW3 described how she realised her goal of becoming a teacher after doing early childhood courses in England then coming to Australia and making “*the brave decision to just do it rather than just think about it and talk about, just do it. It took about five years to pluck up the courage...*” SW1 also came to studying later in life. She recalled how she had always wanted to be a teacher but was not able to afford the training so she worked as a cane tester, then did a TAFE diploma online and finally thought, “*well I could probably do teaching now, at my time of life I might*

actually have a chance to do it so I am going to do it.” SW18 had a similar experience: when doing TESOL work in Vietnam, she realised that teaching was what she wanted to do, as it “*sparked my passion and I wanted to do it the right way.*” So she enrolled at a university.

5.3.2.2. Process monitoring.

Although Process Monitoring (c.f. 3.2.2.2) is usually to do with checking on personal progress; it is linked to specified goals (Marzano & Kendall, 2007, p. 102), but in this study it has been used where the SWs judged the literacy learning processes depicted in their transcripts. When the writers commented critically on the processes used by the teacher and parents, they were coded at this node.

Seven SWs were coded in their essays at this node and in the interviews five SWs were coded as saying that they consciously monitored their own processes. Altogether there were 37 instances of this skill (Table 5.2). This skill could have been conflated with Goal Specification but as it refers to *consciously* (emphasis added) monitoring their process towards a goal, it was possible to distinguish between the two. The SWs also commented on the way the processes unfolded in the transcripts and evaluated them. This was considered to give evidence of their ability to monitor their own process as well.

SW1 described the SIC process, as implemented by Aunty Jane, when she read a story with her niece. She also described how the mother in T1 modelled metacognitive skills.

She uses words such as in l 14 “We were going to check...around” then proceeds to show Sarah how to start checking this “So there’s you...daddy? How...that? A prompt (metacognitive modelling) is given T1 l 16 “but will...an egg?” In this way Sarah is not left to guess on her own how to figure the problem out but has been given explicit instructions. ... It was easy!” In this way Sarah has been engaged in a real life learning situation.

She then confirmed that the process was effective.

SW6 shows awareness of the scaffolding process provided by the prepare move of the SIC: “Her arrival with not only the storybook but accompanying gingerbread

man (L49) shows the prepare move. Sarah is given context, general meaning and visual prompts before any reading begins.” She completes her observation of the SIC cycle as follows:

This preparation continues (L50) and explicit instructions of ‘let’s read the story now’ guide Sarah’s expectations. The ‘identify’ move (L51) demonstrates Sarah’s ability to make meaningful connections to the text followed by the ‘elaborate’ move (L52) where Aunty Jane, build(’)s on Sarah’s response and encourages Sarah to examine the pictures and make predictions.

Using the same piece of text, SW12 comments on a different theoretical process “gradual release of responsibility” that was taught in the course: “Throughout the transcript, responsibility is gradually released to Sarah and eventually Mrs. Green involves her in a decision-making process, when deciding what they will do with the left-over eggs.”

SW13 comments on the same dinner preparation extract but from a Vygotskian point of view, relating the SIC to the theory of the ZPD. SW17 points out that the question in that section is broken up to enable the mother to check on the child’s process, while SW18 uses the same piece of text to show how introducing concrete materials supports the child’s learning. Later, SW15, comments on the way, in T2, in which the teacher makes the children aware of the application of the literacy they are learning to a real-life situation, in this case, drought.

In the interviews the SWs were invited to think about their processes when writing their essays and/or when they were working in a classroom. SW1 was open about the difference between what was expected at university compared with her previous experiences of essay writing, and was grateful for the scaffolding provided in the course for the writing of the essay.

I’m trying to think what I did now. I think a lot of it was, you know, starting and then going, I think I had to choose at first which one I thought was right. You know which one was the better one, and I think I had to make that decision and then back it up and then bring all the points together, that’s the way I sort of did things.

SW3 spoke about being daunted by the language of the course and how she was conscious of having to write like a professional and “*stay on track*”. She used the

rubric as her framework for this. She was conscious of the need to use the jargon correctly. Woodward-Kron (2008, p. 246) makes a strong case for students learning the specialist language of the discipline to demonstrate disciplinary knowledge. This SW quickly demonstrated accurate use of specialist language once she was prompted. However, she did make the point later in the interview that assignments follow each other close together and it is possible to forget what has been learnt unless the content of the assignment is being used in practice. She described how she used the Study Desk (Learning Management System), jotted things down, did a bit of research and, after going through all the provided material, she would write her assignment, all the time using the rubric as a guide.

In terms of their process, referencing was an issue that arose in the SW interviews. SW3, for example, found it ‘*pedantic*’ and ‘*confusing*’. Green and Agosti (2011, p. A-28) address this issue in a course on academic literacy they developed for postgraduate students and their students expressed appreciation of the value of what they had learnt about referencing. Their students were not beginning students like those in this research but had similar issues with referencing.

Another part of SW3’s process was the way she spoke about reflecting:

I think I reflect quite a lot, I tend to reflect on what I’m doing when I’m actually doing something. When I come away from doing something I think about how I did it, how I could have done it differently or better. What wasn’t quite right there. I do that coming away from every day at work. Coming away from an assignment is like that.

When SW10 was asked about how she sorts out the results of her research and her ideas in preparation for writing her essay she responded: “*I usually write down like the intro and then dot points, the usual basic structure.*” The words she used there suggest a lack of curiosity. Much about this interview suggested a SW who did not have a desire to develop critical thinking behaviour. It would be reasonable to assume that she would not therefore have monitored her process with any degree of criticality. This could take us back to Bye et al.’s (2007) research, which suggests that “traditional students” (SW10 is classified as traditional) extrinsic motivation would not include a desire to engage in critical thinking, which would have been part

of the process monitoring, as indeed accuracy and clarity monitoring processes would have been.

Halx and Reybold (2006, p. 298) explored three issues relating to critical thinking: (1) How do faculty members define critical thinking in the undergraduate classroom? (2) How does this definition of critical thinking influence their pedagogical choices? and (3) What is the role of institutional culture and ideology in the development and maintenance of critical thinking?

The third question is pertinent here as it refers to the issue of culture and ideology, which might be relevant to the students' backgrounds and habitus. They suggest that students who have been educated in a system that emphasises good manners and acceptance of authority find it more difficult to practise critical thinking. "The inculcated politeness of a culture can often deter students from questioning peers or faculty" (p. 312). This SW attended a Catholic school and that background might have had an impact on her disposition to think critically. The authors continued to explore the students' attitudes to thinking critically:

Some may believe that they are unable to think critically and, therefore, will not respond to critical thinking stimulus even when encouraged. Critical thinking requires, to paraphrase Aristotle, a *willingness* to entertain ideas without necessarily accepting them. **Disposition plays a central role in critical thinking development** (emphasis added) (Bailin et al., 1999a). Halpern (1999) agrees, stating that one must possess the "disposition to recognize when a skill is needed" and then "exert the mental effort needed to apply it" (p. 72) if one is to think critically (312).

In the case of SW10 it seems that she has no "disposition" to explore a new skill that might enhance her capacity. The idea of making a mind map was introduced in the interview, but it did not particularly interest her. Nor did she display a strong need to express her own ideas and opinions. Costa (2008, p. 23) encourages teachers to enable their students to think about their own thinking and emotions by using self-reflective questions. He notes that "skilful thinkers engage in an internal mental dialogue that helps them decide on intelligent actions." There are different ways of viewing a situation outside the bounds of the usual conventions but when she was asked if, during her writing and researching she had found that she wanted to go outside the apparent constraints that the course had placed on her, she responded:

“Not really, my out of the box thinking seemed to be not what the assignment said...had to choose.”

That is a sensible choice but it also suggests a lack of the sort of skilful thinking that Costa valued and encouraged teachers to instil in their students. She has no drive or self-belief in her own voice and thinking. Bye et al. (2007, p. 144) would be likely to see this response as typical of the traditional student who is extrinsically motivated and goal-oriented. She was studying to get the qualification and not for the personal satisfaction of learning something. They would also not be surprised that she had decided to take a break from her studies, as according to them, such students are less likely to persist.

However, Halx and Reybold (2006, p. 312) also make a strong point that the culture in which the pedagogical process is situated plays an important role in the development and application of critical thinking. This might say something about the culture of the university and course where SW10 found herself. She was dependent on her tutors teaching her how to do the assignments, which would not have encouraged critical thinking. The SWs needed scaffolding and support to do the assignment well, but it seems that in some cases this support might have stifled their critical thinking behaviour. This is indicated by them saying that they just wanted to get the right answer. The context in which Halx and Reybold (2006) were writing was an investigation into how academics were promoting the practice of critical thinking in their students. Their third question was to do with the institution’s culture. If the course does not have, the development of critical thinking, as an overt purpose, is it reasonable to assume that SWs should demonstrate such skills? However, the assignment that is at the heart of this study was a critical analysis of two pieces of pedagogical discourse, therefore it is reasonable to assume that the SWs responding to the assignment questions should demonstrate critical thinking behaviour and should have been expected to do so.

The next SW to be interviewed, SW16 took us onto another trajectory altogether. In terms of her process, it was linked to efficacy and this was her response:

I suppose sometimes when I learnt something I tried to apply it back to work, some of the things I had been doing with the kids in the classroom, and then I

had to do a sort of oral thing, a video, I suppose it gave you a better idea of just what it was that the children were understanding as you were working with them.

That gives a good idea of her testing of her process and of her consciousness of what it is. Then soon afterwards she spoke about the assessment piece and the two transcripts and reflected on the teacher, Mr Hammond's, process.

...he probably didn't break it down as much as he could have and use some of the opportunities he could have had to bring it back to the real world. There was one time when Jack was throwing his beans and some of the children didn't understand what it means to be throwing the beans...

It had been a while since she had done this assessment, and the context of the transcript was not actually a literacy lesson, but she is correct in her criticism that more of the larger context could have been honoured because the children showed knowledge about farming. Her remarks also show growth in her sense of what needs to happen in a classroom and a sense of having learnt something during her university journey. Then, when I commented that we had talked about her process to find her own efficacy when she started the course, she continued:

I didn't understand all the technical parts behind it, you know some of the language ...like you did all the teaching but you didn't categorise it as pedagogy, you know things like that. Putting all the technical names to it. As I got into the teaching degree I started to understand a lot more of those things ...

Then, to the interviewer's response implying that the terminology is "*part of being in the profession, speaking the language of the profession and so you learnt to speak the language of the profession?*"

"Yes, more so than before, sometimes things were said and you probably said 'o yea' at the time but you didn't always relate it back to everything you did. I learnt more of that as I went on."

SW16 showed a positive sense of her course having related well to her experience and to having valued the experience through her learning processes.

SW18 was in a different place in her studies and experiencing different processes altogether. As the interview unfolded it became clear that much of what was being

said related to process, to her awareness of her own processes in writing and dealing with her subject.

These were her comments about the assignment that was analysed:

I think for the first assignment I could really see with the shared reading how that was important but with the second assignment I didn't engage with it that much or understand the importance of it. I don't even remember what I got for it, ...

And then...

I wasn't too excited about doing the second assignment about teacher talk. I don't think I had done a prac. at that point as well so it was a bit abstract for me. But I liked comparing it with what was happening in the home with the mother and the different opportunities for learning.

She found it hard to envisage it and was “*just focusing on doing what they wanted*”.

When asked about understanding the different theories, she did not find them hard to understand but repeated the comment about her process, especially regarding her level of engagement: “*I was just...using what I had been taught in the course materials to get the right answer and get the right marks. I don't think I engaged with it enough.*” She then continued with insight into her own process: “*But I think if I had engaged with it more or role played it with other students it would have been better.*”

Her comments about role playing are supported by DeNeve and Heppner (1997, p. 244) in their article about the benefits of role play simulation compared with lectures. When asked why she thought it was like that, whether it taxed her imagination, she responded: “*Yes I could not really envisage it and was just focussed on it in that situation. I couldn't really apply it to anything else, I was just trying to get it right.*” However later, memories of her life with her parents evoked this response: “*My parents were always massive believers in learning through play and that is something that I have taken through my course as well and my philosophy of teaching so I engaged with that part of the assignment.*”

Then the question was asked, while she was writing the essay, if she had had occasion to excise any personal comments or attitudes or autobiographical references

to herself. She did not answer the question directly but gave insight into her writing process and how her life experience supported her learning.

Well I said before about the teachable moments with the mother, the daughter, and the aunt. I thought back on when I learnt with my mum, so I was writing from my experience, also with Mr Hammond I could identify with similar situations so was able to...go back and match it with the academic material.

In response to another question that also related directly to her process she said this:

...well if I write a whole essay then I go back to restructure sentences to be shorter, cleaner, more precise...uhm, to include references to back things up just like academic writing structure, linking paragraphs, linking sentences, that sort of thing...I will rattle off my ideas everything, answer the questions and then I will fit it into the way I think I will get the best marks.

This response from this SW is indicative of her degree of identity formation. It suggests that she is still motivated extrinsically (Bye et al., 2007), although she is a borderline traditional/non-traditional student. She identified as mature age but showed some characteristics of the traditional student in her attitude to referencing and to this assignment.

The above discussions about the interview responses indicate that the SWs did monitor their own processes and related them to their wishes for successful academic outcomes. They provide information as to the SWs' ability to monitor their processes and this can be added to the contents of their VUBs.

5.3.2.3. Monitoring clarity.

This descriptor (c.f. 3.2.2.3) would be unlikely to appear in an assignment like the one in this data. It would be unlikely for a SW to write reflectively about what they are not sure of, or about how they are trying to make their writing clearer. However, in interviews, five SWs described ways in which they monitored their clarity in seven different instances (Table 5.2). They were all asked if they monitor their clarity while they are writing, and their responses were as follows: SW1: *"Maybe not so much in the initial writing, that's when I have to get it all out but then when I go back I sometimes read it aloud and ask myself "does it make sense"?"*

SW3: *I often sit with what I need to look at and play it over in my head ... write notes and revisit, do a lot thinking about it and then perhaps a week or two before the assignment's due I will write and re-read and rewrite and think some more...I haven't got anyone I bounce it off apart from the tutors – maybe get some advice from them, but being an online student I work pretty much alone. For things like proof reading I go through an internal process...*

Interviewer: *Do you think those processes are important?*

SW3: *In terms of giving it to someone else to look at it... Yes.*

SW10: *Yea I do do that. I write and write and stop and say does this actually make sense? I do that with myself, I do that with my mum, I ask does that really make sense?*

SW16: *Many times, that is one of the things I struggle with myself, I tend to go round the mountain a bit. To be honest I have always had that problem, can't always get the point across the way I want to. I kind of know the way I want to get it across ... I seem to take longer to get around there ..., I waste a lot of words.*

Finally,

SW18: *Well I can tell by reading the way I had written it that I am sort of just writing as I go, as I went through it, and it was less structured as well as it could have been and I don't think it was as clear as it could have been, and I don't think I understood the concepts that clearly, so I don't think it was as clear as I would have wanted it to be...I just wanted to put it all out there and get it right. I tend to do that sometimes, as I am going through the document and then try and get it to fit.*

Her response to the earlier question about her process, when she spoke about re-writing and including references fitting her ideas into a way for the best marks, also suggests that she was concerned about clarity and about using academic discourse, but felt constrained by the need to write academically. It is possible that she had fallen prey to assessment-driven writing and was not motivated by achieving the best learning outcome which might be a result of her lack of engagement with the course, which in turn was due to a range of possible factors involving her extrinsic motivation and perhaps the way the course was presented.

5.3.2.4. *Monitoring accuracy.*

In this case, evidence of the SWs' concerns about accuracy was measured by whether they used references in their essays, c.f. 3.2.2.4 in this thesis. They all used reference material in their essays so this was not individually noted in NVivo but the SWs who were interviewed all contributed further depth to this descriptor (Table 5.2).

SW1: This related directly to referencing:

I always want to check that's what the references that go with it show, and I think I've got more and more that way, as I've got further into university, I ask myself is this what the sources tell you?

SW3: This was more about accuracy in her writing:

I make sure I am grammatically correct and not going off on a tangent. It is too easy to do that. I make sure I stay on track and focus on what is asked. I use the thesaurus, to vary the words and make sure I use the jargon in the correct context...

SW16: This SW was a teacher aide and provided this interesting insight into how she tested herself by modelling correctly what she was teaching. *"Sometimes I need to model and show the clarity of the correct way to them and sometimes your words don't have to be spoken quite as much because you have modelled them as you were doing it."*

Then she went on to talk about how she used referencing:

Just like when you read something in a different way it sounds a bit different. I don't believe that just reading it the one way is the right way sometimes, you must go back and research and read it a few different ways ...

This next extract demonstrates how she strived to be as accurate as she could be so that she could make a difference to the children she was going to teach.

So it was really important for me to really understand, because I was going to stand on my own in my own classroom...and that's when I did go and speak to my teachers and my principal when I wrote things just to clarify how I was understanding it and if they thought I was on the correct way.

For a completely different perspective on the issue, SW18 said:

Yes I know it is important to back up everything and that your ideas have to be supported by the academic literature. That is what really annoyed me about uni in general...uhm...I haven't got across the whole referencing thing. I understand that you have to back up what you are saying but sometimes I feel sort of like I am genuinely thinking of something and then I have to go and find something that backs up what I am thinking and that really frustrates me. Does that make sense?

She had a lot to say about this frustration and about her voice being denied later:

I just want to respond to something I feel that assignments are structured so that you just must reproduce the course to show that you have understood it but not give like a genuine response...I just wanted to get free. In this second assignment I just thought I had to produce what I was supposed to, like the scaffolding model and reference like Culican, Bull and Anstey. I knew I had to add those things in but sometimes I would just prefer to reflect.

Kandlbinder & Peseta (2009) wrote about “reflective practice” (citing Schön, 1983) being a key concept in teaching and learning in higher education. This was the first of their five key concepts. It seems that this interviewee had the right idea in wanting to be able to reflect but it would probably not have had much effect on her accuracy, which she had not perceived as an important issue. The issues of referencing, assessment-driven learning and surface, as opposed to deep, learning all arise from this SW’s statements and will be discussed in detail later in this analysis.

Table 5.2

Metacognition

SW	Goal specification	Monitoring process	Monitoring clarity	Monitoring accuracy
1	XX(E) X(I)	XXX(E) X(I)	X(I)	X(I)
2	X(E)			
3	XX(I)	XXXXXXXXXX(I)	X(I)	X(I)
4	X(E)			
5	X(E)			
6	X(E)	XX(E)		
7				
8	XX(E)			
9	X(E)			
10		X(I)	X(I)	X(I)
11				
12	X(E)	XXX(E)		
13	X(E)	XX(E)		
14	X(E)			
15	X(E)	XX(E)		
16	X(E) X(I)	XXXXX(I)	XX(I)	XXX(I)
17	X(E)	XXXX(E)		
18	X(I)	X(E) XXXX(I)	XX(I)	XX(I)

E – essay data; I = interview data. Green highlighting = ‘full house of skills’ and beige highlighting = other examples of the skills per SW. Multiple X = instances of the occurrence of that skill.

5.3.3. Knowledge utilization.

This is the next level down in the taxonomy and the following descriptors are literally about using their knowledge to enhance their achievement of a task (c.f. 3.2.3). All the evidence for this node was taken from the essays, therefore it is not distinguished in the tables. Only five SWs showed evidence of all the components of this skill but all the others except SWs 7 and 10 (her essay was not available) showed evidence of at least one of the sub-skills. This is an unexpected result in terms of the structure of the hierarchy and will need further research. In aggregate, as will be seen in the following text, at least half of the SWs showed evidence of each of the sub-skills.

5.3.3.1. *Decision-making*

This node was not used as often as might have been expected because the essay task was to distinguish between the most effective learning processes and environments depicted in the two transcripts. If the SWs had not used their own thinking to make the distinction and tended to quote or paraphrase extensively from other sources this node was not used.

Ten SWs were coded at this node in nineteen instances (Table 5.3). Just over half, where the SWs made choices and justified them in terms of their essay task. A good example is this statement by SW1:

In the essay it has been shown that Transcript One the home environment was, in this case, more successful, than Transcript Two-classroom environment, in using the explicit teaching techniques including SIC and Pedagogy of Literacy Learning.

She had clearly selected the process that showed the greater effectiveness, as did all of them but each in their own individual fashion.

SW2 focussed on the teacher talk and chose the most effective style for the children's learning.

The two examples of teacher talk that are evident in the transcripts are very different. The pedagogies adopted by Mrs Green and Mr Hammond vary in a number of ways and the literacy learning of the children in both contexts have also varied accordingly. While Mrs Green enabled Sarah to use her prior knowledge and new learning in real life situations Mr Hammond did not provide the necessary scaffolding or access the knowledge that his students already had to enable them to also access this learning.

SW4 used a table provided in the course materials to show how she supported her own preference and approval of the effectiveness of the scaffolding in T1. SW5 refers to the "industrial model of schooling" evidenced in T2 and compares it unfavourably with T1, where...

Literacy learning in this context is very much dictated by the natural environment which reflects the understanding that language is a meaning making tool that is made up of many interconnecting sub-systems, which need to be operating to ensure that meaning is maintained (Harris et al., 2006, p. 5).

SW6 compares the environments of the two transcripts and makes the point that the school setting is more complex and difficult for the adult to manage. Then SW8 firmly approves the “pedagogy of literacy learning style” as evidenced in T1: “The mother strongly verbalises the cognitive processes using the eggs to physically display the progresses step by step (T1, L22)”. SW11 also focusses on the pedagogical styles demonstrated in the two transcripts and prefers those shown in T1.

A different aspect is foregrounded in SW11’s essay where she identifies the Four Resources model used in the shared reading episode in T1 as well as the SIC. This is then contrasted with the following:

The students in the traditional teaching episode, documented in transcript 2 (who) participate in a teacher-led discussion, which follows the conversational pattern “initiate-respond-evaluate” (IRE). Therefore, unlike Sarah who is able to gain knowledge by exploring, asking questions and actively seeking answers, the students must answer questions initiated by their teacher.

SW15 provides detail to his objection to the teacher’s pedagogical style in T2: “Instead this comment is completely unused by the teacher and an opportunity to use a student’s ‘virtual school bag’ (Comber et al., 2001) to build on the classes (*sic*) socio-cultural understanding of farming through engagement with literacy is missed.” ...and makes the comparison with T1 where the adults are using the child’s socio cultural understanding. The SW responses provide a variety of information and insights which is to be expected but also suggests that they were not drilled in their responses and responded independently. The final example in this descriptor is SW18 who focusses on the “informal teachable moment” in T1 where “the lesson is unstructured and does not clearly follow a pedagogical structure” and contrasts this with a formal class setting. She continued:

Transcript 2 does invoke relevant questions that are highly relatable and important for primary socio cultural learning, however because there was not a clear linear strategy to follow in the lesson, the class resulted in misbehaviour and the only learning that came from the exercise was an informal discussion about comprehension of the text, with some relation to real life situations, initiated mainly by the students and at times blocked by the teacher.

5.3.3.2. *Problem-solving.*

The data was coded in this node when there was evidence of the SWs using their own thinking and supporting it with the theory they had learnt to identify obstacles and limiting conditions, and strategies for overcoming them. (c.f. 3.2.3.2) Text was coded at this node when recommendations were made to improve a situation caused by a problem in the learning and teaching processes depicted in the two transcripts. It was necessary for there to be some evidence of the SWs using their own thinking and logic in terms of their theoretical applications. It was not enough just to link the situation to a theory.

Eight sources and sixteen instances were coded at this node. (Table 5.3) Most SWs who were coded here focussed on the teacher in T2, which is not surprising as he was obviously not doing well, but they did introduce a variety of different suggestions for ways in which he could have done better and provided different reasons for their suggestions. SW1 recommended the use of the SIC: “In this way the students would have been able to engage more meaningfully with the text instead of resulting in a behaviour management issue.” SW6 made the same recommendation for improvement but suggested that in this way “the quality and quantity of ‘talk’ in the classroom will be optimised. The result; reduced learning difficulties and inequalities by creation of a positive, empowering and successful place for literacy learning”. SW13 also wanted to see more scaffolding and SW9 focussed on the “overuse of questioning”, observing that... “An important principle of the SIC is the use of statements, rather than questions to predict, locate and analyse meaning (Cullican, 2005).”

She continued and observed that positive feedback is important to help...

...shift the students’ motivation from learning that is provided by the teacher, to confidently using their own skills...An appropriate conclusion to the lesson in T2 would have seen the teacher summarise what was learnt by the class, with suitable feedback and encouragement, before moving on to the role-play activity.

SW11 pointed out that Mr Hammond did not use an opportunity where he could have incorporated “a child’s fund of knowledge that they bring to the classroom via

their virtual schoolbag, allowing them to make use of this knowledge for learning in the classroom (Thompson, 2003)". SW14 remarked on the potential usefulness of the elaborate move, the exploitation of the contents of the virtual school bag, and dealt with the teacher's overdoing of the issue of consequences about the child who needed to use the toilet. She suggested that if all the above had not been present, and if the children had been given more opportunities to use their imagination and initiative, the lesson would have run better.

SW15 introduced an additional perspective, in addition to covering much of what has been said above:

The teacher in T2 experiences reasoning trouble when he fails to use student responses as sources of information and when students have their contributions dismissed they are less likely to participate in the future (Campbell & Green, 2006). The teacher could benefit from keeping in mind that "every text-spoken, written or in any form is derived from a culture and from the social purposes and practices that give rise to the text" (Campbell & Green, 2006, p. 43).

5.3.3.3. Experimental inquiry - generate and test hypothesis.

(c.f. 3.2.3.3) Nine sources were coded in this node in sixteen instances. The key criterion used here was whether the SWs introduced their thinking with the subjunctives "could" or "might have", while other terms might have been used such as "if", "would have", and so on all suggesting possibility in currently "unreal" conditions. What they write does not relate to original data, as this was not a requirement for this essay, but there is nevertheless evidence of hypothetical thinking in the essays. SW1 suggests that Mr Hammond, the teacher in T2 "could have affirmed the children by mentioning Abbas and Gary's answers and relating how this refers to the text." She also suggested that the outcome of the lesson could have been improved if Mr Hammond had given specific instructions to the children. SW3 links her hypotheses directly to the SIC with specific wording for the three moves. Then SW4 shows a range of instances where the teacher could have engaged the children in "valuable explicit teaching dialogue", while SW6 suggests that the teacher could have taken the opportunity to use 'think-pair-share' dialogic pedagogy. He could

have prepared them by explaining his intention for the lesson and provided explicit modelling. There is the implication of a hypothesis in SW11's essay when she says:

By using this opportunity Mr Hammond would have demonstrated the importance of understanding and incorporating a child's fund of knowledge that they bring to the classroom via their virtual schoolbag, allowing them to make use of this knowledge for learning in the classroom.

SW14 echoed SW3's linkage to the SIC but focusses on the lack of the elaborate move. This neglect also means that the virtual school bag could not be used to make the learning "contextually relevant". SW15 also focussed on the lack of an elaborate move and the non-use of the virtual school bag. He also introduced the concept of Cambourne's Conditions of Learning as a possibility for improving the lesson as well as the possibility of allowing the children to discover that literacy is for real life. SW18 makes the point that if the triadic sequence between teacher and student had been abandoned and some student to student dialogue been introduced, then there could have been opportunities for "shared insights" and "valuable learning". SW17 suggested that Howard Gardner's seven multiple intelligences could have been implemented to include all the diverse learners in the class. She also recognised when one of the children in the class started to develop an hypothesis by using the words "I think..."

5.3.3.4. Investigation.

As defined in 3.2.3.4, only one essay showed no evidence of this skill. This essay SW7 had all the appearance of a draft and was simply a series of observations. She had not attempted to create a coherent discussion. All the other essays showed evidence of argument and the use of outside opinion in their references and therefore were coded at this node. This does not show in NVivo because the essays were not individually coded for this criterion, it did not seem necessary. It is however, visible in the Table of results.

Table 5.3

Knowledge Utilisation

SI	Decision-making	Problem-solving	Generate hypotheses	Investigation
1	XX(E)	XX(E)	XX(E)	X(E)
2	X(E)			X(E)
3			X(E)	X(E)
4	X(E)		X(E)	X(E)
5	XX(E)			X(E)
6	XX(E)	X(E)	XX(E)	X(E)
7				
8	X(E)			X(E)
9		XXX(E)		X(E)
10				
11	XXX(E)	XX(E)	X(E)	X(E)
12	XX(E)			X(E)
13				X(E)
14		X(E)	X(E)	X(E)
15	XXX(E)	XXXX(E)	XXXXXX(E)	X(E)
16		XX(E)		X(E)
17			XX(E)	X(E)
18	XX(E)	X(E)	X(E)	X(E)

E = essay data; I = interview data. Green highlight = 'full house' of skills and beige highlights = other examples per SW. Multiple X = numbers of instances of the occurrence of the skill per SW.

5.3.4. Analysis.

Lower down the taxonomy as was expected, most of the SWs showed evidence of the skills covered by this descriptor. (c.f. 3.2.4). Ten out of seventeen SWs showed evidence of all the aspects of this skill, only SW7 showed no evidence of this skill and SW10's essay was not available. Tables showing the breakdown of the components of some of the subskills have been created to demonstrate how they

were analysed and how some of the SWs qualified fully for that skill and some did not. Here too all the evidence is taken from the essays.

5.3.4.1. Matching.

The essay task required SWs to compare and contrast the two transcripts of pedagogical talk so it is to be expected that many of the essays would have examples of this category, which, as described in 3.2.4.1, requires the use of fine detail to make the comparison. It is not the sort of abstractness that metaphor requires though, which is dealt with later (5.2.7). Thirteen sources showed evidence of matching in forty-one instances. (Table 5.6) Some examples of this follow:

SW1 compares “learning literacy’s usefulness in real life and processes rather than just modelling what the teacher wants - ‘Pedagogy of School’ or based on performance of tasks - ‘Pedagogy of Literacy Lesson’.”

SW2 starts a paragraph with this statement: “In contrast to the clear scaffolding employed by Mrs Green, Mr Hammond offers only the veneer of a structured learning experience”, and goes on to explain what she meant.

SW3 compares “explicit teaching” according to Dr Christina Edwards-Groves and “implicit teaching”, which “for some children...may result in behavioural difficulties.”

SW4 compares teachers who continue to use “traditional methods in their classrooms” with those who “align their pedagogies to this more recent insight into such effective and explicit literacy teaching practices.”

SW6 compares the way the teacher in T2 starts the lesson in the approved “literacy learning style” and deteriorates (word supplied) into a pedagogy of “School Style”. She also compares the “talk” used in the classroom with the “talk” used in the home and makes the point that wherever it is used, it is a powerful means of extending and stimulating children’s thought.

SW9 says that “Learning is natural and easy if the learners are in control of what is to be learned, if they are interested in the task, and if they can understand its

relevance for them.” She says that this shown in T1 whereas T2 “is dominated by pedagogy of school, with the prevalent use of what is known as “guess what is in the teacher’s head”.” Placing the learners” in control of what is to be learnt” might be putting it a bit strongly but Gibson (2011) would approve of the sentiment. She co-constructed the semester’s curriculum and learning with the students in her college class and L3, in her interview (below), reported having had success with a similar process with her students. This SW’s approach is endorsed by other researchers who support learner-centred learning and teaching (e.g. Weimer, 2003, 2013). Yet few universities seem to practise anything like this.

SW11 introduces an interesting variation on the theme of the home being the best environment for the child’s learning. It is possible that “...language that children learn in the context of family and social interactions can either benefit a child in literacy learning or can disadvantage the child by placing them as outsiders in the literacy learning discourse (Campbell & Green, 2006)”.

Everything would depend on what the child learns in the home. A home where there is no conversation and where interaction consists of instructions and very simple language, is not going to provide a child with the tools for conversation appropriate for school, whereas the home environment where the parents talk to the children sensibly and expect intelligent responses is more likely to provide those tools (Heath, 1983).

SW12 compares the scaffolding interactions seen in T1 with the teacher’s “banking style” in T2 where “the teacher is the prime depositor of knowledge and the student’s opinions and prior knowledge are marginalised.”

SW13 states the obvious but that does not disqualify it from being coded at this node. The coding descriptor is one that requires detail and this SW has provided that in the descriptions of the formal and informal manners of interaction between home and school. It is lower down the hierarchy so there is less expectation of deep meaning.

A key difference in the school and home environment is the student/ teacher and child/parent relationships and their styles of communication. The

student/ teacher relationship is presented in a formal manner, whereas the child/ parent relationship is informal meaning the learning environments and techniques used are different.

SW14 ranged far and wide in her comparison between home and school, covering facilities, diversity among the children, as well as formal as opposed to informal atmospheres and behaviour. She concluded by suggesting that schools could adopt some of the qualities of the home to promote literacy learning.

As seen in the home environment, in T1, submersion in teaching allows the child to explore and engage at a higher level. This would be beneficial in the school environment and lead to explicit teaching that is contextually relevant. Children need to be given opportunities to explore, imagine, experiment and engage at a deeper level than verbal discussions.

SW15 covers much of the same ground as the SWs already mentioned, except that he makes the point that the mother in T1 also used something of the pedagogy of lesson style when she asked the child a direct question. However, this is mitigated by being used “as a foundation to lead into the use of the pedagogy of literacy learning style in L32: ‘Yes but how many would there have been if none got broken?’”

SW17 compares the ways in which the adults managed the children’s potential and actual misbehaviour.

In Transcript One Mrs Green is very positive after Sarah comes close to performing a task incorrectly; she is very reassuring towards Sarah and does not create a negative Situation. In contrast to this, Transcript Two explains that Mr Hammond is very stern after the students were not following rules and instructions, ...

SW18’s direct comparison towards the end of her essay neatly sums up aspects of the content of this node.

Comparatively, there is a strong difference between the pedagogies followed in Transcripts 1 and 2. Transcript 1 follows an informal teachable moment that a Mother and Aunt take advantage of in a home learning situation, resulting in a successfully scaffolded lesson, reinforcing knowledge relatable to authentic real-life experiences. Transcript 2 follows a formal class setting, where a teacher is conducting a literacy lesson, the lesson is unstructured, and does not clearly follow a pedagogical structure.

5.3.4.2. Classification.

As predicted in 3.2.4.2 this category did not apply in any of the essays as the action would have been inappropriate to the task.

5.3.4.3 Error analysis.

Part of the instruction for the essay was to select the better example of literacy learning between the two transcripts; therefore, it was likely that the less effective setting would come in for criticism, as it did, and suggestions were made as to how the mistakes could have been avoided. Some of the key terms to be expected here are 'identify problems, issues or misunderstandings' and the actions likely to be taken are 'assess, critique, diagnose, evaluate, edit and revise' (Marzano & Kendall, 2008, p. 72). (c.f. 3.2.4.3)

Thirteen of the sources in thirty-seven instances showed this skill. (Table 5.6)

SW1 identifies a problem in Mr Hammond's class;

Mr Hammond fails to relate explicitly to the theme topic, which is farm animals and growing one's food. This would have given the students the chance to relate the topic to real life events, which they already had knowledge of, as illustrated by their statements in T2 ll 30-31.

SW2 diagnoses the reason for the lesson in T2 becoming confused; she points out that "the full value of each child's virtual school bag is not being explored" so the children call out their answers. "He is not effectively assisting the students to make connections between their existing knowledge and the acquisition of new knowledge." His questioning style requires the children to "guess the pre-determined answer that is in Mr Hammond's head during his questioning throughout the lesson." This issue comes up again in SW6's and SW18's essays.

SW3 critiques the teacher's management of the child asking to use the toilet. "He reprimanded the child unnecessarily and used the event to digress from the lesson to give an unnecessary lesson on school rules". Her experience in managing small children shows here:

The teacher could have said, "That's fine Gary, please remember we walk to the toilet block. We will begin our role-play' when you return". This would

have placed trust in Gary, respected his need to use the bathroom and given Gary the opportunity to take responsibility for himself and his learning.

SW4 evaluates the use of the 'pedagogy of school' and sets it against the pedagogy of literacy learning later in her essay. "Along with not engaging his class in literacy learning (rather pedagogy of school), the dialogue of Transcript 2 also lacks the depth and cyclical nature necessary for effectively applying SIC."

SW6 shows how the teacher starts with the initial moves of the SIC and identifies why the children become confused:

...the discourse lapses into the IRF model. This is most evident in L25-36 in which students are completely unprepared and have to 'guess what is in Mr Hammond's head'. The students who provide incorrect answers are dismissed and there is a general sense of confusion and loss of purpose or "epistemological trouble" (Freebody, Ludwig, & Gunn, 1995, p. 88).

SW8 evaluates the lesson as having failed because there was "limited modelling, coaching and apprenticeship; nor was there clear direction." She says further that the teacher's lack of elaborating "has a negative impact upon student's learning as, although they are identifying the correct answers, they are not actually learning anything."

SW9 also identifies some of the problems in the lesson: the lack of elaboration, lack of structure, overuse of questioning to achieve the correct answer, under-use of statements and too little scaffolding.

T2 shows little use of some of the dimensions of explicit teaching. The interaction lacks structure and guidance with the absence of the step-by-step learning instructions. There are missed opportunities for the teacher to scaffold learning and relate the subject back to the students' prior knowledge (T2:L42-46).

SW11 diagnoses the teacher's troubles in terms of the barriers that can emerge "when the needs of the children are not met and...student learning becomes difficult when the 'teacher controls the learning'" ... "Mr Hammond runs into organisational trouble when the responses of some students may be appropriate...but which [he] has 'put aside' or 'on hold'."

SW12 identified the teacher's pedagogy as an "anachronism...a one size fits all approach where students are required to learn in the same way and achieve the same results, irrespective of diversity."

SW14 shares the perception that the teacher uses the pedagogy of school and therefore also does not engage sufficiently in explicit teaching. Similarly, SW15 focusses on missed opportunities to elaborate because of using too much of the pedagogy of school.

SW16 identifies the issue of the children not having the opportunity to discuss the questions which also contributed to them losing touch with the progress of the lesson.

Finally, SW18 shows how misunderstandings arise in the classroom through the teacher's intentions not being made explicit and how they lead to the children having to guess what is in the teacher's head so the teacher found it difficult to "progress" the lesson. She continues to show how the lack of scaffolding causes the children to ...

...become unfocussed causing behaviour management issues.

...The...Scaffolding Interactional Cycle ends when the responsibility is released to the students without a clear directive. Because of the lack of structure, the students act out and become rowdy, resulting in Mr. Hammond having to angrily manage the classroom.

5.3.4.4. Generalising.

If the descriptors provided in Marzano and Kendall (2008, p. 80) (c.f. also 3.2.4.4) are applied strictly according to the task to which the SWs were responding in their essays, which required them to draw conclusions, they would have generalised. They would also have made inferences from the transcripts related to the theory they had learnt. In some cases, they also would have traced the development of literacy learning or failure to learn, and they would have stated conclusions according to their observations. In all the above instances the SW's action would have had to be relevant to the context of the task requirement and included references to the data in the transcripts. Therefore, it is reasonable to conclude that all the SWs should have

demonstrated the ability to generalise and indeed all except SW7 did so. SW10's essay does not appear here. The extracts that follow are exemplary of the sort of text that occurred in the essays. The summary (Table 5.6) at the end of this section provides a complete picture of the extent of the occurrence of this descriptor and which strategies were used.

SW1 concluded that the adults in T1 were preparing the child for the school environment: "There is evidence in T1 114 (O'Neil, 2011) that Sarah can count, ..., and she is being prepared by both her mother and Aunty Jane to be ready for the classroom environment. Sarah's mother uses the real life setting of counting eggs to have a focused learning session." Later, she infers that the mother in T1 is sensitive and skilled:

...when Sarah is not sure how to do something she becomes distracted and begins to play with the celery. Then her mum corrects this situation, "let's count...them out" In this way Sarah's mum realises Sarah is struggling and scaffolds the learning so that Sarah eventually understands and is able to continue on her own.

SW2, traces the development of the learning between the child and the mother and concludes:

In the same way that Mrs Green's pedagogy is informed by her knowledge of Sarah's funds of knowledge, Sarah's responses are shaped by her previous experiences. Shopping, putting away the groceries and setting the table for dinner are all experiences that they have clearly shared before. ...Sarah is eager to help her mother and obviously enjoys having a teacher who knows what she can do and builds on what she cannot do ... to assist her to perform more tasks independently in the future and accept greater responsibility.

In the conclusion of her essay she neatly summed up and generalised the differences between the two examples of teacher talk.

While Mrs Green enabled Sarah to use her prior knowledge and new learning in real life situations, Mr Hammond did not provide the necessary scaffolding or access the knowledge that his students already had to enable them to also access this learning.

SW3 similarly shows awareness of the development of the learning process between the adults and the child; "Sarah's mother and aunty thoughtfully construct

experiences through everyday activities, placing Sarah at the centre, so that literacy learning occurs within a meaningful context.”

She further focusses on the incident where the child starts to lose interest but infers a different and more elaborate reason than did SW1.

Sarah receives difficult information. Her mother asks if there are enough eggs to make volovants. Sarah has no field knowledge to build from and essentially the question is abstract. L10, Sarah’s behaviour suggests she is feeling overwhelmed. Fortunately her mother recognizes the problem and redirects Sarah by giving her an achievable task to build her confidence.

The SW then elaborates on the process and concludes that because the mother is using the SIC and explicit teaching, which she aligns with Vygotsky’s ZPD, that the child could experience success in solving the problem her mother had set her.

SW4 infers that the shared reading episode between the adult and the child in T1 aligns closely with a range of strategies recommended for the acquisition of reading skills. She lists the strategies and links them to what happens in T1. She also concludes that the conversation between the mother and the child reflects the practice of the SIC and analyses the text in terms of a table.

SW12 refers to the same incident and makes a similar inference but sees it as an “integrated approach” and cites Fellowes and Oakley (2010) who argue that “when parents involve their children in shared experiences and interactions, they begin “a child’s journey towards competency in oral communication” (p. 55).” SW12 thus infers that the shared reading also supports the development of oral competence.

The concept of the teacher being the source of all knowledge in the classroom is inferred by SW5 when he says that the teacher denied the children an opportunity “to use cognitive skills” when he did all the explaining and clarifying. He further referred to Freire’s concept of teaching as “banking” and concluded that that is what the teacher was doing, depositing knowledge into the children’s minds. SW12 makes the same inference but elaborates and links the practice to the pedagogy of school. She cites Freire (1998, p. 32) when she says that children must “immunize themselves against the system”. She justifies this because “it dampens their curiosity and removes the creativity from the learning environment.”

The inference in SW6's essay is that explicit teaching guarantees a successful outcome:

This process is evident in T1, when Mum is able to explicitly model the process of matching one egg to a name, progressively through the family (T1, L21). Sarah begins to model the same process (L25), and is then (L27) able to complete the task independently.

SW8 generalises around the adults and their questions being the link between the transcripts: "Both transcripts rely greatly on student's comprehension skills and prior knowledge to actively engage in the lesson."

SW9 traces the development of an explicit teaching episode: "T1 is a great example of this, as the learning is broken down into step-by-step instructions, beginning with allocating eggs to the number of guests (T1:L14), ..."

She shows that the teaching results in learning.

SW11 generalises about effective pedagogy requiring "a complete understanding of pedagogical literacy practices and [an understanding of] the effect on the child, and [the teacher needing to] engage in explicit teaching, demonstration and modelling (Bull & Anstey, 2005)."

SW14 successfully demonstrated that she traced the development of the child being able to perform household tasks that involved simple arithmetic and responses to clear instructions, all according to the SIC theory she had learnt. She mentioned that the mother had elaborated, thus providing "links to a higher order thinking and metacognitive strategies", and this observation mitigates the otherwise complete silence regarding the relevance of the process to literacy learning. She also tested the generalisation that Pedagogy of Literacy learning, as seen in T1, is a good strategy by comparing the teacher in T2's management and finding it wanting. "The children have been given minimal opportunities to use their imagination and initiative to engage in learning activities and tasks."

SW15 infers that the teacher's use of the pedagogy of school style did not benefit the children in his class. "If the teacher in T2 adopts the pedagogy of literacy learning

style of teaching then the student's literacy development will benefit much more than it will with his current style of teaching.”

SW16 inferred that meaningful conversations “encourage development of cognitive process by which Sarah arrives at her answers through guidance.” She also traced the development of the incident of the child who needed to go to the toilet and inferred, with prescience, that the child seemed to want to escape from the learning environment. “Mr Hammond has made it difficult for the class to be fully engaged, and it appeared that the learning context was not providing connections between home and school.”

That explicit teaching is a good thing is clearly inferred by SW17 when she describes the way the mother supported the child through her calculation regarding the counting of the eggs. However, she only describes the events from then on.

SW18, on the other hand, evaluates as she goes and links to the issue of literacy learning. She infers a “teachable moment” in the egg-counting episode, which is clearly a good thing “and as the problem is solved, conversation between Sarah and Mum flows naturally and comfortably.” She generalises from Piaget's theory of stages of development that the child is in the concrete operational stage of development and discusses how the mother utilises that to help the child solve the problem. She further draws the conclusion that when learning is related to real life the child can draw knowledge from her *virtual school bag*.

The Marzano descriptors for this node allow generous latitude for the coding as most SWs made inferences that the appropriate application of the SIC, explicit teaching, and the pedagogy of literacy learning, effectively advanced literacy learning in some way. Additionally the lack of the elaborate move in the SIC and the use of the pedagogy of school mitigated against effective literacy learning. This also allowed many SWs to be coded in the tracing of a development of a process especially where they mentioned the result of the process. A few could be coded for creating a generalisation but, where the SW had only observed without relating their observation to the purpose of their analysis, their text was not coded.

Table 5.4

Generalisation

	SW Inference	Conclusion	Trace development	Create a generalisation
1	X, X, X	X	X	
2		X, X	X	X
3	X	X, X, X	X, X, X	X
4	X	X		
5	X	X		
6	X, X			
7				
8	X	X	X, X, X,	X
9			X,	X, X
11	X		X	X
12	X, X		X, X	
13				X
14			X	
15	X		X	X
16	X	X, X,	X	X
17	X			
18	X	X, X, X		X, X

E = essay data; I= interview data. Green highlight = ‘full house’ of skills and beige highlights = other examples per SW. Multiple X = numbers of instances of the occurrence of the skill per SW.

5.3.4.5. Specifying.

“This skill involves making and defending predictions about what might happen or what will necessarily happen in each situation” (Marzano & Kendall, 2008, p. 87). It does not apply to details because “details are inherently too specific to involve rules from which predictions can be made...it is a natural type of thinking relative to organising ideas, which, are rule based” (Marzano, 2001, p. 81). Typical phrases that might be used include:

- Make and defend

- Predict
- Judge
- Deduce
- What would have to happen
- Develop an argument for
- Under what conditions (Marzano & Kendall, 2008, p. 87).

On the face of it, it seems very similar to Experimenting or Hypothesis, however it deals more in certainties whereas the Experimenting/Hypothesising is more tentative and therefore arguably more aligned with the requirements of academic discourse. It is more about making generalisations based on information provided to them and this is the aspect that was most used in this analysis. Fifteen sources were identified in forty five instances. Table 5.5 shows how the components of this skill are distributed across the sample.

SW1's criticism of the teacher in T2 predicted that as he did not "cue into" the children's existing knowledge, they tended not to engage with his lesson. SW2 predicts that when the elaborate move of the SIC is properly used, "student discussions are raised to a level that students would not have been able to produce independently (Culican, 2007, p. 5)". She predicts that the child in T1 will "perform more tasks independently in the future and accept greater responsibility" because her mother "knows what she can do and builds on what she cannot do". All the above is because the mother, possibly unwittingly, is using the moves of the SIC and providing an explicit learning experience for her child. SW3 also judged that explicit teaching is a valuable process. "Through explicit teaching, Sarah worked out the number of people coming for dinner and how many places needed to be set at the table. Sarah's mother provided modelling and scaffolding for her daughter's learning, resulting in Sarah experiencing success."

In terms of T2, SI3 predicts the possibility of the children becoming outsiders lacking engagement and becoming confused because of his implicit teaching style. SW4 judges that the pedagogy of school and of literacy lessons are...

...detrimental for students who have difficulty understanding instructions or do not fit this particular teaching framework (O'Neill & Geoghegan, 2012). Neither approach provides students with opportunities to develop valuable literacy skills necessary for relevant complex decision-making (Bull & Anstey, 1996; McNaughton, 2011).

On the other hand, she approves of the pedagogy of literacy learning because it links learning to real life and predicts that it effectively engages “students in learning experiences that offer careful explanation and in-depth understanding of the skills being taught and the relevant cognitive processes involved for achieving desirable outcomes” (O'Neill & Geoghegan, 2012).

In describing the process of the SIC, SW5 builds up an argument to show that “By utilizing this method, teachers can use students’ prior knowledge and experiences as tools to help explore meanings, establish inferences as well as a sense of metalinguistic awareness of text (Culican, 2005).” Furthermore, based on the content of T1, and his reading of Seely Flint et al. (2014), he deduces that “children are able to learn language as they participate in family and community interactions.” SW5 also shows that under the conditions of the use of elements of the Four Resources Model, “the aunt has implemented a form of explicit teaching by clearly outlining how Sarah can participate in this shared reading.”

SW6 judges that the Pedagogy of Literacy Learning brings about more complicated questions and develops an argument that suggests that the real-life activity demonstrated in T1 also shows the application of Vygotskian constructivist theory. She further predicts successful outcomes if the SIC is used, and if explicit teaching goes with it to “bridge the gap between present and intended understanding (Archer & Hughes 2011).” She also argued that, in the absence of conditions in which the practice of the SIC and explicit teaching occur, the lesson will result in “pedagogical trouble.”

SW8 predicts that in the presence of explicit teaching, children will learn “the processes and approaches essential to learning language and literacy skills.” She also judges that the teacher in T2 “fails due to insufficient modelling.” However, she judges the mother in T1 to be successful because of her use of modelling. She develops an argument in favour of the SIC, in common with other SWs. SW9

predicts success in the presence of learner control and an understanding of relevance and an authentic task. However, overuse of questions predicated the event of interactive problems, and she recommends the use of statements as is required in the practise of the SIC, instead of questions. She develops an argument in favour of explicit teaching and, as have other SWs, using the egg counting episode as exemplary of this. In addition, following Sigelman and Rider (2009), she deduces that the mother in T1 took the opportunities she was given “to introduce and explore new concepts.”

SW11 predicts positive outcomes for learning in T1 because “Sarah’s mother and aunt Jane’s interactions support and focus the learning on the usefulness of Sarah’s literacy skills and cognitive links to the conversation and processes in real life situations.” Conversely, in T2 she predicts negative outcomes because of...

...the ineffective pedagogy of school (T2, L26, 29,30,46,60 and 67) where the students have to “guess what’s in the teacher’s head”, whereby disadvantaging students that may not have prior knowledge of the story or have a culturally different background where the story may not be familiar.

She too develops an argument around the SIC being an effective process and then proceeds directly to her judgement of the less effective practice of the teacher in the classroom.

SW12 deduces that the home environment provides an...

...emergent literacy environment in which informal learning of literacy takes place (Seely Flint, Kitson, Low & Shaw, 2014). As Sarah participates in the authentic learning experience, she begins to understand the purpose of literacy and the way it is used to accomplish tasks.

SW12 predicts success in the presence of the Pedagogy of Literacy learning because “students develop an understanding of the utility of skills involved within literacy, thus acquiring an appropriate foundational understanding of literacy practices (Bull & Anstey, 1996).” She is not alone in building an argument that suggests that, as literacy practices are constructed socially and culturally, the “home context presents an emergent literacy environment in which informal learning of literacy takes place (Seely Flint, Kitson, Low & Shaw, 2014)”. Her prediction is also that if the SIC is implemented, it enables “students to respond successfully and appropriately.

Therefore, rather than rejecting a student's inadequately prepared response, the SIC allows teachers to evaluate it and provide affirming feedback." In a comprehensive description of the shared reading episode, this SW describes the conditions required for a successful literacy learning episode: "This technique provides Sarah with the appropriate support, assisting her in developing skills and strategies for independent reading."

SW14 predicted that if the teacher in T2 had given his elaboration opportunities more thought, "he would have been able to incorporate the children's prior knowledge and allow them to bring their virtual schoolbags into the class room making learning contextually relevant..." She also shows the conditions under which learning happens with the child in the home. She mentions scaffolding and elaboration, suggesting that although the interchange is unplanned, aspects of the SIC happen anyway and the mother also builds on the child's existing knowledge.

SW15 judged T1 to be a more "educationally beneficial socio-cultural environment and pedagogies in developing literacy skills when compared to transcript two." He predicts a successful learning experience for the child in T1 because the mother encourages the child to "participate in elaboration by prompting her to come up with several possibilities for the use of the eggs." He criticises the teacher when he develops an argument for the importance of using the children's different "funds of knowledge" and notes that the teacher fails to do this, whereas the adults in T1 do it very well.

In common with most of the other SWs, SW16 judged the teacher to have failed to have created an effective learning environment. Her point was that the children failed to connect with each other and with the curriculum as well as with the lesson. On the other hand, the adults in T1 are judged to have used scaffolding and explicit teaching, thus "guiding the child through the learning process, and [being] given [an] opportunity to problem solve, using addition and subtraction with a real purpose." She predicted greater success for the teacher in T2 if he had used oral language more effectively and prepared the children for the lesson.

SW17 deduces, (in my opinion) incorrectly, that:

Despite the differences between the two Transcripts both have a similar teaching and learning style and both allow students/children to work to achieve either a correct answer to the questions being asked or allow the student/child to successfully perform a task asked of them.

SW18 develops an argument for the home being an environment where learning can take place, and even after a potentially negative situation, conversation can flow “naturally and comfortably”. She deduces that the teacher “struggles to progress the learning” because of his lack of explicit instructions and use of closed questions.

Table 5.5

Specifying

SW	Predict	Judge	Deduce	Conditions	Develop argument
1	X, X				
2	X	X			
3	X, X				
4		X	X		
5			X, X	X	X
6	X	X		X	X
7					
8	X	X, X			X
9	X, X		X		X
10					
11	X	X			X
12	X			X	X
13					
14	X	X		X	
15	X	X			X
16	X	X, X			
17			X		
18	X		X		X, X

Beige highlight is the instances of this skill per SW.

Table 5.6

Analysis

SW	Matching	Error analysis	Generalising	Specifying
1	X	XX	XXXXXX	XX
2	X	XXX	XXX	XX
3	X	XX	XXXXXXXXXX	XX
4	XXXX	XXXX	XX	XX
5			XX	XXXX
6	XXX	XX	XX	XXXX
7				
8		XX	XXXXXX	XXXX
9	XXX	XXX	XXX	XXXX
10				
11	XX	XXX	XXX	XXX
12	XXXX	XX	XXXX	XXX
13	XXXX		X	
14	XXXXX	XX	X	XXX
15	XXX	XXXXX	XXXX	XXX
16		X	XXXXX	XXX
17	XXXX		X	X
18	XXXXXX	XXXXXX	XXXXXX	XXXX

Green highlight = ‘full house’ of skills and beige highlights = other examples per SW. Multiple X = numbers of instances of the occurrence of the skill per SW.

5.3.5. Comprehension.

The evidence for the two aspects of this skill will consist of text that shows that SWs are “able to identify the critical or essential information as opposed to the non-critical or non-essential information” (Marzano & Kendall, 2008, p. 43). All the SW essays showed evidence of synthesis but only SW3 showed any evidence of ever having used a graphic organiser, showing evidence of symbolising.

5.3.5.1. *Synthesis or integrating.*

“Integrating involves identifying and articulating the critical or essential elements of knowledge” (Marzano & Kendall, 2008), and using those elements to support their statements using logic and organisational skills. Text was coded at this node when the writers provided detailed support in the form of references for their statements and/or accurately paraphrased or summarised their references. However, the activity is essentially recount rather than analytical. (c.f. 3.2.5.1) The Marzano descriptors only involve using the information provided, descriptively rather than analytically.

Seventeen sources provided fifty-six instances and counting, of the use of this skill. (Table 5.7) Every essay, even the one where SW7 seemed to have handed in an unfinished draft, showed evidence of this skill. They all used referencing; many used the references provided in the course materials and many also went beyond that. The dot points are the criteria listed in Marzano and Kendall (2008) and what follows is a summary of the typical contents of the essays according to how they evidenced the criteria.

- Describe How or Why:

They showed why the teacher in T2’s lesson was derailed by his lack of explicit teaching

To engage these children in learning Mr Hammond needed to use specific instructions but failed to do so a number of times. The children begin to argue in T2 ll 27-28 “Abbas: No –...feed Daisy” and “Kate: That’s not right...”. This was due to this lack of focus and use of Pedagogy of school-with the children trying to guess the answer. (SW1)

They also showed how the SIC could be performed – SW3 summed it up thus:

Prepare- ‘Now let’s start again.’ *Identify*- ‘What were we trying to do?’ This question engages Sarah’s higher order cognitive skills.. **L13**, Sarah identifies the task. **L14**, *Affirm*, **S2**, *Prepare* and *Identify* **S3**, *Elaborate*. The sequenced moves from the SIC are in place. **L15**, *Identify*, Sarah works out the correct answer. **L16**, **S1**, *Affirm and Identify*, **L17**, Sarah is still experiencing success. **L18**, *Elaborate*, This question has been asked too soon, **L19**, Sarah’s overwhelmed. **L20**, Mum minimizes distraction. **L21**,

Prepare- now, Identify-let's count them. L22, Elaborate, Mum gives Sarah the information she needs to successfully work out the problem, the information is explicit.

- Describe the key parts –

The SWs' references to the SIC and Explicit teaching were exemplary of this. SW9 explained it like this:

The eight dimensions of explicit teaching, according to Campbell and Green (2006) are as follows: Prior knowledge; Time; Discovery; Scaffolding; Modelling; Coaching; Apprenticeship; and Encouragement. Explicit teaching centres around helping students learn how to learn. The instructor scaffolds learning by using step-by-step instructions to ensure the students master the content presented before new material is introduced (Ashman & Elkins, 2012).

- Describe the effects –

The most common example of this was the teacher in T2's inability to keep the children focussed on what he wanted because he was not explicit and did not make good use of the SIC.

- Describe the relationship –

In this case the SWs tended to describe the relationship between the SIC and explicit teaching, and they also included scaffolding as part of the SIC process and Vygotsky's ZPD. All the preceding was included in their use of the Pedagogy of Literacy Learning.

SW8: This effective use of the scaffolding interactional cycle is frequently employed throughout transcript one's one-on-one interaction. The mother is diligent in the use of scaffolding within her lesson and follows the structure quite closely with occasional lapses. She often starts the conversation with a statement preparing the daughter before asking a question (T1, L7).

SW12: Bull and Anstey promote a similar pedagogy to the SIC. Through an analysis of teacher talk, Bull and Anstey (1996) identify three pedagogies that are commonly employed in the classroom: pedagogy of school, where students have to "guess what is in the teacher's head", when answering questions (p. 90). Pedagogy of literacy lessons, where emphasis is placed on "doing" the task, rather than developing deep understanding or exploring the

purpose for doing it and the pedagogy of literacy learning where students develop skills and learn about the purpose and usefulness of literacy.

- Explain ways in which...

The SWs tended mainly to explain ways in which the lesson in T2 became disorderly or the ways in which the child in T1 worked out how many eggs were needed for the family dinner. SW2 suggests that it is because the teaching follows the “industrial model” of schooling that “the children in the class are calling out and speaking over the top of each other in an effort to be the first with the correct answer.”

SW9 explains ways in which concrete objects were used in a learning episode:

Helping the learner develop a range of skills related to real-life literacy practises, is common of the pedagogy of literacy learning (Bull & Anstey, 2003). This is demonstrated in T1 when the focus is on counting and allocating concrete objects (eggs in a carton) (T1:L14).

- Make connections between ... –

Is like “describing the relationship between...”, in this case the connection between the use of the “virtual school bag” and children being enabled to access the curriculum is the example used. SW5 comments on the successful learning episode in T1:

Mrs Green is able to utilize Sarah’s prior knowledge, or what Thompson (2002) referred to as her ‘Virtual school bag’. This is said to contain things such as knowledge and skills that children have acquired from interacting with their friends, at home as well as the environment around them (Seely Flint et al., 2014).

- Paraphrase –

All the essays make extensive use of paraphrasing. The difficulty is to recognise actual paraphrasing as opposed to quotes that are not acknowledged as such!

However what follows is an actual paraphrase:

Campbell and Green (2006) highlight the importance of understanding the home-school connection for each of their students and using this knowledge to scaffold the children’s learning to ensure their success. The most effective

teaching is that which assists learners to make connections between existing knowledge and the acquisition of new knowledge (Campbell & Green, 2006).

- Summarising –

SW2 provides an accurate summary of the passage in the reference cited. “All students carry a virtual school bag which is full of practices, resources, skills, knowledge, values and assumptions about learning, teaching and life that they have already learned (Seely Flint, Kitson, Lowe, & Shaw, 2014, pp. 71-72)”.

5.3.5.2. *Symbolising.*

For insight into this skill c.f. 3.2.5.2. When asked about the use of a graphic organiser only SW3 responded that she had used one but that was only in her first year. “In my first year I used it – now I tend to scribble rough notes all over the place as I go along.” SW1, SW5, SW16 and SW18 were not asked about the graphic organiser, which is an omission on the part of the interviewer, *mea culpa*. SW10’s interview reflects the graphic organiser discussion as follows:

Interviewer: *When you are writing an assignment have you ever thought of using a graphic organiser of some sort, like the fishbone that was in the tutorials?*

SW10: *A graphic organiser?*

Interviewer: *You get lots of information – how do you sort it out?*

SW10: *Usually write down like the introduction and then dot points in each section of the essay... the usual basic structure.*

Interviewer: *Just like that – you don’t make like a picture, any kind of a graphic image?*

SW10: *Just the usual way.*

Intuition and experience suggest that most SWs would respond in a similar fashion. Mind-mapping, concept-mapping and such graphic organisers are not common in academic support units and even where the issue is raised specifically, as it was in the course, the idea has not gained traction. In another research exercise it might be valuable to explore this issue because it relates to later analysis in this thesis concerning the use of metaphor and the argument that learning to think symbolically

and metaphorically is an important HOTS. In this case the fact that the interviewees were not all asked the question about graphic organisers and the essay did not provide an opportunity to show this skill it is not possible to compare the results across the individual SWs. However, the value of the use of graphic organisers in promoting critical thinking, is uncontroversial. (Van Gelder, 2005, 2015). In addition (Davies, 2013) argues persuasively for teaching critical thinking using argument mapping. In his paper he mentions that research has shown that there is a lack of critical thinking skills in many students in HEIs and that it is a highly prized graduate attribute by both universities and employers. All of this is said because it seems from this research that the use of graphic organisers is not common among undergraduate students and the two academics quoted above both have wide experience in teaching critical thinking using argument mapping as a graphic organiser. It is not the only possible graphic organiser (Buzan, 1993) describes how to develop a mind map that develops ‘radiant thinking’ and helps organise ideas. (Lopez, Ponce, & Quezada, 2010) contend that the use of graphic organisers “significantly improved the involved cognitive skills and the assessed disciplinary content.” While symbolisation occurs low down in the Marzano and Kendall hierarchy when it is related to the practice of critical thinking it assumes greater importance and is something that course developers could build into their courses in the early stages.

Table 5.7

Comprehension

SW	Synthesis	Symbolising
1	XXXXX	
2	XXX	
3	XXXXXXXXX	X(I)
4	XXXX	
5	XXXX	
6	XXXX	
7	XX	
8	XX	
9	XXXXXXXX	
10		
11	XXXX	
12	XXXXXXXXX	
13	XX	
14	X	
15	X	
16	X	
17	XX	
18	XXXX	

I = Interview data. Beige highlighting = instances of evidence of this skill and multiple X = the number of instances per SW.

5.3.6. Retrieval.

This is the first level of the taxonomy. (c.f. 3.2.6) It is mentioned there that this skill involves three actions: recognising, recalling and executing. The only source of evidence here was the essays and only recalling could be evidenced.

5.3.6.1. *Recognising.*

As already stated this involves using lists and verifying statements. They were not required to do either of those things.

5.3.6.2. *Recalling.*

Indicators of this skill include the following activities:

- Exemplify
- Name
- List
- Label
- State
- Describe
- Who
- What
- Where
- When

All seventeen written sources produced seventy-one instances of this basic skill; a few examples follow:

SW1 describes what a teacher does when using explicit teaching: “The teacher carefully explains what is required then models how it is to be done.”

SW2 provided a list of the three styles of literacy instruction that they had studied:

Bull and Anstey (1996) identified three styles of literacy instruction through the examination of the structure of lessons, teacher talk, classroom interaction and materials used. The three identified styles are pedagogy of school, pedagogy of literacy lessons and pedagogy of literacy learning.

And SW4 provides examples of the different forms of literacy that people encounter daily:

However, the range of different literacy experiences one is exposed to on a daily basis extends much further than this basic understanding, including those of visual expression (e.g. viewing and drawing), critical thinking, technological communication (e.g. mobile phones, computers, internet), popular culture (e.g. movies, theatre, art), functional texts (e.g. road maps, timetables), ecological literacy (e.g. especially for Indigenous peoples), and literacies other than English (Queensland Studies Authority, 2011).

5.3.6.3. *Executing.*

As mentioned in 3.2.6, this skill does not apply to a written task like this one.

Table 5.8

Retrieval

SW	Recalling
1	X
2	XXXX
3	X
4	X
5	XXXXX
6	XX
7	XXXX
8	XXXXXXXXX
9	X
10	
11	X
12	XXXX
13	XXXXXX
14	XXXXXXXXXXXX
15	XXXXXX
16	XXXX
17	XXXXXXXXXX
18	XXXX

The table represents the number of times each student showed evidence of this skill.

5.3.7. Metaphors also grammatical metaphors which connect with academic discourse.

It was decided to place this section here with the Higher Order Thinking Skills (HOTS) because although initially it seemed to fit better with the Academic writing skills it is more to do with HOTS, as explained in (3.8). It does not fit well with the more grammatical constructs and seems more to reflect the ways in which SWs were

thinking about what they were trying to convey. This resonates strongly with (Faragher, 1994). Woodward-Kron's (2008) study in which she developed theory around the expression of technicality that incorporated a view of nominalisation related to metaphorising, suggested that the higher scoring texts in her study made better use of nominalisation and technicality. This study contributed to the current research insofar as the data under review yielded not one example of this action of nominalisation leading to the creation of grammatical metaphor. This suggests that this group of SWs would probably not have fitted into the Woodward-Kron (2008) category of higher scoring students. However, these data were analysed using the view of metaphor promoted by Lakoff and Johnson (1980), Kessler and Quinn (1987), Pugh, Hicks et al. (1997) Freeman (1995), Seargeant (2009), Lindqvist and Nordanger (2010), which meant that where they had resorted to the use of figurative language or in some other way metaphorically created images and abstract ideas to express their ideas they were coded at this node.

Eleven SWs provided evidence of the use of metaphors in twenty eight instances. The metaphors that will be coded at this node might be technical terms that are on the way to losing their 'status' as metaphors because they have become absorbed in the jargon of the discipline, or at least into the jargon of this course, however they are still regarded as worth coding because they could still be "living metaphors", according to Lindqvist and Nordanger (2010).

Where jargon terms have been coded at this node they will not be mentioned individually, a list follows here:

Virtual school bag, funds of knowledge, scaffolding, modelling, bridging,

In the following quotations from the SW's texts the metaphorical terms will be written in italics.

SW1 "In order to be an *insider* to a discourse one must understand the social and cultural background in which the language is being used. (Campbell & Green, 2006)"

SW6 expanded on Bronfenbrenner's ecological systems theory which is heavily metaphorical in its terms; the *microsystem* (immediate surroundings), the *exosystem* (environmental elements) and *macrosystem* (cultural environment).

- Industry and Banking

Two SWs described T2 as *anachronistic* and claimed that the Situation in T2 was akin to an *industrial model of schooling*. Two SWs also wrote about Freire's *banking* model in which the teacher *deposits* knowledge into the heads of the students. However, SW5 developed the image of the *industrial model* "... children in the classroom setting are positioned in that way that represents *an assembly line*." And he unwittingly fell into the image when he wrote "*utilizing* literary discussion as a *tool* of higher order cognitive thinking. SW8 also saw explicit teaching as a key theory "*that delves deep into the core of learning* (mining)." SW12 referred to this model as a *one size fits all* model of schooling.

SW4 cites experts on shared reading experiences at home and at school, they say that shared reading experiences "have been found to play a critical role in establishing students' early literacy *framework* (Whitehurst & Lonigan, 1998)". She wrote about how shared reading plays a role in "*building* vocabularies, fluency and phonics knowledge." And then, Children are learning best when they are actively involved in *the production of knowledge* in a dynamic, interactive environment" (O'Neill & Geoghegan, 2012, p. 104).

Thirteen SWs referred to *scaffolding*, some of them related it to the SIC but they all saw it as something that supported learning.

- The virtual school bag

This is a metaphor that is used a lot in this course and some of the notable expansions of the image were saying what it *contained* and that it related to the student's *cultural capital*. There were seven instances of this and two also referred to the *funds of knowledge* in the same context

- The nature of schools

SW6's schools were *brimming with diversity*. Unlike SW13 who saw school as a “*structured educational institution with certain boundaries* and has the motives to teach children particular subjects that are taught across every other school.” Another grim image was generated by this statement, “IRF does however, have a *legitimate* place (in) classroom discourse as a *reinforcing tool* for example, when there is only one possible *concrete* answer and all students are *equipped* to answer it correctly (Martin & Rose, 2003). It contains many metaphorical images that do not enhance the view of a classroom as a democratic space!

- Bridges and Barriers

SW3 comments on how the assignment “... highlights how certain teaching styles and use of teacher talk *creates a bridge or a barrier* to children's literacy learning.” She also claimed that “explicit teaching *nurtures* a child's potential and sets them up for success”. SW5 also used the *bridge* metaphor, “The role of the teacher is to *bridge the gulf* between literacy learning experienced at home and the more formal pedagogical style of the school classroom”. SW8 also saw that children having to share the attention of the adult in the classroom was a *barrier*.

- Modelling, Coaching, Apprenticeship ...

... were all used in the context of the SIC and explicit teaching; *modelling* six times, *coaching* three times and *apprenticeship* twice. They have specific discipline resonances that a lay person could be forgiven for misunderstanding in the context of children's education. However, they all provide strong and appropriate images for the activity described in the texts. The same can be said about the other identified metaphors in this section.

5.3.8. Costa's higher order thinking skills.

Costa's HOTS resonate strongly with Marzano and Kendall's but are different, therefore in line with the different treatment given metaphors they are given different treatment here.

5.3.8.1. *Generating new ways of viewing a situation outside the bounds of standard conventions.*

In the written task, the SWs' responses were unlikely to provide evidence of this activity. They were writing to a strict rubric and for many of them this was their first academic assignment, so they would be unlikely to have the confidence to view the two extracts "outside the bounds of standard conventions". This issue was explored in the interviews where SWs were asked about their experience in thinking outside the bounds of standard conventions.

SW16, said that while she was doing the assignment she realised that the way she was thinking was not enough for what was required:

I suppose first of all I looked at it my way and then I thought I couldn't get a lot of writing at it that way... When I sat down after a while there was a lot more differences, more than I first realised.

Her experience suggests that the activity of responding to the assignment activated her critical thinking and generated, for her, a way of looking at the situation that was outside the bounds of the conventions she was used to.

On the other hand, SW3 described how she would "stick to the rubric and materials provided then I write what they require." However, she did go...

...off a bit in the Indigenous Perspectives course, where I was really interested. And was shocked by what I learnt there. It was a good course, I had more confidence...normally I just use what has been advised by the lecturers.

SW1 echoed a reaction to the Indigenous Studies course, with a difference. She was asked if she ever felt that her voice was being silenced and her response was:

Definitely, I did, especially when you felt you had to give a politically correct answer because that was what the lecturer was wanting. I found that particularly in Indigenous Studies. There were a lot of good points though, I suppose I had more of the mainstream white Aussie idea of the Indigenous getting all this extra money and being privileged and all that...

Interviewer: Did that expand your perspective?

SW1: Ah definitely I never realised how badly treated they were in a lot of places. I mean you heard about it in America and in South Africa but not in Australia.

The obvious point here is that although she had felt silenced, the course had caused her to revise her attitudes and change her point of view. It generated a new way of viewing a situation. This was similar for SW16; the act of writing an assignment had caused her to develop a new way of viewing a situation.

SW10's response when asked about wanting to 'go outside the box' was: "*Not really, my out of the box thinking seemed to be not what the assignment said.*" SW18 like SW3, said:

I felt I had to be getting the correct answer rather than giving my own response. It was less about – you know in the first assignment where I had to come up with a stimulus question and work with my own ideas, but this assignment, when I was analysing the teacher talk, I found I was sort of parroting the right thing and I found that a little bit harder for me to understand.

SW3, in spite of her determination to conform to what seemed to be required in the courses, spoke enthusiastically about doing a multimodal assignment which did not involve any academic writing and which gave her the opportunity to engage in creative activities which she loved and subsequently got full marks for the assignment. Part of the intention of exploring this issue was to find out attitudes to alternative methods of assessment as well as to explore the evidence of Costa's criterion of being able to view situations in fresh ways. She was excited about the possibilities of multi-modal assessments and used this as an example. In addition the high mark would have given her self system a boost which would have increased her chances of continuing her studies. Although this SW was strongly self-motivated anyway.

What is apparent here is that the SWs interacted differently with the courses but only SW10 remained untouched by the activity of academic writing and researching. All five interviewees were coded in this node.

5.3.8.2. *Focusing mental energy on understanding others and empathising.*

When these two aspects are combined, in Costa's sense, and the teacher understands and does not judge, and does so enough to transform the knowledge the child is sharing, and the SW shows that s/he has understood the interchange, then the text was coded at this node. The SW is doing the paraphrasing and interpreting of the transcript and shows how the adult has understood the child's thinking. Where the SWs correctly paraphrased and related their paraphrases to the issue of relationships between the interlocutors, they were also coded at this node.

Altogether eleven SWs were coded at this node. The following descriptions are exemplary of the texts generated in this coding. SW1 writes about how the child in T1 interacts "enthusiastically with the text in the shared reading episode with her aunt." She then mentions how the teacher in T2 neglects the correct responses and the children subsequently act out; they were not pedagogically engaged with the learning. The child in T1 also shows disengaged behaviour when the situation becomes too challenging for her: "when Sarah is not sure how to do something she becomes distracted and begins to play with the celery." The mother resolves the situation when she realises Sarah is struggling; she showed empathy and understood how the child felt. SW2 focusses on the child's feelings when working with her mother:

Sarah is eager to help her mother and obviously enjoys having a teacher who knows what she can do and builds on what she cannot do in an attempt to assist her to perform more tasks independently in the future and accept greater responsibility.

SW3 wrote about trust between children and adults and noted that the teacher "might have humiliated Gary in front of the class" when he reprimanded him and could have phrased his response to the child differently, which would have "placed trust in Gary, respected his need to use the bathroom and given Gary the opportunity to take responsibility for himself and his learning." She also commented on the incident with Sarah and the celery described in SW2's essay: "Fortunately, her mother recognizes the problem and redirects Sarah by giving her an achievable task to build her confidence." This SW also makes the point that the teacher's use of the

Pedagogy of School “may marginalise the weaker readers.” The teacher’s questions assume that the children know the meaning of “drought”, and SW3 correctly empathised with the children who will be marginalised in the process if they do not know the meaning of the word. The SWs texts are generalised in the table that follows, which shows the distribution of the content of the essays relating to the SWs showing a sense of empathy with the children and understanding their problems. The column showing additions from the interviews relates to SW3 commenting on how she owned her feelings and controlled them when “*irked*” by a colleague, and to SW18 feeling that she had learnt to “*deal with people in tough times*” in her work as a receptionist in a cancer clinic.

Table 5.9

Understanding and Empathising

SW	Pedagogy of school; Drought pedagogical trouble	Trust: Toilet	SIC – identify/affirm/scaffold: child and celery	Eggs: child’s reaction; encouragement	Addition from interview
1	X(E)	X(I)	X(E) –		
2				X(E)	
3	X(E)	X(E)	X(E)		X(I)
4	X(E)				
5				X(E)	
6	X(E)			X(E)	
7					
8			X(E)		
9					
10					
11					
12					
13			X(E)		
14					
15					
16	X(E)	X(E)	X(E)	X(I)	
17				X(E)	
18				X(E)	X(I)

E = essay data; beige highlighting = evidence of instances of this skill.

5.3.8.3. *Understanding and paraphrasing others’ thoughts.*

(Also c.f. 3.3.3) Thirteen of the SWs showed evidence of understanding the way the children thought and the ways in which the adults in the transcripts used their understanding of this. They focussed on the way the mother in T1 used the incident of the broken eggs to develop the child's literacy and how she engaged in explicit conversation; on how the aunt used realia to give the child a sense of the story they were to read together, and the ways in which the teacher in T2 failed to consider how the children were likely to be thinking as he conducted his lesson. They generally paraphrased accurately but did not always show how the conversations transformed into knowledge. There were also some instances of the relationship between the interlocutors being inferred by the SWs. The following are examples of the ways in which the coding was conducted.

SW1 showed that the adults in T1 understood the way the child thought and would be able to work out the answers to their questions. She then paraphrased the episode showing her understanding: "Sarah's mother uses the real life setting of counting eggs to have a focused learning session. Aunty Jane brings a gingerbread man and discusses with Sarah the idea of baking as seen in T1 ll 58-62."

In the episode in T2 where the children began to argue, SW1 showed her understanding of the way the children were trying to think, but failing, because of the way the teacher was managing the lesson. "This was due to this lack of focus and use of Pedagogy of school - with the children trying to guess the answer." Again, her paraphrase showed her understanding of what was happening.

SW2 shows a child in T1 who is enjoying working with her mother who transforms her knowledge into new learning later when she needed to work out the number of eggs needed. "Sarah is eager to help her mother" ...who then draws on knowledge "that Sarah already has when they are working together to determine how many eggs will be needed for dinner". In selecting those events SW2 has shown her understanding of the thinking involved and paraphrased it accurately. She has also indicated an understanding of the nature of the relationship between mother and child.

SW3's account of the interchanges between the adults and the child show that she has understood that the adults also understood the way the child would think, and what she would need to transform her existing knowledge into new knowledge that she could share with them. "Sarah's mother and aunty thoughtfully construct experiences through everyday activities, placing Sarah at the centre, so that literacy learning occurs within a meaningful context."

This SW gave an excellent perspective on the incident of the child wanting to use the toilet in T2. She points out that the child was told to be quick and then, when he returned out of breath, was reprimanded for running. She showed her understanding of how that probably affected the child and of how the teacher was thinking as well. "Gary is deflated...he may feel humiliated". "Mr Hammond appears to lack trust and holds low expectations of Gary's behaviour..." Her paraphrase showed clearly how the relationship between adult and child unfolded and then she provided an alternative scenario in which the teacher was more understanding and gave "Gary the opportunity to take responsibility for himself and his learning." She inferred a negative relationship between the teacher and the child. SW16 was clearer in her perception of that incident: "When Gary asked to go the toilet, it seemed more like the motive was to remove himself from the lesson. In fact, it appeared Gary was so disconnected, that he felt the need to escape from the learning environment."

Table 5.10

Understanding and Paraphrasing

	Understanding child's thinking	Transforms into knowledge	Paraphrasing accurately	Relationship
1	X, X	X	X, X	
2	X, X		X, X	X
3	X, X, X, X, X	X, X, X	X, X, X, X, X	X, X, X
4	X, X	X	X, X	
5	X	X	X	X
6	X, X, X		X	
8	X	X	X	X
9	X	X	X	
12	X	X	X	
14	X		X	
16	X		X	X
17	X, X		X, X	X
18	X, X, X		X, X	

All the above results are based on essay data. The green highlighting = a 'full house' of skills and beige highlighting = other instances of the skill. Multiple X = the number of instances of the skill per SW.

5.3.8.4. *Setting aside judgements, solutions and autobiographical responses.*

It was decided that for this project, where the SWs had to make judgements about the qualities of the two transcripts and recommend improvements, setting aside judgements and solutions would not be appropriate descriptors. However, the issue of autobiographical responses was explored in the interviews and the results of that exploration are reported on here.

In 5.2.8.1. SW16 is mentioned as having discovered that she could view a situation differently from the way she had always viewed it. This is the same situation, except that the different way she is going to view the situation is by taking her personal first impression out of the picture, so she is suspending her autobiographical perspective.

In the interview with SW18 the issue of personal views came up strongly, so this was followed up with the other SWs relating to their feelings about their own voice being silenced. SW16 did not feel any sense of frustration:

Just found that I couldn't really put my personal views into any relation to what I was supposed to be doing. There were some things you might have said a little bit differently and I would realise that that wasn't the way it was supposed to be in the essay.

SW1 had no difficulty putting aside her personal reactions when asked about how she felt about the teacher in T2:” *I think as far as I can remember it was more analysing what have they done and what could have been done better so it was more analytical rather than a personality thing, what the guy had done.*”

Finally, SW18, who had raised the frustration she felt about having her voice silenced, said that she had reacted personally to the teachable moments in the transcripts because her parents had done similar things with her when she was a child. She was writing from her own experience. She also said that she backed up her statements with references.

It seems that these SWs did not have a problem with cutting their autobiographies out of their assignments, but that they were mature and seasoned enough at writing essays that they knew what to do in terms of referencing and objective analysis. Table 5.11 summarises Costa's HOTS and shows how they were distributed among the SWs then Figure 5.2 shows how they were divided between the essays and interviews and finally Figure 5.3 shows how the Marzano et al. codings were divided between essays and interviews.

Table 5.11

Costa's Skills

SW	New ways	Understanding	Summarising	Setting aside judgements
1	XX(I)	XXX(E)X(I)	XX(E)	X(I)
2		X(E)	XX(E)	
3	X(I)	XXXX(E)X(I)	XXXX(E)	X(I)
4		X(E)	XX(E)	
5		X(E)	X(E)	
6		XX(E)	XX(E)	
7				
8		X(E)	XX(E)	
9			XXX(E)	
10	X(I)			
11				
12			XX(E)	
13		X(E)		
14			X(E)	
15				
16	X(I)	XXXX(E)X(I)	X(E)	X(I)
17		XX(E)	XX(E)	
18	X(I)	XX(E)X(I)	XXX	X(I)

E = essay data; I= interview data. Green highlight = 'full house' of skills and beige highlights = other examples per SW. Multiple X = numbers of instances of the occurrence of the skill per SW.

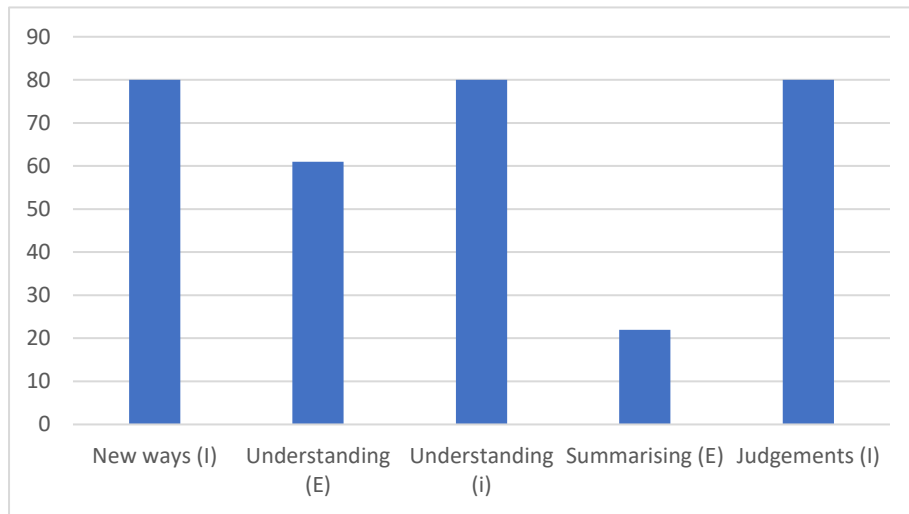


Figure 5.2. Results of Costa's Descriptors in Essays (E) and Interviews (I). The percentages represent the numbers of SWs who showed ability in the skills mentioned. I = interview data and E = essay data

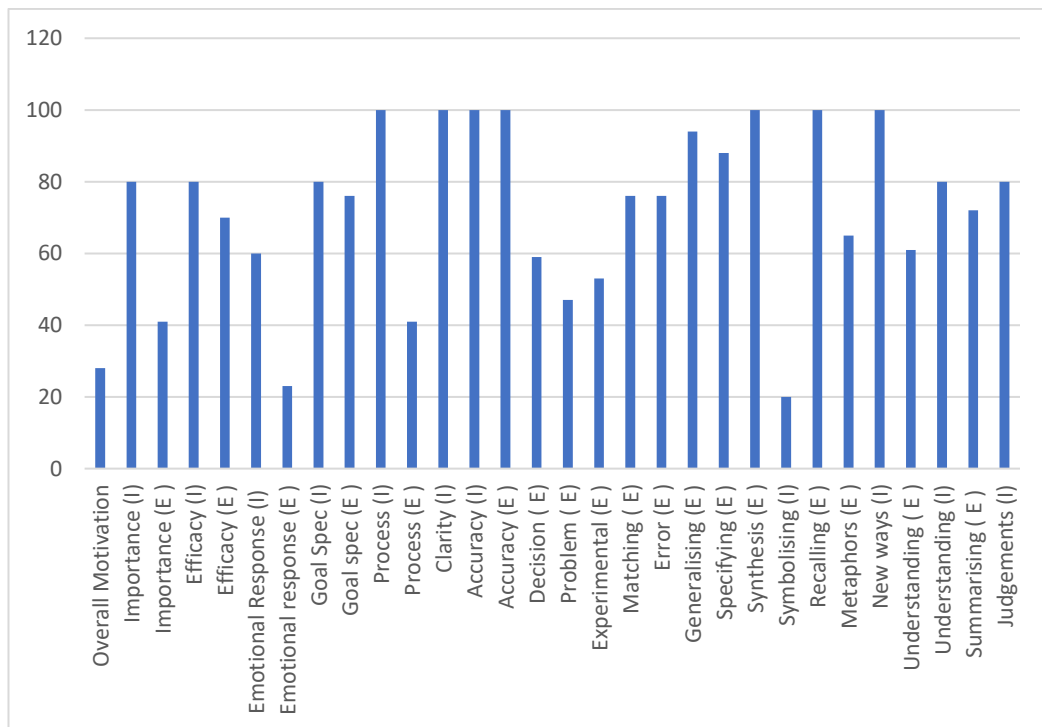


Figure 5.3. Results of HOTS, Marzano and Kendall and Costa from Essays and Interviews. The figure represents the percentages of SWs who showed ability in the descriptors in the figure.

5.4. Summary

It is apparent from the preceding account of the analysis of the SW essays and interviews that the lower down the skill in the taxonomy, the higher the count of those SWs who exhibited the skills. This means that higher up in the taxonomy they were weaker and their VUBs showed significant shortages in the top skill, the self system (36.75%). They scored higher on the metacognitive skills (72%) and Costa (78%) and the scores increased exponentially as they descended the hierarchy. They also scored high in the empathy area. The bar chart at the start of this chapter, shows evidence of this gradation except for knowledge utilisation which is an anomaly and will be discussed in Chapter Eight at 8.1.4.

CHAPTER SIX: ACADEMIC LITERACIES: DISCOURSE AND WRITING IN ESSAYS

6.1. Introduction

In this chapter it will be shown that the SWs in this data sample showed evidence of using some of the critical forms of academic prose and discourse as shown in Figure 6.1.. The issue of referencing, arguably one of the critical aspects of academic discourse, is considered in the following chapter, where the challenges raised by the SWs in the interviews are discussed. Overall, they wrote simply and avoided complex noun phrases. While they might have used more “big words” and “different words”, they also made good use of transitions, evidentials and code glosses. More use of hedges, boosters and attitudes might have given the writing a more academic discourse-like stance, especially as they were required to show evidence of a stance in the essay. The lacks mentioned above could be accounted for in the 50% vocabulary count but is at the same time countered by rich use of discipline jargon. Their strong showing in the category of idiosyncratic expression is indicative of their ability to understand their material and use the skills and abilities they had in their VUBs to make meaning in their essays. Some explanations are suggested and possible remediation proposed. It was decided to reflect the results of the analysis of idiosyncratic expressions in Table 6.1. to enable easier reading and understanding of the complexity of the results here. The other categories, being less complex, did not require such a table.

6.2. Academic Writing

The following list of qualities was derived from Coxhead and Byrd (2007) as previously mentioned in 3.7. The essays were searched for examples of the descriptors and the numbers are reflected here as they appear in NVivo. However, it is necessary to reflect on the earlier distinctions made within the concept of academic literacies, between academic discourse and academic writing (2.6.1 and 2.6.2). When it came to the actual analysis of the texts it was challenging to remain

within those definitions and find examples of academic discourse as defined in that earlier section. In the SW interview analysis (7.2.1.1) an approach is made that relates to the construct of academic discourse that is close to the ways (Bizzell, 1995, 2005; Coleman, 2012; Edwards et al., 2009; Haggis, 2006; Ivanic et al., 2007; Lea, 2004; Lea & Street, 1998, 2006; Lillis, 2003; Lillis & Scott, 2007; Mannion & Ivanic, 2007; Priest, 2009) use it. The scholarly definitions of Coxhead and Byrd (2007), Donesch-Jezo (2010) and Hyland (2003) have been used for guidance as the main authorities. As the evidence and definitions are all contained in the written data, they are represented together in the tables but the additional evidence as described in Wallace et al. (1999), relating to academic discourse and the contested terrain of what constitutes acceptable language in the university are not forgotten. This is an example where the need to represent the results in some quantifiable way drove the process. However, these results still represent some of the pieces of the bricolage that lead to the whole picture of the SWs' VUBs and what they could do when they wrote this essay. Figure 6.1 shows the detail of academic writing and discourse, while idiosyncratic expression and vocabulary count follow separately. This represents the evolution of the unfolding thought processes during this period of the analysis. Similarly, additional issues emerging from the interviews have been streamlined from Table 6.1 and are discussed in 7.2.

The descriptors referring to the use of specific types of words were difficult to identify because the SWs extensively reflected the vocabulary of their course materials as well as their references. In many cases they would have had to use vocabulary that would not have been normal in everyday usage. What they were writing was set in a specific discipline, so to be able to say what they had to say, they would have had to use discipline jargon, which affected the results. What follows is an analysis of the details of the writing and discourse in the SW essays.

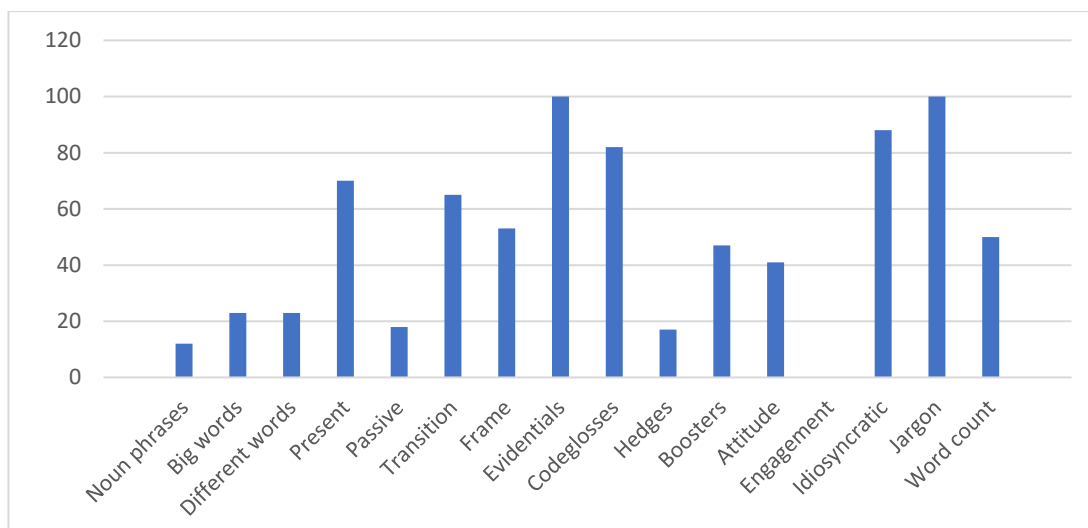


Figure 6.1. Percentage of SWs showing usage of the academic writing and discourse descriptors in the essays.

6.2.1. Long complicated noun phrases with nouns more often followed by prepositional phrases than relative clauses.

Two SWs (sources) produced two references for this node. As previously mentioned the SWs tended to write simply and not as academics therefore the poor showing of complex noun phrases would have been anticipated.

6.2.2. Long nouns, big words, and a tendency to use words of Latin or Greek origin.

There were examples of these in four sources, in seven instances:

SW12 Mr. Hammonds teaching pedagogy is an *anachronism*, ...

SW14 ...*optimum* literacy practices and learning.

SW15...responsibility of the teacher to create a *democratised* discourse...

SW18 ...*triadic* sequence...

Those examples are representative of SWs adopting the vocabulary and concepts used in the course materials and demonstrate an ability to learn new words and concepts.

6.2.3. Lots of different words (especially compared to friendly conversation with its limited range of often repeated words).

This highlights one of the real difficulties experienced by students who have not been prepared for university. They still tend to write as they speak and must come to the point where they can recognise the difference between that and what the university requires in terms of academic style. The SWs must transcend the “lexical bar” of academic language with its restricted use to move successfully into “high status” academic language (Coxhead & Byrd, 2007, p. 132).

There were three relevant sources and four instances shown in italics.

SW12 The Scaffolding Interaction Cycle (SIC) *characterises* literacy as a *social construction*, where students *attain* literacy skills by *progressing* through three stages of discourse: prepare, identify and elaborate.

SW14 The majority of children are taught a variety of literacy skills prior to *commencing* school.

SW15 It is the responsibility of teachers to *foster* their student’s literacy learning in a way that reflects this.

As in 6.2.2. the above examples also show a start towards SWs transcending the ‘lexical bar’ by using some of the language of their lecturers and their course materials.

6.2.4. Simple present tense verbs in generalizations and statements of theory.

The use of the present tense was notable because the use of the simple past would have been more expected as their comments were based on transcripts of events that had obviously happened in the past.

There were twelve sources and forty instances for this node, which would be expected given the number of references to theory. Some examples were:

SW1 Mr Hammond *begins* by giving a prepare move by clearly showing where the students are to look...

SW 2 During the identify element, students *affirm* their responses and they are directed to mark, by highlighting, particular words

SW3 Certain teaching styles and use of teacher talk *create* a bridge or a barrier to children's literacy learning...

SW4 This direct approach to teaching *follows* a structured, systematic and effective methodology of supporting,...

This is a strong result and is not unexpected as this is a simple linguistic form much in use in everyday speech.

6.2.5. A limited range of verbs with *be*, and *have* and *seem* often repeated.

Nothing was coded here because the auxiliaries *be* and *have*, which can also function as modals, were not used with "a limited range often repeated." They were used but with a range of different verbs, not a limited range, by the individual writers. *Seem* was used once and as a full verb in all the essays. It is possible that, as these were novice writers, they had not learnt to use a word like *seem*, which signals a typical hedging speculation.

6.2.6. Frequent use of the passive voice, usually without a *by* phrase.

This occurred most frequently in the opening and closing statements of the essays. Where a passive sentence is preceded, or succeeded, by a related active sentence it was not coded in this node because in such cases the effect of the passive construction tended to be undermined by the proximity of the active one, which was usually explanatory anyway. Similarly, where a statement in the passive voice is a paraphrase of a reference it was not coded at this node either, because the authority was quoted rather than hidden. This occurred mostly in the introductions and conclusions of the essays.

Three SWs were coded at this node. According to Crystal (2004), the use of the passive “provide(s) the impression of detached objectivity which has long been fostered as a desirable feature of Western academic enquiry.” This low result suggests that it is not a regular part of the SW’s academic writing ‘vocabulary’. (c.f. 6.7) This also suggests unsophisticated writing where the passive is not used to change the emphasis of agency for example. The SWs in this sample had yet to learn about how to nuance their writing and introduce subtle bias!

6.2.7. Use of adverbial phrases to indicate location inside the text (e.g. in the next chapter, etc.).

No examples were found of this construction, presumably because in a relatively short piece, they would not have been needed.

The next section moves into the realm of academic discourse. Although the evidence is presented in writing, it is more about the interactive nature of discourse than the technicalities of writing.

6.3. Results of Essays - Textual Metadiscourse

In this section the writings of Hyland (1998) and Donesch-Jezo (2010) are drawn upon to provide definitions and examples of usage. Donesch-Jezo (2010) reports on a teaching process, and her definitions are what she has taught her students to use. Thus, like the use of the Marzano descriptors, in this case, her definitions are being used to assess what the SWs could already do before being taught. Both Hyland and Donesch-Jezo use the term *metadiscourse* to refer to the writer-reader interaction. Donesch-Jezo (2010) suggests that “The interactive dimension helps to organize propositional information in such a way that the reader finds it coherent and convincing” (p. 33). (c.f. 3.5)

6.3.1. Transition markers—mainly conjunctions and adverbial phrases expressing relations between main clauses (e.g. and, but, in addition, thus).

The point was made in a previous chapter (3.6) that it is possible to include this descriptor in the writing section but for the sake of keeping specific scholars’ work

together it remains here. The essay under analysis was about comparing alternatives and explaining the writers' reasons for their choices, and therefore it is to be expected that there should be evidence of the use of this structure.

Eleven SWs showed evidence of this construction, including the following:

SW1: In this way Sarah is not left to guess on her own how to figure the problem out but has been given explicit instructions.

SW2: The pedagogies adopted by Mrs Green and Mr Hammond vary in a number of ways and the literacy learning of the children in both contexts have also varied accordingly.

SW16: He does orally explain certain parts of the story, but more explicit teaching of scaffolding and modelling would have helped to make connections with the children.

SW8: The teacher does show signs of employing scaffolding through the use of open ended questions; however, he usually has only one answer in mind.

6.3.2. Frame markers—explicitly refer to discourse acts or text stages (e.g. finally, to repeat, our aim here, we try first, next, finally, to conclude).

The SWs had to have used the marker to signal process in the text, rather than used the marker simply as an adjective. That only nine sources showed this usage in fifteen instances is therefore a relatively low result and possibly also reflects their unsophisticated writing ability..

SWs12 and 17 both use frame markers in their descriptions of the SIC,

SW12 “The second stage... The final stage...” and

SW17 “The next stage... The last statement...”;

SW4 distinguishes between “two different teaching and learning interaction sequences – first between mother and child, then between aunt and niece ...”

SW5 places evidence of explicit teaching “...within the first lines of the event...”;

SW6 describes the lesson in T2 “Finally, other than initial reading of the text...”;

SW8, in describing the elaborate move of the SIC, says “Finally the mother acts as an apprentice...”;²⁸

SW13 identifies one of the mother’s moves as “... first affirming what was previously said...”;

SW14 outlines the process of her essay ...”Next, it will... Finally, it will ...”;

Finally SW18 signals the first learning experience; “The first is between Sarah and her Mum”.

6.3.3. Endophoric markers—refer to information in other parts of the text (e.g. as noted above, see Figure..., refer to the next section).

There were no examples of this in the SW’s essays unless they referred to one of the transcripts in a comparative context but as the transcripts did not form part of their text, this could not be coded. It could be argued that this is a sophisticated structure, and the SWs in this research are all novice writers so would be unlikely to use it instinctively. Donesch-Jezo (2010) describes how she raised her students’ awareness of metadiscoursal strategies and argues for the necessity of teaching them, because testing after her training showed significant improvement in her students’ knowledge of, and their ability to use, the relevant markers.

6.3.4. Evidentials—refer to information from other sources (e.g. according to X, Z states ...).

All 17 sources, in 62 instances provided evidence of evidentials! This is to be expected in an academic essay where the SWs have been instructed to provide references and citations. The examples are therefore relatively obvious. They mostly include “According to...”, “X and Y state ...”, “X and Y’s theory ...”, “X defines...”, “X takes the view...”, “...suggested by X and Y”, “X concludes...”,

²⁸ This is an idiosyncratic use of the term ‘apprentice’. It is assumed to be a mistake.

“As Y explains...”, “X developed ...”, “ X and Y have identified...”, “X’s theory ...”, “X et al. confirm...”, “As stated in X...”, “X et al. argue ...”, “X and Y support ...”, “ X et al. refer to ...”. All the above are represented in the data in addition to direct quotes and in-text citations.

6.3.5. Code glosses—supply additional information by rephrasing, explaining or elaborating what has been said (e.g. namely, for example, such as, in other words).

SWs mostly introduced their glosses with “for example” or “such as”, but the effort was nonetheless made to make their text accessible and explicit

Fourteen SWs used code glosses. They provided examples for concepts such as SW1 posing an open-ended question “I wonder why?” and SW2 a simple question – “Who can tell me what a drought is?” A few more detailed examples follow.

SW5 said that the Pedagogy of School requires classroom behaviours such as answering a teacher’s questions instead of being cognitively involved. He also noted that the aunt in T1 signalled a shared reading experience by “using words such as ‘Let’s...’”

SW6 suggests the teacher could have used metalanguage such as “Yes Kate, I like the way you are thinking”.

SW7 used the example of the kitchen providing environmental factors to assist learning. She also used a range of texts such as books, magazines and newspapers as examples of the sorts of texts available for children to read at home.

SW8 suggested the use of “another everyday item, such as a bag of apples, to reiterate the skills learnt.”

SW14 also reflected on the usefulness of the home environment, “(it) is often situational and contextual as seen in T1, for example grocery shopping, preparing dinner or reading a story.”

As an indicator of the informal nature of the home SW13 wrote, “For example in transcript one the child receives a gift from her relatives, this then encourages the child to want to read rather than being forced to.”

SW9 gave an example of the teacher missing a ‘teachable moment’.

For example, in T2 (L46) the teacher can introduce the concept of crops and farming to the students, instead the lesson loses momentum as it is taken off track by an interruption, and the teacher never refocuses back to this point.

SW15 also commented on the teacher’s failure, “This presents a chance to develop the student’s sense of the usefulness for literacy in relation to real life issues such as trust but this opportunity is overlooked by the teacher.”

SW18 similarly commented on a problem caused by the teacher and provided an example of the sort of abstract question that confused the children, “What does that really mean for Jack and his Mum?”

SW9 said that consideration of the child’s prior learning, “such as prior knowledge, that comes from past experiences with the world”, is important.

SW12 said about the virtual schoolbag:

Sarah’s aunty also makes effective use of Sarah’s funds of knowledge or what Thompson refers to as her “virtual schoolbag”. This refers to the knowledge and skills students build through their home environment, culture and life experiences that they carry with them into the classroom.

She has thus rephrased the term.

The next section explores another aspect of metadiscourse

6.4. Results of Essays - Interpersonal Metadiscourse

These strategies are aimed at involving the reader in participating in the text. Hyland (1998) considers them to be integral to academic writing and makes a strong case for recognising the linguistic structures that follow as integral to academic writing (1998, p. 453). He says metadiscourse is “critical to the overall purpose of language use”, and “in this way academic argument can be seen as an independent creativity

shaped by accountability to shared experience and shared conventions of discourse practices.” Here the idea of “shared conventions of discourse practices” is the focus. These SWs are working at sharing the conventions of discourse practices and, in terms of practising the genre of critical comparison in persuasive text, at engaging their reader in the process of discussion or argument.

6.4.1. Hedges—withhold the writer’s complete commitment to a proposition, recognizing, in this way, the possibility of the readers’ alternative viewpoints (e.g. might, perhaps, possible).

Hyland (1998, p. 443) notes that hedges “are items which mark the writer’s reluctance to present or evaluate propositional information categorically.” Moreover, hedges “can mark statements as provisional and seek to involve readers and participants in their ratification” (Hyland, 1998, p. 444). SWs were required to commit themselves to propositions in the essay so it is to be expected that there would be limited use of hedges.

Three SWs showed use of a hedge in five instances. The small number here might reflect the essay task. Although it was a critical comparison, they were required to recommend improvements to the pedagogy presented in the transcripts, which would militate against hedging. A few suggested that matters could have been improved if the teacher had done things differently; however, this seemed too definite to be a hedge, so those instances were not included.

SW14 suggested that the teacher’s teaching might be improved “by further considering where individual students come from and what each student’s virtual schoolbag contains”. Then SW16 speculated that the child who needed to go to the toilet was escaping from the lesson. She speculated further that the lesson was not providing enough connection between the home and the school. Finally, SW17 thought that the teacher’s use of “what do you think” type questions could have been decreasing the chance of discussion developing in the class.

6.4.2. Boosters—emphasize the certainty of the writer’s claim, closing alternatives (e.g. definitely, obviously, of course, demonstrate).

On the other hand, boosters “imply certainty and emphasise the force of a proposition”, but they must also “observe the community’s rules concerning rhetorical respect for colleagues’ views” (Hyland, 1998, p. 444). It is important in this context to consider the SWs’ power relation with their teachers, and their perceived need to please them to get marks and to pass. The SW interviews reveal something of this. They are likely to say what they think will gain marks and would be unlikely to show disrespect for the views of the community into which they are being inducted, that of the teaching profession and the faculty of education at their university in this case. Eight SWs used boosters in seventeen instances. They tended to comment on the pedagogical processes and the teacher in the transcripts:

SW5 wrote that it was evident that the teacher was “denying the students an opportunity to use cognitive skills to deduce this response from the class.”

SW16 noted that “The student is clearly having difficulty and it seems that stylistic troubles are being presented here.”

SW15 “My uncle’s a farmer and he grows avocados and macadamia nuts” is a *clear* example of where there is an *obvious* opportunity to prompt further discussion provided by a student on the farming cycle ...

SW14 By establishing the differences between the home and school environments and identifying the *important* characteristics of pedagogies used in each environment, it is *clear* that *successful and effective* engagement at school can be achieved

By contrast, comments about the first transcript tended to be positive.

SW5 claimed for example that the pedagogy in T1 “clearly enables the student to participate in learning experiences that are beneficial to their literacy development.”

SW7 agreed: “She has clearly been involved in the co-construction of knowledge with her mother, as is evidenced in her initial question of ‘what shall I do?’”

SW15 By utilising the Scaffolding Interactional Cycle, being aware that language is a socio-cultural tool for meaning making and being proficient in the pedagogy of

literacy learning teaching style, the adults in T1 have shown that their child is receiving excellent support for her literacy development.

The next two extracts are strongly expressed opinions about other topics.

SW9 We use language to make sense of, and contribute to, our world. *Most* of the learning that takes place in our daily lives is social (Emmitt et al., 2010). Therefore, it's *vital* for classrooms to retain relevance to children's lives outside of the classroom.

SW13 Although technology is an important part today it is *crucial* that children are still capable of basic writing and communication skills, these are things that technology has little influence in (Learning Wales, 2012).

6.4.3. Attitude markers—express the writer's attitude to a proposition (e.g. unfortunately, hopefully, surprisingly, I agree).

There were seven instances of this in ten instances.

Attitude can also be shown in the use of certain evaluative adjectives and adverbs and text was coded accordingly. "Attitude markers express the writer's affective attitude to textual information in a more varied way than hedges, conveying surprise, obligation, agreement, importance, and so on." They also "imply a stance towards the reader" (Hyland, 1998, p. 444).

It was coded in this node when overt approval or disapproval was expressed. It was not coded when the description was couched in positive terms but no obvious attitude was expressed. Some examples of disapproval are presented next, followed by examples of approval:

SW16: It is questionable as to how a fairy tale story with a farm theme relates to the real world of farming.

SW9: The teacher disappointingly misses several 'teachable moments' (T2:L41), where there are opportunities to further investigate ideas and relate student responses to real-life and scaffold their learning.

SW14: Furthermore, while Mr Hammond focused on preparing the lesson, he neglected the Pedagogy of Literacy Lesson. The children have been given minimal opportunities to use their imagination and initiative to engage in learning activities and tasks.

Approval

SW11: Transcript one's home context clearly shows that the supportive home environment allowed for a more positive, rich, literacy environment with more examples of effective literacy learning.

SW12 This theory (constructivism) suggests that children learn and gain knowledge by exploring, asking questions and actively seeking answers. This is achieved successfully through her involvement and engagement in the cooking experience, asking questions and problem solving as tasks arise.

SW15 In T1 Sarah's mum does an effective job of using the Scaffolding Interactional Cycle by prompting Sarah to elaborate and build on her knowledge

SW17 Mrs Green asks Sarah to answer particular questions which skilfully draw upon Sarah's prior knowledge.

It is interesting that there are as many examples as there are. The SWs would have been told not to show personal preferences and to support all opinions with scholarly references. However, the above examples do indicate well supported assertions.

6.4.4. Self-mentions—refer to author(s) explicit presence in the text (e.g. I, we, my, our).

Hyland (1998, p. 444) makes the point that they (in his case “person markers”) “reflect the importance of the degree of author presence in contributing to the variability in tenor of the text.” There was no evidence of this being used in these data, which is to be expected as the SWs would have been told explicitly that this is not acceptable academic discourse practice. In the same way, the following category was not used, presumably for similar reasons.

6.4.5. Engagement markers—explicitly build relationship with the reader (e.g. you, your, consider, note, you can see that).

Hyland (1998, p. 444) refers to these as “relational markers” and their purpose is to draw the reader into a participant position in a persuasive text. One of the texts were coded in this category. SW1 used this strategy to engage her audience: “In order to be an insider to a discourse one must understand the social and cultural background in which the language is being used. (Campbell & Green, 2006).” The other SWs probably thought that it would be inappropriate to include a personal perspective of this sort in their essays as they had been trained that they had to keep their personas out of their essays. SW1 probably did this by mistake but as it is an essay written in the persuasive genre, as discussed in 3.7., it is to be expected that something relational could appear.

Figure 6.1 represents the number of times specific descriptors were used in the sample of essays. They are aggregated numbers and the percentages are based on the number of times they could have been coded. For example, all the essays contained examples of discipline jargon, so that is represented in the table as 100%. There are some significantly low areas in this result. It might have been expected to have more use of the passive voice for example, but some standard academic writing conventions are also strongly present, for example evidentials and code glosses. Engagement markers would not have been expected here because the SWs were trained not to be personal, however, there was one exception. When it comes to making recommendations for curriculum development these results will be instructive.

The final category in this section was included because ability to use discipline-specific jargon correctly is a significant marker of academic discourse.

6.5. Results of Essays - Appropriate Use of Discipline Jargon - Technicality

The decision to include this category draws on the work of Woodward-Kron (2008) who uses the term *technicality* in a functional linguistics sense. It could be assumed

that if SWs have a rich vocabulary of *technical* terms that they are on their way towards mastering the appropriate academic discourse. There might be *caveats* in that the terms and concepts all derive from the course materials and therefore would not necessarily have been part of their vocabulary at the start of the course, but they have become part of the contents of their VUB and therefore constitute evidence of what they did when they wrote their essays.

Not surprisingly this is the most heavily identified category and it appears in all the essays for a total of ninety-seven instances. Some of the terms are shared with other disciplines, such as psychology, others have specific meanings in education and specifically literacy teaching. Some also depend on context for clarity of meaning. Some of the more frequently used expressions were *funds of knowledge, learning environment, Scaffolding Interactional Cycle, scaffolding, pedagogy, explicit teaching, implicit teaching, , modelling, positioning cue, virtual school bag, social constructivism, pedagogy of school, pedagogy of literacy lesson, pedagogy of literacy learning, meaning making, cultural capital, open-ended question, classroom discourse, teachable moment.*

All the above show that the SWs in this sample have used the appropriate discipline jargon a multitude of times, which suggests a rich addition to their VUBs.

6.6. Results of Essays - Idiosyncratic Language

In the case of idiosyncratic language, the tendency to produce non-standard expression was more prevalent in this data than the obvious use of *AusEng*. This category goes towards greater understanding of what SWs did when they wrote their assignments (c.f. 3.9). It also provides evidence of their ability to demonstrate understanding of the intellectual content of the course and readings, as well as the genre of persuasive writing in a comparative critical essay despite their English writing not being perfect and academic. Experience has shown that their writing skills develop over time with experience and exposure. It is also an innovative addition to the mainstream view of academic writing and discourse.

There are examples, in 15 sources and 53 instances, (some of the instances consist of more than one codable instance), of what the SWs have done as they created meaning and used non-standard English. Almost half the instances are more due to careless writing and proof-reading than actual mistakes in expression or the creative use of language, resulting in something non-standard but meaningful. What has been coded as careless proofreading can also be the result of ignorance of the grammar, but in this case, they were coded as proofreading errors. It is suggested here that the HOTS are in place despite faulty language. Their language could improve, which it will as they are increasingly exposed to academic language in their lectures and readings. The table at the end of this section shows the distribution of idiosyncratic expressions; the *AusE* column, including colloquialisms; the Careless Proofreading column, including grammatical errors, spelling errors and punctuation; the Idiosyncratic column, including instances where the SW appears to be trying to make a point using non-standard expressions that do not fit into the two previous columns, including unusual but functional vocabulary usages, while ambiguity was included because it may be caused by a range of issues excluding spelling or punctuation. Some examples of how the writing was coded follow.

SW1 A look will then be taken at how the use of Pedagogy of Literacy Learning, Pedagogy of School and Pedagogy of Literacy Lesson, as described by Bull and Anstey (1996), has occurred in the discourses.

Maybe she was not able to find a more elegant expression in the passive voice resulting in an idiosyncratic coding. Then there are instances where the meaning is clear, but the expression is somewhat tortured.

SW1 When using this form of explicit teaching the instructor models metacognitive skills by allowing the student to hear how to think about what they are thinking.

This was also coded as idiosyncratic. At other times, colloquialism takes over, in this case the use of *AusE*: SW1 “In this way Sarah is not left to guess on her own how to figure the problem out but has been given explicit instructions.”

Sometimes words are used correctly in terms of their meaning but inappropriately in terms of the context: SW2 “In contrast to Sarah in T1, T2 is anachronistic.” Luckily

meaning is supplied by the context. “The context for the school students is effectively a classroom consistent with the industrial model for schooling which sees schooling practices developed that are efficient, uniform and competitive.”

SW2 This is evident in the transcript when the children in the class are calling out and speaking *over the top of each other* in an effort to be the first with the correct answer. (Italics added)

The italicised words are colloquial and could be described as *AusE*. However, they do provide a vivid image of what is happening in the classroom. In this same text another example of poor expression, coded as idiosyncratic, still provided a clear meaning: “The teacher, Mr Hammond, is accessing the virtual school bags of the students in the *class in a very limited capacity* through simple questions such as L29 “Who can tell me what a drought is?”

SW4: “By Vygotsky’s research in the sociocultural aspects of learning and development, we now realise children are active and constructive learners in their nature of understanding the world.” Her tortured expression here does not obscure her meaning but would cause lost marks according to the marking rubric in the “Expression” section; here it is coded as idiosyncratic.

SW5 wrote that “The use of literacy pedagogy in the home and classroom environment has changed exponentially throughout the 21st century.” Attempting to use high level language, he has created an exaggerated statement that is curiously out of place in this academic essay. It was therefore coded as idiosyncratic.

SW8 also seeks to employ high level language but only succeeds in sending up an idiosyncratic ‘flag’. “It will display that transcript one’s use of scaffolding and elaboration and the consistent application of purposeful and student-centred learning creates a more effective and *resounding* educational experience.”

SW9 created an interesting idiosyncratic image here: “Pat Thomson *coined the notion* of ‘virtual school bags’ as a metaphor for what knowledge and experiences children bring to school (Comber, Badger, Barnett, & Nixon, 2001).”

SW11 provided a typical example of the sort of clumsy writing common here. It is coded as idiosyncratic but it is almost ambiguous as well, yet her meaning is clear.

By looking at and analysing snapshots of literacy lessons like those in transcripts one and two, gives educators a way to reflect upon their teaching practices and allows them to make changes to the way they conduct learning in the classroom.

SW12 creates a term, ‘decider’, and then lapses into ungrammaticality. So this text was coded as idiosyncratic as well as careless proofreading.

The IRE is a pedagogy that involves the teacher as the authoritative *decider* of whether the answer provided are acceptable or not and does not always provide the opportunity to discuss answers further (Churchill, Ferguson, Godinho, Johnson, Keddie, Letts, Mackay, McGill, Moss, Nagel, Nicholson, & Vick, 2013).

This SW provided another interesting creative vocabulary innovation in this extract: “The task of the teacher is to provide effective literacy practices, which *gulf the gap* between the home and school education system, promoting consistency for the students.” This one is also categorised under idiosyncratic.

SW13 did not identify as NESB. However, the following extract evokes vivid, accurate images through unusual use of English, and was therefore coded as idiosyncratic:

School is a structured educational institution with certain boundaries and has the motives to teach children particular subjects that are *taught across every other school*. Whereas the home environment is dependent on the child’s will to learn and their parents or guardians *influence in what is being taught*.

SW14 shows initiative in translating the term ‘recap’ to ‘recapturing’: “The transcript entails discussions and questions surrounding Mr Hammond recapturing and analysing the story ...” This is coded as idiosyncratic but it is an interesting idea nevertheless.

SW17 writes about the teacher teaching a group of students about “farm animals and growing one’s own food by reading and *exaggerating* sections of the fairy tale *Jack and the Beanstalk*.” The meaning is clear but the word used is clearly idiosyncratic.

SW18 provides other interesting uses of terms that work but are not usual: “By *diagnosing* this information, Mum can then proceed to co-construct Sarah’s learning by introducing concrete materials and the ‘sharing out’ of eggs to each person *to decipher* if they will have enough to support Sarah’s learning...”

It is obvious from the above examples that the SWs understood the issues but had not yet acquired standard academic expression. This adds weight to the developing theory that these students are intellectually capable but have yet to acquire standard academic language and discourse.

Table 6.1

Distribution of Coding for Idiosyncratic Language

SW	<i>AusE</i> or colloquial	Careless proofreading	Idiosyncratic but meaningful	Ambiguity
1	X	X, X	X, X	
2	X		X, X	
4		X	X	
5		X,	X	X, X
6		X, X, X, X, X,		X
7		X		
8	X	X	X	X, X,
9		X,	X, X,	X
10				
11	X	X, X, X,	X, X	X, X
12		X, X, X,	X, X	
13	X,	X, X, X, X, X,	X, X, X, X, X,	
14			X	
15				
16	X	X, X, X, X		
17	X	X, X, X, X,	X,	
18	X	X	X	X
	8 or 11%	33 or 46%	22 or 30%	9 or 13%

All the above data were drawn from essays. Green highlight = 'full house' of skills and beige highlights = other examples per SW. Multiple X = numbers of instances of the occurrence of the skill per SW.

6.7. Results of Essays - Vocabulary Count

This is an idea that reflects on the interpretation of the number of words that have been counted in this data set. It is likely therefore that what is evident in the essays does not reflect the full gamut of the writers' word knowledge. Furthermore, given that the essay topic has a restricted scope it could not possibly elicit all the words the SWs know.

The literature, theory and way in which the data were collected on this topic has been described in 2.6.3, 3.8, and 4.6. Building on those earlier descriptions, the results are outlined in this section. Two hundred and ninety two lemmas/families were used in

the aggregated data, out of the 570 listed in the Academic Word List (AWL) developed by Coxhead (2000a), which suggests that a little over 50% of the word families are represented in the data under review. On reading through the lists generated by NVivo and the AWL, many issues appeared. There are words in the AWL that would not have been required in the essays and there were others that could have been used. Some examples of what would not have been required include *aggregate*, *adjacent*, *advocate*, *annual*, *arbitrary*, *chemical*, *classic*, *economy*, and *suspend* among many others. However, there are also a number that could have been used and were not, such as *option*, *prohibit*, *quote*, *relax*, *somewhat*, *stress*, *transmit*, and *valid*.

This does suggest that although the SWs in this sample appear to have a rich assortment of technical terms in their VUBs they still need to acquire many other vital terms. A further caveat here relative to this issue was mentioned earlier by Laufer et al. (2004, p. 203), who were cited as saying *inter alia* that, “A learner’s passive vocabulary is always larger than his or her active vocabulary.”

6.8. Summary

Aspects of academic literacies like referencing are discussed in further detail in the next chapter because they were raised by the SWs in their interviews as being a significant challenge when they first started their studies. Other behaviours, as mentioned in 2.6.1 by Wallace et al. (1999), were not analysed in the data in this study as that would have extended the study beyond its scope. The academic writing and discourse skills in this case are all assessed in terms of how the SWs wrote in their essays. Apart from use of the present tense, transition markers, evidentials and code glosses in their use of academic language, there is much work to be done. The first three categories - complex noun phrases, big words and those of Greek and Latin origin, and a wide range of different words to differentiate the writing from everyday speech - are all indicators of issues with vocabulary. When their vocabulary count of 50% of the words needed in the academy, as represented by the Academic Word List, is factored into the discussion this is supported. However, their strong mastery of the jargon of the discipline, which was needed to write this essay, shows that they were aware of the necessary vocabulary and possibly need more

experience of academic language. In the interviews the SWs (except for one) commented on the quantity of reading they had to do and how they managed that by finding ways to read only what was necessary. This might indicate a reason for them not acquiring the necessary vocabulary and structures, such as the passive, which also showed a low result in the analysis.

They generally wrote more simply than is usual in academic prose, and they did not use modals much nor did they need to engage in the more complex structures like adverbials that are used to navigate in documents. This was too short a text to need adverbials to show position in the text. However, it is possible that they could have used modals to better effect. It is interesting though that when it came to the metadiscourse aspects of academic discourse they performed better. In textual metadiscourse they all used evidentials and the majority used code glosses as well as transition markers. Even frame markers came in at over 50%, all of which added to the readability of their essays. Endophoric markers play a similar role to the adverbials of place and would not have been needed in a text of this length.

In terms of interpersonal metadiscourse, they made good use of boosters and demonstrations of attitude – almost 50% in each. However, hedges gave a poor result as did engagement. Introducing their personal position into the text would not have happened as they would have been trained not to do this. Ways of hedging and developing engagement need to be developed though, when writing in the persuasive genre, so there is also work to be done there. When mentioning potential work needing to be done by course designers and assessors, an immediate observation must be made regarding different discipline styles. They need to be taught what is expected of them when writing in a particular discipline. L2 made it clear that in the new BEd programme they have included a communication course which would cover those issues. However, there is no way around confronting the vocabulary issue. Remarks were made about the fact that these results are based on one essay on a specific subject and therefore could not possibly have generated all the word families needed when writing for the university. Nevertheless, as was mentioned in 6.7, the SWs in this sample need to acquire a more extensive vocabulary.

CHAPTER SEVEN: EXTRA INFORMATION FROM THE SW INTERVIEWS

7.1 Introduction

In this chapter additional information is provided from the staff and SW interviews as was mentioned in the Introduction to Chapter Five. The SWs were asked about their challenges because their responses would reflect on their experience of writing a critical comparative analysis essay in the persuasive genre. They would also provide further information about the contents of their VUBs, particularly how their experience might be enhanced. The responses included being daunted by unfamiliar language, feeling pressured to provide the right answer for their lecturers, and generally not knowing what to expect from lecturers and the university. The three staff interviews provided a unique perspective on teacher education. L1 was the original course examiner of the literacy course under discussion and responsible for the design of the assessment. L2 is now the BEd course co-ordinator and had extensive responsibility for leading the design of the new programme, thus providing a wide overview, and L3 taught the literacy course for all its iterations and provided a close-grained picture of the student experience from the staff perspective. Initially the purpose of interviewing staff was to develop a richer perspective on the student experience. However, the interviews provided more, and that additional material is included here. It includes teacher talk, the relationship between university classroom and school classroom, schoolwide pedagogy, curriculum issues such as assessment, critical thinking, scaffolding, HOTS and engagement, as well as the VUB.

7.2. SW Interviews

The additional data from the SW interviews consisted mainly of the challenges they experienced when they first arrived. They included referencing; issues with understanding the course; the discourse of the university; practical issues like the amount of reading and workload as well as social issues related to being online students and expectations between themselves and the staff. It was decided to

include all the additional data because, in the spirit of bricolage, it all contributed to a richer understanding of the SWs experience of writing their essay in the Literacy course at the start of the BEd programme as reflected in Research Question 1. The SW responses are resonate with some of the FYE experience literature as discussed in the Literature Review.

Figure 7.1 shows the percentages of SWs who spoke about the various issues. The issues arose in response to open-ended questions about their experiences and expectations when they first started at the university. The transcriptions of the interviews were placed in NVivo and analysed into the themes that are represented in Figure 7.1. The first theme is about academic discourse and the culture of the university.

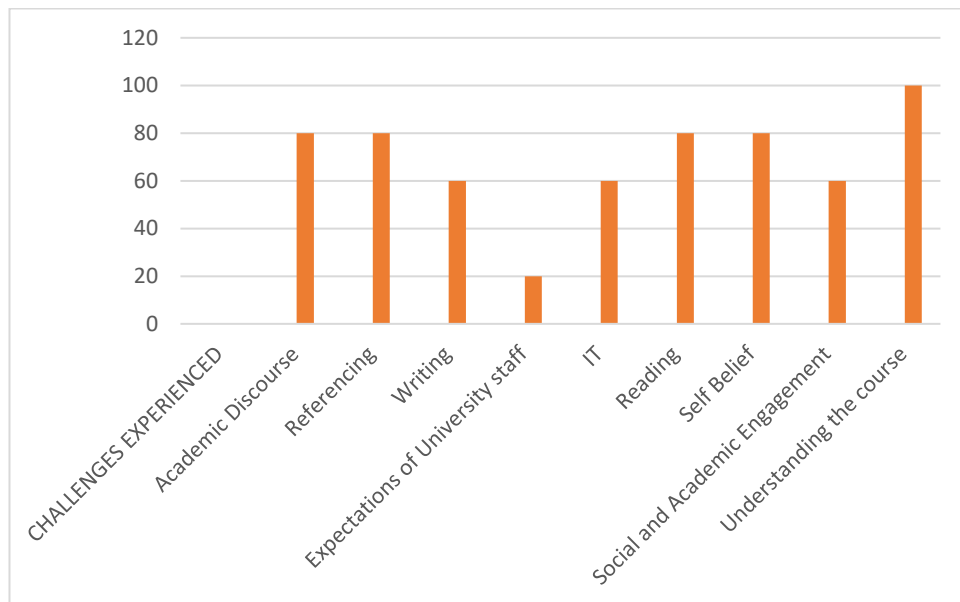


Figure 7.1. The figure represents the percentages of SWs who experienced the Challenges mentioned in the interviews.

7.2.1. Academic discourse, expectations of the culture of the university and of university staff.

The appearance of this theme in the SW interviews was not a surprise. According to the literature, students, new to the university, especially if they are non-traditional, can find the actual language used in the university and in their courses hard to understand. They are also liable to find the *habitus* alienating and the values

sometimes clash with their own cultural values (Sheridan, 2011). The behaviours outlined in Wallace et al. (1999, pp. 15-21), are what new students, who have not been prepared by home and school backgrounds, will possibly find difficult when they first encounter them. Brinkworth et al. (2009) and Crisp et al. (2009) develop the idea that students' initial expectations are very different from what they had experienced in school which leads to misalignment between themselves and the university. This is further developed in Fernsten (2005) and Paxton (2012) who highlight the university's inability to value the discourse the students bring with them and use it to bridge to the mainstream academic discourse they require. Paxton (2007) draws on scholars like Gee and Bourdieu to develop a theory of intertextuality and "interim discourses" referring to the knowledge and experiences the students bring with them to the university and draw on to demonstrate their understanding of the subject matter.

When asked about her expectations of university, SW1 said:

Initially I did wonder if I was going to be able to do this. Was it going to be far above what I could understand because it's a long time since I went back to school. Things have changed so much I thought maybe I wouldn't be able to keep up to that standard. You know I thought maybe there was going to be miles up and it wasn't as high up as I thought. I was thinking back to when we started doing the subject, we read about discourse about, you know, being like an insider, the courtroom and that. It really helped me a lot, it was good for me to be able to understand that, coming from an outsider to this academic world was a bit of a challenge, it is still a bit of a challenge because sometimes I hear this word and go "what on earth are you saying?" (laughs)

The reference to discourse and insiders refers to a reading provided in the earlier iterations of the course about a young person who had to appear in court. He did not understand the discourse of the courtroom and as a result was severely disadvantaged. This reading was aimed at developing an understanding of the different discourses children bring when they first start school. This resonates with the VUB referred to earlier, the reading fitted closely with both the course and this SW's experience. Later in the interview she spoke about her classroom experience, and her attitude to the learners appears to have been shaped by both her own experience and that of the child in the reading.

In another area of their experience another issue was an expectation of lecturer support in terms of reading drafts of essays, Collier and Morgan (2008, p. 430), developed theory related to the dissonances between student and staff expectations of each other. They conceptualised this around role mastery and cultural capital. They also strongly hypothesised that FIF students were at more risk of not persisting because they had not imbibed the “cultural capital” they would have done if their parents had been university graduates. All the SWs interviewed were such students. “Overall, this conceptual model draws attention to the fact that success in higher education is not solely a matter of students demonstrating their academic abilities.” (Collier & Morgan, 2008 p. 430). Part of the purpose of this current research is to discover what it is that new students can do that resonates with the demands of the university so that academics might be able to capitalise on students’ existing skills in their teaching and assessment. They could then possibly teach and assess in ways that enable students to develop the new skills and discourses required for ongoing success. Haggis (2006, p. 532) argues for a change of orientation on the part of academics and for understanding that “differently prepared” students might not see the nature of the process in the discipline:

Crucial aspects of process may be quite opaque to students (Lillis & Turner, 2001). How for example, is an essay question to be read? How are instructions about what to research embedded within such a question? How can academic texts be read in a way that allows understanding to emerge? How does a writer overcome the sense of exposure that writing often evokes? None of these questions is about ability, or even preparation.

SW3 said she was “quite confronted, didn’t think I would be able to make it through, so now in final year going yaay”!! She continued later:

Yes I found the assignments we were expected to write at university were of a much higher standard and I would spend ages writing and editing, reading, trying to make it spot on, or as spot on as I could get it. I was so conscientious (sic) of the fact that it was a higher level of writing I need to submit. It was university and the person marking it was a doctor that ... was daunting, and the expectation unnerved me a bit. And things like referencing I found difficult for a while to understand the correct way of doing APA referencing. And as I was writing I was aware that I had to be professional,

so I couldn't write as I speak so I had to write how the people who were teaching me speak. It didn't come naturally.

Four of the SWs interviewed showed misalignment between their expectations of the university and their actual experience. They are representative of the two categories of first-year students, traditional students, i.e. those who have come to the university straight from school, and non-traditional students who have come to university by a variety of pathways and tend to be older than the traditional students. Ten of the SWs in my sample reported that they had had no previous experience of study after school.

Bowl (2001, p. 157), in her study of non-traditional students entering higher education in the UK found a similar sense of confusion to that expressed by some of the participants in this current study. Her participants expressed some similar concerns to those heard in my interviews. Running through participants' accounts were the difficulties of understanding what tutors wanted and what advice and support they were prepared to offer, and of comprehending the mysteries of academic culture and conventions. The requirements of tutors were experienced as unclear and inexplicit. Approaching tutors for help and support did not tend to bring hoped-for clarification. Participants tended to blame themselves for their inability to understand what tutors required of them.

SW16 reported that at first she wondered what was “*really expected of me here?*” SW3 was “*unnerved*” by what she interpreted as the “*expectations of having to write assignments of a high standard*”. She struggled with the assignment, and she found it “*complicated and confusing*” as well as “*daunting*”. SW18's expectations were misaligned with the university in that she had expected “*more practical information*” and it takes a “*while to understand how it applies to the classroom but then you sort of click at the end of the course when you are doing the final assessment.*” Interestingly SW1 found that, contrary to her expectations of “*heaps and heaps of reading, especially textbooks*”, there had been “*not as much as I thought*”.

According to L2, in her interview, future students in this programme might find assessments different because there is a team re-developing the BEd programme and they have been advised to remember that it is an undergraduate course and that some

of what they had been planning was more at post-graduate level. They have taken advice about how to word their objectives and, “*a whole lot of directives about the verbs we use and the level of the verbs we use in our objectives, which would subsequently filter down to our assessment tasks.*” Potentially this means that new students might not feel as overwhelmed. Additionally the new process will involve all assessment tasks being tracked across the four years as well as the “*variety and level of expectation that is being asked of the students*”, thus providing all staff with insights as to what is happening in all the courses.

A different view on expectations came from SW10 who found that although “... *online was hard, that you couldn't get a draft marked so you were on your own for assignments, was hard.*”, but focussing on the assignment was not hard:

I was used to writing essays and stuff like that; it was quite complicated but our tutor really helped us a lot with that. But I did find that he explained the first one in more detail than the second one, which was probably why I didn't do so well on the second one. I had more tutes on the first one.

It seems that this SW was fortunate to find a tutor who had the personal time to assist her. Leathwood and O'Connell (2003, p. 610) name as one of the “struggles” experienced by the students in their study the difficulty of finding a lecturer who had time to help them. SW10 elaborated on the issue of receiving support:

In the first assignment I felt pretty confident because I had M (her tutor) there and he checked my work and I had my other friend who was able to tell me if I was on the right track. I was less confident with the other one, being on prac and not being sure I was on track. I wasn't feeling too good about that one...A few of us missed the last couple of tutorials and would have wanted a couple of extra weeks to do the assignment. Next time I will ask for that extra time. We were all quite stressed at the time...M said he couldn't give an extension for prac.

She might have had a time management issue, but in line with constructivist theory she is performing appropriately in that she and her friends are collaborating and supporting each other. Leathwood and O'Connell (2003, p. 599) write strongly about the discourse that constructs a student as,

...an autonomous individual unencumbered by domestic responsibilities, poverty or self-doubt. Such conceptualizations are not only gendered, but also rooted in white Western cultural constructions of an independent self

(Leathwood 2001). The independent learner is, of course, essential at a time when ‘the under-resourcing of teaching has meant a shift from “fat” to “lean-and-mean” pedagogies, with reduced tutorials, increased tutorial size, and less student contact’ (Blackmore 1997: 92), and is also indicative of the new subject of free-market neo-liberalism, fully responsible for his/her own ‘choices’ and future.

SW10 was not an “autonomous individual” and according to current thinking in PFT, supported by Constructivism, no student should have to be, yet Leathwood and O’Connell’s (2003) comments provide valuable insights when considering that the SWs in this case study are mostly women, mostly mature age, mostly FIF and mostly had had no previous experience of university. Of the eighteen in the sample, sixteen were women, ten identified as mature age, eight identified as FIF (one’s parents had post school diplomas), five identified as low OP/TER scores, and two identified as low SES. Of the five interviewed one claimed to come from a professional family. Of the five interviewees, only SWs 10 and 18 did not have family obligations and SW3 has a small child. Furthermore, only SW10 was an on-campus student. Most of the SWs in my sample would fit Leathwood and O’Connell’s (2003, p. 599) description of other, or non-traditional students.

The argument is familiar – letting in the masses creates chaos and pollutes the pristine and pure university environment. Non-traditional students are pathologized, in the same ways as the working classes have always been (Skeggs, 1997; Walkerdine, 1990), as being deficient: in ability, in not having a “proper” educational background, or in lacking the appropriate aspirations and attitudes.

They are arguing for a change in attitudes to so-called non-traditional students in the UK and the arguments in this thesis are supportive of their approach. My interviewed participants generally fit the profile of the “other” described in Leathwood and O’Connell’s (2003) study. However, three of those interviewed have graduated, one has dropped out for now and the fifth is persisting at this stage. They have overcome their challenges and shown resilience in the face of the mainstream characterisation of them as “other”.

According to Bye et al. (2007, p. 141), SW10, a traditional student²⁹, is more likely to be motivated extrinsically because of her age and stage of development and will therefore be less likely to persist. She is also more likely to approach her learning and reading superficially and just do enough to get through. She reported having got good grades and was not especially challenged academically. In the interview, when discussing her decision to take time out of university, she said that she had “*not found it that interesting, learning how to teach English...*” It seems she was not engaged with the course or the material. Tinto (2006-2007, p. 4) observes that “...engagement, matters and it matters most during the critical first year of college” (Tinto, 2001; Upcraft, Gardner, & Barefoot, 2005). Perhaps it is not surprising that SW10 did not persevere with her studies in Education at this stage, except that she also said: “*I ask a lot of questions in class– I would often be the only one asking questions.*”, which suggests a higher level of engagement with the subject matter being taught. However, Bye et al. (2007, p. 144) cite Sansone and Smith (2000) who suggest that traditional students, who are more likely to be strongly extrinsically motivated, are more likely to ask procedural questions than content-enhancing questions that would indicate engagement with the content and intellectual challenges of the course. The latter type of questions would be evidence of HOTS. The notion that the asking of questions suggests more engagement might however be optimistic. What has been said about this happened in the interview and there is not always time to go back and explore meanings further, as it does not always occur to the interviewer, in the moment, that something ought to be further interrogated.

Referring again to Collier and Morgan (2008, p. 430), who conceptualised the potential dissonance between student and staff expectations in terms of role mastery and cultural capital, SW10 showed evidence of not having internalised the concept of her role as a student although she had had some training at her school. She expected to receive more assistance from her teachers at university and more flexibility. She remarked that in the future she would ask for more time to hand in

²⁹ I have defined her as such because she is young, straight from school and went to a Catholic school where she was prepared for university. However, she is FIF and therefore non-mainstream or non-traditional, with the disadvantages that the literature suggests belong to that status.

her assignments and clearly expected that she would get it although her tutor had told her that extensions were not awarded for absences on teaching practicum. SW18, in her resistance to referencing, also shows a problem with her acceptance of her role as a student. The expectations that students will know how to reference correctly and will support their opinions and conclusions with references was addressed directly in interviews.

7.2.2. Referencing.

This is one of the qualities of academic discourse mentioned by Wallace et al. (1999) and was identified by the SWs as a challenge. It is an important issue for new students (Gourlay, 2009, p. 182; Green & Agosti, 2011, p. A-28; Haggis, 2006, p. 522). It is also mentioned a few times in the interviews and there was more discussion in 2.6.1 and 5.3.2.2.

When SW3 was asked to develop her thoughts about referencing she said:

I found it really pedantic, I do understand with regard to plagiarism but I found the different styles confusing, Like in-text references, it is difficult knowing how to put the full stops in the right place...I found losing marks was a bit unfair, but just had to accept that it was what it was.

This represents a move towards accepting the discipline of the academy, but she is not alone in her frustration. The attitude expressed here also reflects the problem some new students have in accepting that their ideas must be supported by the literature and their sense of personal rejection when they are required to support their ideas. Brinkworth et al. (2009) and Crisp et al. (2009) develop the idea that students' initial expectations are very different from what they had experienced in school which leads to misalignment between themselves and the academy. SW18, who was almost a traditional student, had strong views of the effects of those sorts of constraints i.e. referencing, on her creativity. Perhaps the difference in their ages has something to do with the more philosophical approach of SW3 who was a mature age student. SW10 was a traditional student who did not seem to find much about her first experiences challenging but found that APA referencing "was *something to do.*" However, she understood why it was necessary and was comfortable with it.

7.2.3. Writing.

SW3 raised the issue of the actual writing. Lea and Street (2006, p. 369) wrote about the need for students to write in ways that were required by the institution. SW3 said here that she had to change the way she wrote or spoke so that she could demonstrate academic literacy and confront the power relations she experienced in the academy. She had ambitions about joining the academic community and this suggests she is analysing the moves she must make to do this, albeit probably unconsciously. Incidentally she also reflected on the need to use an appropriate register in her writing. Elander et al. (2006, p. 78) develop theory about register in academic writing and cite Fabb and Durant (1993):

Our choice of register when we write displays our attitude towards our reader and towards the subject matter we are writing about...One of the main characteristics of the register appropriate for academic writing is that it does not resemble the register of conventional speech (Fabb & Durant, 1993, pp. 72, 74-75).

Bizzell (1995, 2005), Fernsten (2005), and Priest (2009), among others, have addressed the power relations students confront in the university and how their own voices seem to have little value. Constructivist pedagogy requires that the changing demographics of higher education institutions will need greater acceptance of the cultures the students bring with them and find ways to value the “many voices” that accompany those cultures. Bizzell (2006, p. 322) argues this point,

... the diversification of academic discourses enables not just new styles but new ways of thinking, new modes of analysis, and these new discourses are emerging not simply because academics want to make their analyses clearer to broader audiences but because the new discourses enable new kinds of analysis that are needed now to cope with new exigencies confronting our society. It will also be important for university teachers of the future to find ways of helping students find their own voices within the necessary constraints of academic culture.

This does not imply dropping academic standards but rather diversifying and extending access.

7.2.4. Information Technology.

In the months since these interviews were undertaken the world of information technology (IT) has grown and continues to grow so fast that it is almost impossible to imagine a beginning student having difficulty functioning in a digital universe.

Yet three of those interviewed, two of whom were the younger ones, commented on how there were IT issues to be confronted at first. However, they all asserted that they quickly learnt what they had to know and overcame the difficulties. The university IT departments are continuously working at making the digital environment more user-friendly and this is critical, especially for students beginning their studies as online students.

7.2.5. Reading.

The amount of reading they were required to do was another challenge they experienced. Collier and Morgan (2008, p. 435) include a reference to a student in their sample, finding that they were too time poor to do all the reading required and in other first year experience literature it has been found that first year students often have unrealistic expectations around, amongst other things, their potential workloads (Brinkworth et al., 2009; Scutter, Palmer, Luzeckyj, Burke da Silva, & Brinkworth, 2011). Bradley et al. (2008, p. 73) comment on declining satisfaction rates as reported in the Course Experience Questionnaire (CEQ) which covers areas “such as the nature of the learning experience, whether workload levels hindered deeper forms of learning and the impact of the course on the desire to continue learning”. Part of the picture about workload has to do with assessment and how it is conducted. The SWs were invited, in the interviews, to comment on how they were assessed which is reported on at 7.2.2.

SW3 found the amount she had to read was...

Phenomenal, there were such amounts and in a short space of time and the amount we had to retain and understand. I found that quite overwhelming. But I have learnt to pick out the bits of info I need that are relevant, you learn processes and develop strategies.

She found that researching had changed her way of viewing the world, and it had made her more critical. SW10 found that although she had been to a good school she was not prepared for the amount she had to read, which was “*different from school*”. By contrast, SW1, found that although she was “*not that good at reading and picking it up*” there had not been a lot of reading and she was able to rely a lot on the

recorded lectures. Finally, SW18 put her finger on what is crucial to success in the first year and that is finding a balance:

It was hard to find a balance between course readings, text books and all of that and also trying, with each course, to figure out what is integral and what isn't. I don't look at all the tutorials. For this course I found the tutorials I needed to be going to were with yourself. With some of the others it was a challenge to figure out what was really important to be across to get 100%.

She has pinpointed a couple of issues that only individual students can settle for themselves, namely what is crucial in the course and how to get across it. Students must find some form of autonomy for themselves to make academic judgments perhaps such confidence can only come from a high sense of self belief, which highlights the need to bolster the self system.

7.2.6. “Getting the right answer” and self belief.

In terms of demonstrating their understanding of the subject matter “getting the right answer” was another theme generated in the interviews and experienced as a challenge. Kohn (2004, p. 8) wrote about his experiences as a high school teacher who tried to change the atmosphere of his classroom from one of passivity to one of challenge. “There is a striking difference between a lesson— and, over time, a classroom — whose purpose is to train students to provide correct responses and one whose purpose is to promote deep understanding.”

Smith (2012) writes about her experience as a writing teacher in a community college in New York where she designed a process which guided her students to discover that there are no “right answers” and that it is possible for them to have defensible opinions that differed from hers and from their peers. Kandlbinder and Peseta (2009), identified five key concepts central to learning and teaching in higher education. These involved encouraging reflective practice, constructive alignment between learning and assessment, encouraging deep approaches to learning as opposed to surface learning, “bridging the gap between the academic’s understanding and the students’ learning” (p. 24) and finally assessment-driven learning. Which is potentially a positive practice, Cheng (2004) in their first chapter in Cheng (2004, p. 15), say that “Teaching that fits the cognitive, constructivist view of learning is likely to be holistic, integrated, project-oriented, long-term, discovery-

based and social. Likewise testing should aim to be all of these things too.” Cheng et al. (2004, p. 24), cited Gibbs and Simpson (2004/2005) who examined the conditions under which assessment supports learning. Their intention was to use assessment evidence to help university teachers diagnose potential problems with their courses, make changes in assessment to address these problems, and then evaluate whether the changes have positive impacts on student learning

This issue is closely allied to the SWs’ sense of efficacy as discussed in the Marzano descriptors in 5.3.1.2 where their sense of efficacy was coded. How students could achieve it was also described where relevant. However, SW18 raised it as a challenge in the context of having difficulty with referencing.

Yes one of the challenges as well was that I felt I had to be getting the correct answer rather than giving my own response. It was less about – you know in the 1st assignment where I had to come up with a stimulus question and work with my own ideas but this assignment when I was analysing the teacher talk I found I was sort of parroting the right thing and I found that a little bit harder for me to understand.

It seems that SW18 was too afraid to use her own experience and knowledge in case it was not what was required, thus dumbing down her responses. For her this “parroting” (or mimicking) (Bourgeois & Hess, 2008)³⁰ in relation to her own voice became another theme in the interview and occurred also when she talked about referencing, as noted in 7.2.1.2. Her conflict between writing what she hoped was the correct answer and what she really thought suggests a possibility that somewhere in her experience of writing this assignment the point of writing a “critical” analysis of two pieces of discourse was missed. It was a complex assignment and the students were presented with a range of possible structures for their responses. However, they were free to interpret and analyse according to the texts and theory prescribed for the course, but they were not limited to that. Indeed, they were encouraged to read beyond the prescribed texts, yet she felt...

³⁰ Bourgeois and Hess (2008) wrote about how people mimic those with whom they want to ‘affiliate’, their behaviour is usually unconscious. I have extrapolated here that this student consciously mimicked what she assumed was desirable behaviour in order to do well in her essay.

...that assignments are structured so that you just have to reproduce the course to show that you have understood it but not give like a genuine response...I just wanted to get free. In this second assignment, I just thought I had to produce what I was supposed to, like the scaffolding model and reference like Culican, Bull and Anstey. I knew I had to add those things in but sometimes I would just prefer to reflect.

It seems that this interviewee had the right idea in wanting to be able to reflect, although this might not have seemed immediately appropriate in the task to which she was responding. This might suggest problems with the task as much as with the SW. If this SW had been taken “backstage” like Kohn (2004) advocated,³¹ she might have felt empowered to describe her reflections on the issues in the transcripts. From the point of view of a teacher who marked many of those assessments, such reflections, supported by theory and suitable texts would have been welcome. She continued thus:

It's OK, just talking to you, I have realised a few things about the way I go about writing and that sort of thing It has sparked the idea that I don't think that academic writing necessarily shows the thinking process because I know that I will cut out my own ideas to mould it to something to get a better mark. I don't think that's right, I don't want to have that in my classroom. I think it's important to give students different ways to show their thinking and I think it's a shame that a lot of subjects I am doing, do that, they are teaching me their ideas but need to give students an opportunity to show their ideas and I hadn't thought about that much. They don't give me the same opportunity.

This last comment is crucial to this research and clearly identifies a potentially weak area in the process being undertaken here. It underlines the need for oral data and for ways to include the student voice. It suggests that the major assignment did not test her grasp and deep understanding of the principles of literacy teaching. It also suggests that in general she finds that to conform to “what they want” is the better way to go about approaching her assessment, thus denying the validity of her own voice and self belief. Research from other countries and institutions supports her feeling that her identity is not important; it is a common sensation and students need

³¹ Kohn suggested that teachers should model the behaviour they wanted their students to display and that this could be done by taking the students ‘backstage’ to see them dealing with the same sort of problems as they set their students.

to be assisted to find their voice within the assessment requirements of their institution (Burgess & Ivanič, 2010; Fernsten, 2005; Gourlay, 2009; Ivanič et al., 2007; Priest, 2009). This feeling was represented in the data earlier when SW1 was asked if she ever felt that her own voice was being silenced (5.3.8.1).

In a different direction SW16 was not sure if she was “*analysing it the correct way. I think I doubted myself a lot in those ways.*” This was followed up with a question about her sense of her own efficacy and she said she did have a problem and wanted to be sure to be able to *get it across the right way. I think I did, I did struggle with that to begin with. It was also the first Literacy subject that I dealt with.* She showed the diffidence and insecurity that many beginning students demonstrate. She echoes the SW18 and SW1 interviews, in the sense that she is trying to get the right answer but is also doubting herself. However, by the time of the interview she was confident that she would know what she was doing in the classroom. SW3 came at the issue in a similar way but without the sort of self-doubt expressed here. She claims to have been daunted by *a language I had never heard before...I battled to get what it meant, it took a lot to get my head around it but once I did I felt I was equipped and could get on with it.* On the issue of her voice being silenced she was not concerned, it was clear that she was only interested in giving the right answer. I asked her if she ever felt limited and her response was:

Yes, it is a common thing, I stick to the rubric and materials provided, I write what they require. There was one where I went off a bit, the Indigenous Perspectives course, where I was really interested. And was shocked by what I learnt there. It was a good course, I had more confidence...normally I just use what has been advised by the lecturers.

Interviewer: Did you ever feel frustrated?

Not frustrated. Just trying to tick the boxes and play the academic game, do what's required. I work through the rubric and will stick to it because markers will be using it.

Interviewer: Is it a systematic process

I was not really that aware at first but then I discovered the rubric and used it when I understood it properly.

SW1 spoke about how initially she was unsure of how to go about things but then learnt to use Google, the forums, and how to contact the lecturers. SW10 did not

seem to have problems with self belief, as she had learnt to write essays at school and if she could get the help she needed from her tutor and her friends she was comfortable with assuming her success and she got it. What seemed to be missing in all the above responses was the practice of aspects of academic discourse described by Wallace et al. (1999, pp. 15-21): “an interest *in knowledge for its own sake*, critical thinking, *exhaustive enquiry*, *specialised knowledge*, *disputation*, openness, tolerance, reflection, *scepticism*, honesty, *respect for intellectual property*, collegiality, critique and academic freedom”. My emphases highlight the specific gaps. It could probably be argued that those gaps will be filled when the students have become more sophisticated in the ways of the university, but they are worth noting when course designers and developers are creating their new courses and want to encourage all aspects of academic discourse.

7.2.7. Social and academic engagement.

Some of the intellectual demands made on new students have been reflected upon but there is also the issue of isolation in a large institution. SW10 was the only on-campus student in my interview data sample and she provided some evidence of the importance of social contact. The others, except for SW18, were mature age students and commented on their use of online forums and opportunities to communicate with lecturers. They did not seem to feel unduly alienated by being online students and claimed to be highly motivated, a characteristic of older, non-traditional students, which is probably what carried them through. SW10 did find social interaction helpful though, and enjoyed meeting people when she attended Orientation (O) week:

Yes it was OK, I actually started doing Law and only made one friend but when I started Education I was a bit more comfortable...it was a bit daunting at first when I didn't know anyone else...In O week we had a few interactive games...that was really good to meet others in your cohort. Then you meet them in class the next week and kind of a have a chat to them...

The First Year Experience Literature has many references to the importance of enabling beginning students to make friends and develop social contacts (e.g. Kift et al., 2010; Laird, Chen, & Kuh, 2008; McIntyre & Todd, 2012; McIntyre, Todd, Huijser, & Tehan, 2012; Nelson et al., 2012; Tinto, 1997; 2006-2007; 2009).

McIntyre et al. (2012) described a pre-orientation programme which prioritised building social connections and then McIntyre and Todd (2012) demonstrated in a longitudinal study how effective that programme was. Tinto promotes the use of social methodology in the classroom, which sounds akin to Vygotsky's sociocultural theory, which in turn relates to the concept of the ZPD, all of which requires children and students to interact with each other. (Kozulin, 2004) Laird et al. (2008) noted that Higher Education Institutions (HEIs) that performed better than expected in terms of their first-year students progressing had an emphasis on the social aspects of learning as well as providing social support to their students. SW10 mentioned that other students helped her succeed in her assessments. *"I had a very good tutor, knew a few kids...like, it was a bit daunting but had people who helped me to find my way around the assignments. Without them, I would have struggled a lot more."*

The final challenge raised in the interviews was the issue of understanding the course.

7.2.8. Understanding the course.

SW1, who had done a TAFE course, remembered some of the challenges of the literacy course;

Yeah I think particularly the last assignment was on a comparative essay and I had never done that before, that was like "what on earth are you talking about?" (laughter) "how am I going to do that?" Because like I said when I went to school essays were, like, write a story or write about a project or something you've learnt. There was no analysing, no comparing, none of this higher order stuff that I've learnt at uni. So that was a real challenge for me...what is this comparative thing?

The essay was a comparative essay but it was also supposed to be in the genre of critical analysis, which would have required higher levels of HOTS than a simple comparative piece. She was expecting a different standard from her previous experience and (Ambrose, Bonne, Chanock, Cunnington, Jardine, & Muller, 2013, p. A-127), in their study of students transitioning from TAFE to university, found that "Students spoke about the new emphasis on theory and higher standards of academic writing, and the need to work more independently. ...The learning environment was not only different, but daunting." Earlier in their paper (p. A-121) they cite Pearce,

Murphy, & Conroy, 2001 who identify “[a]reas of difficulty involved in this pathway [as involving] sudden changes in the depth and detail of subject knowledge, pedagogical approach and assessment, and the level, genre and independent nature of academic research and writing”.

Tickell and Smyrnios (2005), in their study about predictors of academic success among accounting students, suggest a variation on this experience of different standards. They found that the cohort coming from TAFE to university tended to suffer from “transfer shock”, which caused their performance to compare unfavourably with the cohort coming directly from Year 12. However, this changed as the students progressed and they ascribed this initial drop in performance to transfer shock caused by the differences between TAFE and university, especially about the friendliness of the learning environment. SW1 was not a direct transfer student, and her TAFE course was unrelated to teaching, but it is interesting that her TAFE experience encouraged her to “have a go” at university study.

SW16, a teacher aide, introduces another aspect of the challenge of understanding the course. It resonates with what the literature tells us about many first-year students’ experience.

One of the things I found really hard at first was breaking down (assignments?). But I could go to my principal and say I don’t really understand what that part really means...I suppose too, like some people, the younger you are you don’t want to say you don’t know things...That’s what I used to think: what is really expected of me here?

A common issue with beginning students was raised here and it is addressed by Haggis (2006, p. 523) in her study of differently prepared students. She argues that

...beginning students at all levels, no longer necessarily ‘know what to do’ in response to conventional assessment tasks, essay criteria, or instructions about styles of referencing. Rather than seeing this situation as an indication of falling standards, or of the need to ‘dumb down’, [...] it implies the need for a change of perspective.

The change of perspective that she advocates relates to creating a curriculum that more closely relates to what the students already know and can do, and which responds to her observation:

The question in relation to learning then changes from being ‘what is wrong with this student’ to ‘what are the features of the curriculum, or of processes of interaction around the curriculum, which are preventing some students from being able to access this subject?’ (p. 532)

SW16’s discussion of what she found hard reflects this:

I suppose I’m really a maths person. Everything was laid out. Whereas literacy was different. There are so many parts of it. It’s not just reading and comprehending, it’s when you’re writing you need to understand your grammar and your punctuation. It’s just so much more and I think as much as what I learnt from university I still think I needed to read more and understand more and thought if I really want to teach this, am I really teaching it the correct way? I don’t think you can expect to get all the answers from university.

She reflects on her own process and the observation that she “*is really a maths person*” throws some light on her somewhat technicist view of literacy. The difficulties she had with the literacy courses are addressed in part by Haggis (2006, p. 532) who argues for a change of orientation on the part of academics and for understanding that differently prepared students might not see the nature of the process in the discipline:

Crucial aspects of process may be quite opaque to students. (Lillis & Turner, 2001) How for example, is an essay question to be read? How are instructions about what to research embedded within such a question? How can academic texts be read in a way that allows understanding to emerge? How does a writer overcome the sense of exposure that writing often evokes? None of these questions is about ability, or even preparation.

Bowl’s (2001, p. 157) study of non-traditional students entering higher education in the UK found a similar sense of confusion to that expressed by SW16 (*There are so many parts of it (literacy)*). She felt that she had not learnt enough in her degree and needed to study more. She is thus blaming herself for what she sees as some sort of failure. She has adopted the prevailing discourse of “what is wrong with the student?” (Haggis, 2006). In addition, her sense of needing to know more because she didn’t learn enough at university is an indication that she has a more expansive view of the profession, but her mathematical bent is again evident in wanting to have the right answers in terms of how to teach. The sense of confusion typical of a new student is reflected in her words: “*Probably when I started I did a lot of things that I didn’t really understand how they all connected together...*” SW3 similarly “*found it*

very complicated and confusing...the SIC was completely new to me; I had never heard of it, but once I found what it was it made sense, how to scaffold questions and learning in that way.”

In spite of the challenges they had faced the majority of the SWs interviewed had progressed in their studies and were able to provide insightful comments on the subject of assessments based on their significant experiences.

7.2.9. Assessment.

Assessment was raised in the interviews in the context of how the SWs experienced it and how they thought it could be developed, rather than as a challenge. So, it does not appear in a table as “an issue”. Their comments cover views on relevance, different modes of assessment and the use of the rubric. The idea behind asking SWs to comment on this was to add to the richness of the profile of the SWs and discover more about the contents of their VUBs. Their attitude to assessment relates to their self system skills: their sense of importance, emotional attitude to their learning and sense of their own efficacy, which add up to their overall motivation. If they were only concerned with getting the right answer and satisfying the rubric they were implying that their sense of their own “voice” was either not desirable or not relevant. There is research that promotes the idea that students need to be assisted to find their voice within the assessment requirements of their institution. (Burgess & Ivanič, 2010; Fernsten, 2005, p. 82; Gourlay, 2009; Ivanic et al., 2007; Priest, 2009). Elander, et al. (2006, p. 82) quote Bonnett,

The ability to engage in argument is what makes learning exciting. To feel comfortable with debate changes your relationship with education and just about everything else. It transforms you from a passive and bored receptacle of another’s wisdom into a participant; into someone who is neither scared by, nor indifferent to, the society around them but actively involved in its interpretation and transformation’ (Bonnett, 2001, p. 1).

Students would not be encouraged to “play it safe” in an environment where the expectation of them engaging, prevailed. Their need here, to “get it right” suggests a restrictive environment which would not be what the staff on the course being studied would have wanted to hear. Assessment is also a site of difference for transitioning students who have come from non-academic backgrounds; Whittington,

Ebbeck, Diamond, and Hoi Yin Bonnie (2009, p. 32) surveyed students transitioning from TAFE to university in South Australia in a project focusing on early childhood education students and observed that:

Assessment was perhaps the site of greatest contrast between the two programs, with university essays considerably more complex and challenging than assessments students had previously encountered. Once they had learned the necessary skills, students said they felt proud of themselves.

Integral to the practise of assessment is grading and the tools that must be used to ensure fair and equitable grading practices. Central to this is the use of rubrics which is a site of controversy in academia. Some writers express fears on the subject:

(Andrade, 2005; Chapman & Inman, 2009; Lombard, 2011; Mansilla, Duraisingh, Wolfe, & Haynes, 2009; Panadero & Jonsson, 2013; Turley & Gallagher, 2008; Wilson, 2007; Wolf, 2007), all express fears that rubrics limit the students' creativity, promote shallow thinking and do not necessarily promote learning.

However, all, except for Wilson (2007), who is steadfast in her objections to the use of rubrics for assessing writing, also promote the potential value in the use of rubrics for enabling more autonomous learning, the potential for collaborative learning and generally for enhancing the learning and teaching experience. They also promote their use so that more detailed feedback can be provided to students more timeously. What is also clear from that selection of writers is that the jury is still out about the value of rubrics. A lot of conditions are given for them to work well. Another issue related to this, is the use of other types of assessment than the conventional essay. Poehner and Lantolf (2010, p. 312) describe learning processes in Second Language Acquisition (SLA) using Dynamic Assessment (DA) which "... posits a dialectical relation between instruction and assessment. Specifically, joint activity intended to reveal a learner's ZPD and the provision of mediation to support continued development..."

The relevance for thinking about alternative assessment is that the learner co-mediate with the instructor in the ZPD, whose task it is to guide the learner towards the "desired outcome in a way that encourages the learner to take as much responsibility for the joint process as possible, to withdraw support when appropriate, and to reintroduce it when needed." That would be the lecturer's role

with the students when they were negotiating their course. Vygotsky, grounding his theory in the writing of Marx, posited a dialectical view of humans and their social and cultural worlds according to which understanding and intervention, or transformation, are integrated processes. At the level of practice, the ZPD represents a powerful framework for realizing this dialectic wherein the provision of mediation to learners encountering problems they are unable to resolve independently not only provides important insights into the diagnostics of their development but also advances their current level of ability (Poehner & Lantolf, 2010, p. 327). While not suggesting a novel *method* of assessment, Poehner and Lantolf (2010) are suggesting a view of the learning and teaching process and relationships that resonates with lecturers practising constructivist pedagogy.

The following discussion is also relevant to the discussion in 7.3.3 but is not included there because it does not arise out of the lecturer interviews.

SW16 discussed the relationship between assessment and the reality of the classroom.

I must admit, not so much this subject, but some of the subjects the assessment could be a lot different. I would hear online some of the younger students getting so excited about some sort of assessment and I think to myself, when you get into the classroom it isn't like this. Some of the assessment was out of touch with some of the children in the classroom. They thought they were going to sit the children down and settle it all up and it would be so perfect and that was it.

The link between theory and practice needs to be addressed. Zepke (2013a, pp. 8-9) quotes Walker (cited in Entwistle, 2010, p. 68):

Yet, students enrol in higher education to gain subject or discipline knowledge to achieve life goals. To help them achieve these requires “a teaching approach which begins to satisfy simultaneously a tacit demand for content, for understanding of content, for *relevance and applicability of that content ...*”

Kandlbinder and Peseta's (2009, p. 20) investigation into “the concepts that designers of courses in higher education teaching and learning consider to be key in their foundational subjects” relates to this issue. Their second concept was **constructive alignment**, according to which the purpose of the learning is

appropriately assessed. SW16 was critical of some of the assessment in her course on the basis that it did not align with the students' experience and needs. However, she also said that this criticism did not apply as much to this course. In this assignment students were expected to produce a comparative critical analysis of two pieces of pedagogical discourse in terms of what they had been taught about appropriate classroom discourse. It provided an indication of what the SWs had learnt about the nature of valuable teacher talk and gave them an opportunity to identify some typical classroom problems to which they were supposed to respond with constructive commentary.

Kandlbinder and Peseta's (2009, p. 23) third concept **was student approaches to learning**, and the authors focussed on surface and deep learning and problematized these concepts. At least one interviewee, SW18, seemed to engage in surface learning in the second assignment although her approach to the first assignment, and subsequent remarks about the application of what she had learned in this course to other courses, suggest that she was not always a surface learner.

Interviewer: How did you go with the different theories, the scaffolding interaction...the different moves...how did you find that?

SW18: It wasn't hard but again I was just writing what I had been taught in the course materials to get the right answer and get the right marks. I don't think I engaged with it enough. But I think if I had engaged with it more or roleplayed it with other students it would have been better.

L3 in her interview was asked to comment on the above and she agreed "*I think that realistically if they haven't been in a school it is difficult to engage in that level of analysis and for it to be real to them. I think it was just too early.*" On the other hand, in another conversation, L1 said that she thought that that SW, who had not been out of school long, should have been able to imagine the scenarios without much effort. Both attitudes are reasonable but while these SWs said it was difficult, they all passed the assignment comfortably. Ideally students should find the assignment accessible and easy to understand so that they can focus on developing their arguments and writing. The degree of complexity would then be up to them to provide. A model table of how the transcripts could be analysed was provided so all the SWs had to do was develop their stance towards the episodes in the transcripts

and support that. Several videos showing classroom events that modelled the theories being taught were also shown in the tutorials. SW18 still found it difficult.

Interviewer: So was it sort of taxing your imagination do you think, or taxing your ability to envision something.

SW18: Yes I could not really envisage it and was just focussed on it in that situation I couldn't really apply it to anything else. I was just trying to get it right.

At this point in the interview we both looked at her assignment and she experienced an interesting insight and showed that she was also a deep learner.

The other thing, looking at the assignment is the part about the IRE sequence. That has come up quite a bit again, in the other courses I have done, I can see now how that was important. Because it was at the start of my uni journey, I didn't really see how to apply it but now I can really see that it makes sense especially now that I have been on prac. I can really see how the teacher talk affects the children and what you are trying to teach them. Questioning as well. At the time I didn't really think it was important but now I do. If I had been doing the subject alongside a prac it would have made more sense to me.

The point is the alignment between the SW's perceived needs and her actual engagement with the course. Her personal response to the assignment showed surface learning and what she perceived as a lack of alignment; however, her later response showed both deep learning and constructive alignment in that what she had learnt aligned well with its purpose as her comments showed. Although this research is attempting to define what SWs generally can do when they start at the university it will never be possible to develop a finite description of what each one of them can do.

The comments made by SWs in section 7.2.1.6 about getting the right answer, indicate assessment-driven learning which is the the last concept Kandlbinder and Peseta (2009) discussed and is where those interviewees seem to have placed themselves. This approach has potential value for enabling lecturers to evaluate their courses and potentially improve them for the benefit of the students:

Gibbs and Simpson (2004/2005) examined the conditions under which assessment supports learning. Their intention was to use assessment evidence to help university teachers diagnose potential problems with their courses,

make changes in assessment to address these problems, and then evaluate whether the changes have positive impacts on student learning. (cited by Kandlbinder & Peseta, 2009, p. 24)

The question would be whether the lecturers and examiners were alert to the issue and would put the evidence in the essays to the use suggested above. Many issues militate against this; most assignments must be set for the duration of the course, potentially a few years, as must the support materials. Nevertheless, the rubrics, readings and tutorials can be changed, and often are, depending on the results but cohorts change from year to year so there is no continuity or way of testing the result of changes in relation to a specific cohort. Furthermore, the programme is based on modules which do not necessarily articulate with each other³², and in the case of this course the final assessment is handed in at the end of the semester, so changes cannot affect the current students. In this course, significant changes were made in subsequent iterations of the course, mainly in the tutorials and additional support materials.

From the lecturer perspective, they can use assessment for developing their courses and programmes and from the student perspective Kandlbinder and Peseta (2009, p. 24.) suggest that feedback could contribute to the improvement of their performance. However, it was clear from the ways in which the SWs spoke about their need to get the right answer, that it was all about getting good marks in the assessment not necessarily about learning. The term is assessment-driven *learning*, so a student who is doing what s/he is doing just to get the best marks, not necessarily to demonstrate the best learning, introduces another dimension which reflects on their awareness of what they are supposed to have learnt in the execution of this assignment. SW10 is a good example of this. She passed the assessment but had no memory of what it had been about six weeks later.

In relation to the above the TEMAG Report raises an interesting point:

³² The revised curriculum that is in the making at this university will be changing this and more is said about it later in this thesis.

Traditionally the role of the teacher was to deliver the curriculum and the role of students was to learn. The teacher then used assessments to establish how much the student had successfully learnt. Hattie suggests that teachers need to move away from considering achievement data as saying something about the student and start considering achievement data as saying something about their teaching. Assessment is a source of data that can inform teaching strategies. Throughout the consultation the Advisory Group heard strong agreement that pre-service teachers must learn how to collect, use and analyse student data to improve student outcomes and their own teaching. (p. 39)

There might be the possibility of lecturers using assessment data to inform their teaching and thereby exemplify good practice for their students. HOTS could be part of that achievement data and student feedback could feed into lecturers' practice as well.

According to L2, the team developing the new BEd programme at this university has built the teaching and assessing of thinking skills into the new programme that will be scoped and sequenced throughout the four years. The possibilities of a range of ways of assessing skills and knowledge is also up for discussion, and they are trying to come up "*with a variety of ways of assessing, more oral presentations, video, bricolage, anything that allows them to demonstrate their learning...*"

The SWs were also asked about assessment being presented in different modes and SW3 responded with enthusiasm about a multimedia assessment she had produced for which she received full marks. She felt it was less restrictive than writing an essay and gave more scope for introducing her own ideas. Predictably, SW18 agreed – she also saw using different modes as possibilities for showing her own ideas and considered that generally she is required simply to reproduce the course content. SW10 had not given the matter much thought but when prompted suggested that producing a movie might be possible. The use of the rubric was given strong attention by SW3 as mentioned in 7.2.1.6 as well as in other places. It is clear from what SW3 said that she found the rubric an essential guide to getting the best possible marks and keeping her focused on the topic of the assessment. The one time she felt confident to go off the rubric was in the Indigenous Perspectives course where she was strongly engaged and interested, otherwise "*I just use what has been advised by the lecturers.*"

7.2.10. SWs personal backgrounds.

This is a snapshot of additional details of the SWs who were interviewed. Of them, one, SW10, was a traditional student, she had come straight from school, and has since dropped out for a while. Another, SW18, was borderline traditional in that she came to university straight from school but then changed courses and entered the workforce, did a TESOL training, used that briefly, and then went to university. Her “passion” was mentioned in 5.3.2.1. She also worked full-time. SW3 (in childcare) and SW16 (as a teacher aide) both also worked full-time. The two of them and SW1 are all mature age students, and are also all FIF students. Only SW18’s parents had any post-school qualifications, namely art diplomas. Based on the above they are all at risk students, yet, they have all so far succeeded except for SW10. The latter has dropped out, but not because she failed, she reported significant success in what she had done.

Other significant information was shared in the interviews: SW1 was motivated to give university a try after she had done a TAFE diploma and thought then she might be able to do what she had always wanted to do since she was a child, be a teacher, so she enrolled. Then when her son graduated with his degree and it was said that he might be a role model for his children she thought *“Aha your mother’s going!...That was a bit of inspiration. If they can get through it I could too.”* SW3 *“took about five years to pluck up the courage...”* She migrated from England where she had not even done O levels but had started working in childcare, which brought her into teaching. This shows the range of pathways that bring students into university but in the case of education students, the common thread seems to be that they care about the education of the young and want to be part of doing it better. Reverting to the Marzano descriptors, this suggests a strong sense of importance,

They were also asked how what they have been learning in the university classroom (also relevant to 7.3.3.) relates to their experiences as teachers in school classrooms. Their responses covered diversity, literacy and scaffolding. SW16 mentioned that she had noticed that there were not a lot of children from different cultures in the classes where she worked but there was a range of different abilities. She also spoke about her first job as a teacher in her own classroom:

Where I am going to teach, some of the literacy I am going to teach will be L4L, Learning for Language it won't be totally the Australian curriculum, it is based on that, but you are looking at children from different cultures and nationalities. It will be a learning curve

SW1's experience of the Indigenous Perspectives course has already been mentioned (in 5.3.8.1). She and SW16 both referred to their understanding and intentional use of scaffolding and the ZPD. SW16: *"Even though their answer may not be exactly to what the point is you can use that and sort of build...on what they have told you and sort of analyse it and explain.* SW1 referred to her experience on teaching practicum: *"I think that's my thing really to get them to be able to do the thing independently and building up the steps. One of the things I have had a go at doing that has helped kids."* In a slightly different direction SW18 mentioned how her employment in the cancer clinic has enhanced her empathy and listening skills. She commented on that earlier as well (5.3.1.3.). The *virtual school bag* also featured here, and SW16 said that *"it helps to motivate them if you can help to relate it to them."*, while SW18 has *"...used that in further courses especially differentiation and inclusivity."* This provides a full picture of most of what the SWs said in the interviews. A story developed that suggests that these SWs are mature and caring. Based on the interviews as represented in Figure 5.1., their HOTS were well represented, it is therefore not surprising that they have succeeded in their studies. This gives credibility to the suggestion threading through this study that developing incoming students' HOTS could enhance their experience and progression.

7.3. Staff Interviews - Teacher Education

The next section is an analysis of the interviews of the three staff interviewees, each of whom provided a unique perspective on this research. L1 was the original course examiner of the literacy course under discussion and responsible for the design of the assessment. L2 is now the Co-ordinator Primary Programmes and had extensive responsibility for leading the design of the new programme, thus providing a wide overview, and L3 taught the literacy course for all its iterations and provided a close-grained picture of the student experience from the staff perspective.

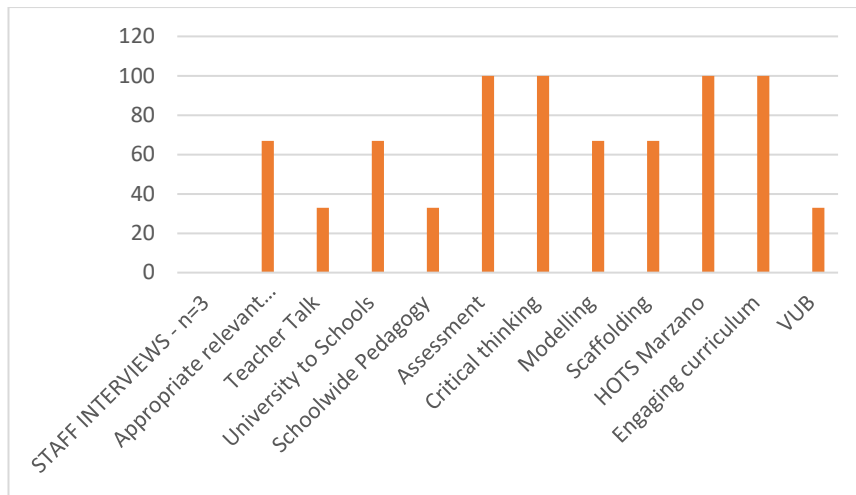


Figure 7.2. Percentages of staff who engaged with the issues they raised in their interviews..

7.3.1. Appropriate relevant courses.

The courses included in the teacher education curriculum must include professional education, preparing students to function as teachers in school classrooms, but at the same time they need to address the provision of a measure of general education as well. An example of this was mentioned by L2 who noted that “*we are admitting a lot of people into the education space that don’t have the skills of discourse that they need so we propose a communication course in first year where they will look at remedying that.*” They also need to acquire subject specific knowledge about education theory and policy as well as research skills and the ability to present themselves as university graduates in the wider community. General teacher behaviour was also mentioned in this interview; noticing and mindfulness were suggested as behaviours that could be taught as part of the curriculum. L1 makes the point that practising mindfulness would enhance students’ self system thinking as well as their metacognitive processes, thus increasing their possibilities of progression in their studies. Students who learn to think about their thinking and who see examples of practitioners “tuning in” to their children’s thinking on a regular basis would be encouraged to see how it is possible for children to construct knowledge.

In relation to teacher-talk Levin, Hammer, and Coffey (2009) provided background to novice teachers and the practice of noticing in the classroom. They make an

important point about the context of the lesson and the ways in which the teachers “frame” the process. They explore case studies in which intern teachers recorded their lessons and analysed their recordings. Two contrasting teachers were highlighted; one ran an orderly classroom in which the children were schooled into providing the right answers whereas the other had some management issues, but she reflected answers back to the children and encouraged constructivist dialogue around the content being learnt. This is their comment about their first case study:

The transcript reveals a pattern of triadic dialogue, a conversational routine of teacher questions, short student answers, and teacher evaluations.³³ It is common in classrooms, but here as in general, this form of participation is high in quantity but low in quality (Lemke, 1990). Kay did not notice either the nature or substance of the students’ participation; she did not recognize opportunities to probe their conceptual understanding (p. 143).

The overriding attitude in the school was that the teachers had to establish routines and then attend to students’ thinking. The researchers argued that Emma had a routine:

Emma used a routine of reflecting students’ meaning back to them for further comment. This “reflective toss” (Van Zee & Minstrell, 1997) is a powerful routine for attending to student thinking. The reflective toss was modelled in the science pedagogy courses, and many of the interns who were successful at attending to student thinking engaged in this kind of dialogue with their students. The point is that *routines should be learned from within a framing of teaching as attention to student thinking*. (My emphasis) We argue that if attention to student thinking is not prioritized until after novices begin to construct routines (as suggested by Kagan, 1992), then novices may construct routines that distract from attention to student thinking (p. 152).

³³ Also referred to as I-R-E, for “initiation–reply–evaluation” (Mehan, 1978). It is a dialogic process that the students in the course referred to in this study, were taught to recognise. They investigated this as the basis for understanding Bull and Anstey’s 3 pedagogical styles illustrated in short dialogues of reading lessons, one of which was IRE/guess what’s in the teacher’s head, and one that was just keeping children busy (looking at the verbs) and one that was scaffolding the students’ learning. Then they went on to examine how teachers were making ‘cognitive moves’ and how these were reflected in the dialogue in Rose’s Prepare, Identify Elaborate (the Scaffolding Interactional Cycle SIC) as opposed to the IRE. It makes perfect sense that this should be something to avoid in a classroom as it is completely teacher-driven.

In a related direction, Bernay (2014)'s research shows that beginning teachers who practised mindfulness found that they noticed more effectively, were more relaxed and confident and changed the ways their children learnt by being more creative teachers. It is all about removing the "sage from the stage" and becoming the "guide on the side" (King, 1993).

Levin, Hammer, and Coffey's (2009) idea of "a framing of teaching as attention to student thinking" fits well with the notion of first year students arriving at university with knowledge, skills and expertise that need to be identified and shaped into what the university requires of them for academic success. The focus on what the children in Emma's classroom are thinking and how they are thinking about the subject matter is critical to enable them to develop HOTS, especially metacognition, but also self system thinking. Like the children, university students in a learning situation would also be likely to develop strong motivation if their teacher interacts with their thinking processes and draws on them to develop knowledge and understanding. This brings the discussion back to the VUB and the importance of university teachers accessing the contents to use them for assessment as well as in their planning and expectations.

L3 described a process she used that would be exemplary for the sort of university teaching that could be advocated for the future.

That is a starting point...to try and understand what they know about either the children or the context or the content. So, what they are thinking is very important. A strategy you use is to get them talking around issues to find out what they know and understand about those issues. So, talking about topics is very important and building their confidence to speak about the content as well and do so in an informed way which would mean encouraging them and to read the readings and other materials or presenting them with other information by video or other examples of what that might look like in a classroom context. So, a mix between the visual mode as well as reading for information. But situating that so that they feel it has importance and links into their intended profession.

What L3 describes above is textbook strategies towards promoting engagement and progression. She activates their sense of importance (Marzano, 2001) and develops their persona of teacher in training through the strategies she uses in her teaching. She engages in developing their HOTS, encouraging them to develop their sense of

efficacy, and develops their academic discourse abilities with getting them to read the prescribed materials, and then develop the persona of student and student teacher by linking them to their intended profession (Lizzio & Wilson, 2013). She expected them to behave like students and read and discuss “*in an informed way*”, thus developing their sense of themselves as university students. The practice of participation described above, links with O’Donnell and Tobbell’s (2007 p. 327) study of adult students transitioning into university. In her teacher education classes L3 found that...

...although attempts were made by course tutors to “teach” certain study skills to students through dedicated classes, the students only truly began to make progress in the learning of these skills by actively engaging in them. This demonstrates that learning and participation are not events but rather processes that happen over time and place.

TEMAG, the Craven Report into teacher education Australia, has devoted an entire section, Section 3 in their report, to the need for universities to provide an aligned professional experience in their curriculum. Despite covering all the possibilities about placements in schools, they do not mention the possibility of student teachers seeing themselves as professionals in training throughout their time at university. When Professor Keithia Wilson addressed a First Year Community of Practice meeting at USQ, she said that they implement that sense of being part of the profession with nursing students from the first day at university, they should see themselves as “nurses in training”, which could apply as much to education. It might enhance their experience of studying to be a teacher if they are psychologically orientated towards what it might mean to be a teacher from the start of their studies. With reference to the new programme being developed in this university, L2 put it like this:

An embedded quality is the importance of being a professional across the four years, the ways in which they interact with each other, their lecturers and then with their mentors in the schools. We didn’t have this emphasis in the past and the idea is to use it as a theme to unpack communication skills early in their experience.

The students in L3’s classes would appear to be having an appropriate learning experience. Through engaging them in the ways she has described she will intuit

how they are thinking and engage in their Zones of Proximal Development (ZPD) (Daniels, 2001), thus enabling them to move into the next level of understanding.

In a broader perspective, the institution-wide planning process to which L2 contributed had as part of its protocol that all courses would be available for all lecturers to study and make connections between them and their own courses. In this way the students would enjoy a coherent, clearly sequenced learning process.

L2: ...all courses were written and cross-checked against all the key messages across the whole four years. So we have now scoped and sequenced right from micro to macro skills what is required from a teacher and we have tried to get some coherence and some flow of what is going to be in first, second, third and fourth years, covering off all the learning areas as well as all the micro skills that are required of a good quality teacher.

The incoming students who will benefit from this sort of planning should have more scope for expansive learning and get a better sense of how their learning fits together and relates to their future profession.

7.3.2. Teacher talk – “dialogic pedagogy”.

The Literacy course in this study is also about teaching students about the importance of “teacher talk” or “dialogic pedagogy”. There is much evidence in the earlier part of this thesis particularly in Chapter 5 where the HOTS in the essays were analysed, of how well the students have grasped the importance of this behaviour and how too much teacher talk and inappropriate questioning diminished the engagement of the children. In the interview with L1 the issue of dialogic pedagogy was raised and related to the concept of metacognition, which is taught explicitly in the better schools.

It is brilliant – this came in to give people the words to talk about these things. It is dialogic pedagogy. There was talk about the ramifications of teacher talk in the 70s. It was around a bit in the literature, but not very much. So therefore no one was thinking about it...It applies to all conversations, even doctors are well known for not engaging with real meaningful talk. Actually examining the dialogue, shows the quality of the pedagogy....

At the heart and centre of this case study is the comparative critical analysis essay written by the SWs and which constitutes some of the data analysed in terms of this

theoretical framework. It is the outcome of a planned course in a larger curriculum designed to train teachers. This course and the assignment which it was testing is about classroom talk. The students had been well educated in the theory that defines talk moves made by teachers in the Scaffolding Interaction Cycle (SIC) (Culican, 2005), Bull and Anstey (2003)'s Three styles of Pedagogy, the Initiate, Respond and Elaborate/Feedback discussed and critiqued in Campbell and Green (2006, p. 88), the scaffolding process captured in Vygotsky's ZPD and in Edwards-Groves and Hoare (2012), *inter alia*, the theory of explicit teaching.

Learning to teach literacy is a fundamental task of all teachers and the planning group at this university have embedded the teaching of literacy across the board. The TEMAG document recommends that all teachers should be prepared to teach Literacy (Recommendation 17, pp. 17, 38, 42). Furthermore, all candidates for entrance to the programmes must show proficiency in literacy; they must be in the top 30% of the population (Recommendation 13, pp. 17, 33, 34). The Report also mentions that "submissions strongly supported the explicit teaching of literacy as a requirement of all initial teacher education programs". A significant amount of space was given to a discussion of the *National Inquiry into the Teaching of Literacy*, which culminated in an observation of the importance of pre-service teachers being able to "assess and adapt their own teaching practices to achieve the best learning outcomes for their students". Not much was mentioned about training to teach literacy except that for secondary school teachers it should be embedded within the subject areas. There is, however, a clear requirement that all trainee teachers should have high levels of personal literacy and numeracy and be able to teach them where necessary. L2 reported that the planning group at this university...

...has adopted three English courses rather than two and we are proposing a selective strand of three additional English courses for Primary. Students would then choose English, Maths, Science or Languages as electives to beef up their background, and might find themselves a leader in their curriculum area in their school, ultimately. It's a nice way to cover off on English. Not literacy, it is now English. Literacy is embedded in all the courses and the same with numeracy. We are back to English, Maths, Science, etc...

Returning to the current situation, L1 spoke about the importance of the literacy course and literacy in general as well as learning the "language of the profession".

This (course) is where they transition into the profession and learn the language of the profession especially about literacy, which is so important. If they can't read, they won't get anywhere; it impacts on health as well. It fits into the big picture of the whole journey and that transitional pedagogy is so important to get the foundation in and pitched at the right level and related to the reality of the classroom.

7.3.3. University to school (classroom) – TEMAG.

The university where the assignment under discussion in this thesis was set, is in the process of re-structuring their teacher education programme in terms of TEMAG and have launched a collaborative process which is reflected, to some extent, in the work of Uchiyama and Radin (2009) except that the Uchiyama and Radin process took place in real time whereas the USQ one is being planned for time ahead. Their account of a curriculum mapping exercise, involved similar processes and found that it had some unexpected outcomes They wrote about a collaborative curriculum mapping exercise and one of their participants said the following: “I began to look at the mapping as a way of bringing life to the syllabus, that it was not only a work done in isolation where I thought something was done “right” or “wrong”, but all the work done in the process of collaboration, which of course we know is the strongest way to have collegiality.” (Participant F) (Uchiyama & Radin, 2009, p. 277)

Then in their section on data analysis:

We analysed our interview data, survey data, and observation notes employing Miles and Huberman's (1994) four step process: “underline key terms, restate key phrases, reduce the phrases and create clusters, and reduce clusters and attach labels” (p. 87). The clusters of collaboration and collegiality unexpectedly emerged across all data sources. (Uchiyama & Radin p. 277)

This is an optimistic view of the potential outcome of the planning process and the participants claimed that they benefited intellectually and that their courses became more streamlined and relevant to the students as well.

The perspective of TEMAG provides a comprehensive theory for teacher education in Australia and has been influenced by many of the major theorists in this field as well as representatives of major community organisations. One of the first issues raised in the TEMAG document is who should be trained to be a teacher, what

attributes should they demonstrate, and how would those attributes be discovered? This aligns directly with this study's aim to discover what they can do when they start their teacher education course. TEMAG has a few recommendations in this regard, which impact directly on who will be allowed in.

A recommended criterion for admission to the programme which is mentioned a few times in the Report is that the candidate should have the appropriate personal attributes. TEMAG recommends that,

...all providers must use a blend of sophisticated approaches to select entrants that have both the academic skills—including literacy and numeracy skills—and the desirable personal attributes for teaching. Providers will be required to publish their selection processes for all initial teacher education programs to justify that they are selecting those best suited to the teaching profession on an appropriate basis. (Craven et al., 2014, p. 15)

According to current selection processes those “sophisticated” approaches can include “psychometric testing”. Potentially some of the HOTS could be included in this space.

Research suggests that for a person to become an effective teacher they need high overall literacy and numeracy skills, strong interpersonal and communication skills, a willingness to learn and the motivation to teach. Recognition of these characteristics can allow providers to recruit entrants most likely to be effective teachers, while increasing confidence in those going into teaching through greater scrutiny and transparency. (Craven et al., 2014, p. 33).

TEMAG is about preparing teachers for the classrooms of the future, and L2 paraphrased some of the TEMAG observations:

...but what we got out of the general criticisms of the whole university sector was that we have become a bit of a law unto ourselves and believe that we are the people who know most what schools need. Whereas in fact we haven't gone back to schools and asked them for a long time and schools have been grappling with the fact that the teachers who arrive in their schools in their graduation year then have to undergo a whole lot of upskilling. Or they don't have systemic things that are prioritised across states on the go. They are not ready for it. The new approach TEMAG asks us to be more conscious of is almost like an apprenticeship model for what teachers need when they get out.

The list of public submissions to TEMAG includes a substantial number from representatives of schools and school teachers as well as universities, so the TEMAG recommendations should reflect what schools need and are asking for. There are also quotes from submissions in the Report. The possibility of a mismatch between the student teacher's university experience and their practicum experience, as reflected in L2's remarks above, is echoed by the SW interviews. SW16 reflected for example on her expectation that her younger student contacts in the forums would find teaching practice difficult because she felt that their university experience did not prepare them. She was a teacher aide and had the necessary classroom experience. SW10 said this about her experience on teaching practicum: "...*definitely an eye opener to see what teachers actually do, like for preparation, testing and stuff with children with learning difficulties...really opened my eyes to how much work teachers actually do, ... and was daunting to me.*"

At least teaching practicum takes place during their university course, which gives students time to come to terms with what to expect when they finally enter the profession. Mentoring, L2's apprenticeship model, is given specific attention in the TEMAG document in the Key Proposals, Recommendation 32 and in discussions about induction. A range of models is mentioned, and it is clearly something that is going to feature strongly in schools in Australia in the future. If the recommendations are carried out and trained mentor teachers are in place in the schools in the future to support student teachers, this will significantly enhance their learning experience and conceivably develop their self system skills, which the research and analysis in this thesis have shown to need developing.

The idea of an apprenticeship model is also reflected in Section 3 of the TEMAG Report (Craven, 2014, pp. 37-49), *Preparing effective teachers – integration of theory and practice* but this section is mainly about recommendations for content of the teacher education programmes. They focus on the use of evidence-based pedagogical strategies; preparation for diversity in the classrooms; being able to use assessment for guidance as to how to provide effective instruction; stronger background and expertise in subject content – in literacy, numeracy, science, maths and languages - and the ability to engage with the school communities. Nothing is

said about the presence or absence of HOTS in prospective candidates, this is a silence in the document. It would be a positive step, given the discussion in this research, if they were testing for HOTS as well. As part of the self system thinking includes a positive emotional attitude to the knowledge they are expecting to gain as well as their sense of their own efficacy, the importance of their studies and their overall motivation. It would be a positive step if HOTS were to become an aspect of curriculum design.

Cochran-Smith (2005) feared that where equity issues and teaching for democracy are not part of the curriculum, and where outcomes are based on pupils' test scores, they will not be a real indicator of what a new teacher can and does do in a classroom. Her concluding scenario is an enlightening set of ideas to put beside the TEMAG report as it includes optimistic notions of schools being places where democracy and equity are the norm. Cochran-Smith (2005) wrote about what she called The New Teacher Education and sent up flags of concern about "policy research, evidence-based decisions and the emphasis on outcomes". It is a paper with complex arguments that highlight the good and the bad about the three areas, but there are resonances with the Australian situation as well as for this research.

In summary her concerns are that teachers educated in this "New" system will not have a training experience that prepares them for work in "hard to staff" schools so the children in those schools will continue to be taught by a floating population of teachers who are all looking for more comfortable positions in suburban schools, that equity issues and teaching for democracy will not be part of the curriculum, and that outcomes will be based on pupils' test scores and will not be a real indicator of what a new teacher can and does do in a classroom. She concludes on a more optimistic note with a hypothetical scenario for the future:

We now have many routes and pathways into teaching, but all of them have the core components necessary for teachers to learn to teach in the service of students' learning. These components were identified through dialogue within the profession and in the public arena. Quantitative and qualitative evidence was considered alongside arguments about teaching as an ethical and moral activity. There were debates about ideas and ideals for our society. Many people came to agree that, particularly in light of changing demographics, *education that promotes basic skills and critical thinking for everybody was necessary to preserve our democracy.* (My emphasis)

Teacher education scholars and practitioners in all routes and pathways now collect evidence about their work. But because the focus is on learning opportunities as well as learning outcomes, policymakers pay attention to resources as well as test scores and performance measures. *Social justice and equity are common words in the discourse* (my emphasis) because they are seen as worthy outcomes in and of themselves and as the foundation of a successful education system.

Nearly all of the alternate entry paths are now closely connected to universities, schools, and communities. It turned out there actually were some important goals of teacher preparation that universities did particularly well—such as helping teachers understand the social and historical patterns that created the existing system (thus helping them understand how to produce change); teaching about the relationships between culture and schooling; *getting teacher candidates to examine deeply held beliefs and expectations about children*; (my emphasis) and familiarizing teacher candidates with the latest scholarship about learning, pedagogy, and language. It also turned out that there were major goals of teacher education that could only be met in schools, such as learning to design instructional tasks; using classroom data to make decisions; and creating and managing classroom environments that bolster learning. It was also realized that many goals were best met in the intersections of universities, schools, and communities. Over time, it became clear that very few of the really important goals of teacher education were accomplished through programmed learning at for-profit training centers. These eventually faded away.

Every year, a popular national news magazine ranks the top 100 teacher preparation providers in terms of how well their teachers do at creating rich learning opportunities for all children and teaching toward the democratic ideal. (My emphasis) Since these criteria determine the rankings, everybody works really hard toward these goals, (Cochran-Smith, 2005, p. 15).

This complete hypothetical scenario was included because it resonates so strongly with the concerns of this researcher and the goals and ambitions of PFT, namely to enable a range of diverse students to succeed in their studies. For the curriculum to be engaging it needs to relate to the students' lives and ambitions, and it needs to value HOTS such as their motivation, ability to monitor their efficacy and learning processes and demonstrate empathy that will enable them to communicate well with their own students in their own school classrooms in the future. The scenario also adds a dimension that is not present in the TEMAG document which is about social justice and equity being an important element in the preparation of teachers.

Villegas (2007, p. 378) tackles this issue with specific reference to social equity and teachers' dispositions³⁴.

... while schools have made progress over the years to become more equitable, they continue to structure inequalities for some students; that knowledge is value-laden, partial, tentative, and constructed by the knower; that learning is an active process by which learners give meaning to new input based on their prior knowledge and experiences; that teaching involves supporting students in their attempts to make sense of new input by helping them build bridges between their prior knowledge and experiences and that input; and that *teacher candidates*, like any other learners, *construct their understandings of learning to teach based on the beliefs, knowledge, and experiences they bring to their formal preparation as teachers.*(My emphasis)

She has something valuable to say that resonates with PFT and the VUB and that concerns issues of social justice in terms of the wider inclusion agenda of the government and the universities, which has already been raised in this thesis. The above only provides part of the SW's university experience, the other part is what happens in the university classrooms and learning spaces.

7.3.3.1. The university classroom.

The university classroom is where the students engage with the university curriculum and both SWs and lecturers in this study had some important observations to contribute about HOTS as well as the processes involved in training them as teachers.

L3 reported that when mature age students arrived in her classes they seemed to...

...have a wider base of experience and seem to have opinions about what should be learnt by children and how classrooms should operate. I think students coming in from school³⁵ tend to relate it to their own feelings about

³⁴The word 'dispositions' is used once in the TEMAG document (p. 54) in the context of recommendations for graduate assessment (Queensland College of Teachers, 2012, p. 26)

³⁵They are referred to as "traditional" students -in this study.

their experiences or haven't considered some of the ideas we present and therefore are reluctant to join in the conversation.

Kahu, Stephens, Leach, and Zepke (2013, p. 800) found that older students as well as distance students were “better able to integrate their learning with their work experience”. Statistics were not available but anecdotally a great many of the mature age students coming into the Education Faculty are teacher aides which would go some way towards explaining their behaviour in L3’s classes. Many of them would also be parents and might have opinions about how their children should experience school. As far as Kahu et al.’s (2013) research is concerned, if the anecdotal evidence presented above is credible then mature age students’ ability to integrate learning and work is also supported.

The SW interviews reflect that what they had learnt in the literacy course became clearer and more valuable to them in the school classroom, which suggests that linking the course with teaching practice experience would be useful. Even SW16, who had had a lot of classroom experience, found that she had to work with the concepts and apply them in the context of the assignment before they became clear to her. This thinking is supported by Walker (cited in Zepke, 2013, pp. 8-9): “The need for a relationship between theory and practice and the relevance of the assignment to their course is obvious”.

It might seem obvious that the connection between theory and practice is important and that the theory should “come to life” after some hands-on classroom experience. However, later in the interview L3 said that a student who worked systematically through the materials and attended the tutorials, even without attending teaching practice, would have understood the relevance of the assignment. While she contended that there was a need to scaffold the assignment, the SWs in the interview data who had done the assignment in the earlier iterations of the course, where there

was less scaffolding (SWs1, 3 and 16), did not express a need for extensive scaffolding.

7.3.4. Schoolwide pedagogy.

Many other important issues relating to teacher education in general were raised in the interviews. It was considered that the teaching of HOTS was important as well as mindfulness, dialogic pedagogy and noticing. Ways in which schools have transformed themselves were also mooted and in that context, it was considered important for students to be prepared to take their place in schools where school-wide pedagogy is practised. This issue came through strongly in the staff and the SW interviews and the issues raised from both groups have been integrated here and earlier in Chapter 4. Focus on the teacher education curriculum has arisen in government circles, partly because of schools finding that they needed a different sort of teacher to be able to improve their results and in the process, their schools. School wide pedagogy SWP was developed and reported upon. Stoll (2007), Conway and Andrews (2016) as well as Andrews and Lewis (2005) were the core theorists consulted for information about school improvement and the sort of teachers needed. Stoll (2007, p. 41) described far-reaching changes arising from the application of SWP in a primary school:

The experience of staff members in this kind of environment is also rich, multifaceted, and respectful. The shared commitment to learning releases professional energy, distributes professional knowledge, engages professional commitment, and unleashes creative forces. It keeps issues and challenges from escalating to extreme levels, and it promotes school-wide ownership of decisions, directions, and outcomes. Expanded opportunities for professional growth and development increase the chances of success and raise professional confidence and competence. Staff members of all work categories are encouraged to take initiative, to take risks, and to make autonomous decisions, and they are supported as they move forward into new and challenging territory. The excitement of their own learning energizes their work with students and parents and provides positive role models for students and colleagues.

SWP in action is demonstrated in the same book in the chapter devoted to a case study of schools that have changed in significant ways:

The facilitators, working with the teachers in the IDEAS³⁶ team, engaged the staff in the processes of inquiry that lead (*sic*) to the creation of the Newlyn³⁷ pedagogical framework: a shared vision, underpinned by shared teacher, student and parent values, and a schoolwide pedagogy... The vision is full of meaning for the school, capturing the future the Newlyn school community collectively aspires to create. The underpinning values work with the vision to set the direction while the school-wide pedagogy provides the way for the school to build the future that has been envisaged. Teachers talk of this framework as providing a clear direction and sense of common purpose, ‘allowing us to have our own way of teaching... (Stoll, 2007, p. 135).

This presents a theoretical vision of an ideal school which operates democratically and transparently as well as accountably and values its members’ contributions. If such schools are schools of the future, teachers who can operate in that environment will have to be trained for it.

7.3.5. Assessment.

Assessment will continue to be debated, however there are areas of substantial consensus. The section on assessment in the SW interviews 7.2.2 covers some of this, some core studies and scholars (Kandlbinder & Peseta, 2009; Poehner & Lantolf, 2010) have been cited. Craven et al. (2014) importantly note that:

Hattie suggests that teachers need to move away from considering achievement data as saying something about the student and start considering achievement data as saying something about their teaching. Assessment is a source of data that can inform teaching strategies ... (p. 17).

L3 made some trenchant comments about the amount of scaffolding provided for the students writing the essay under discussion here.

She suggested that the cognitive challenge might have been too great but that the students were up to the challenge as long as they...:

³⁶Innovative Designs for Enhancing Achievement in Schools – IDEAS.

³⁷Name of the school.

... work(ed) systematically through the course they had sufficient scaffolding to manage it but I still feel that there was a lot of scaffolding in the coursework to get the final outcome, and you would have to question, if you have to scaffold to the nth degree to try to help people pass, perhaps there's another way of assessing them?

Perhaps the amount of scaffolding came from the lecturers' desire for the students to succeed and over the various iterations of the course multiplied to a point where it was not necessary. At this point the question of alternative modes of assessment provides an interesting direction. It is a thread in this thesis that both the student and staff interviews address. The issue relates to ways of thinking and being able to assess student's knowledge in ways that would demonstrate their thinking. Related to this was the idea that it might be possible to co-construct the curriculum with the students as Gibson (2011) was able to do with her students. This was not a novel idea to L3,

I used to do that with the fourth years in times gone by in a pedagogy course in the first week, where we reflected on what we had learned so far and talked about the gaps and what we would like to have covered. As a result of what the group decided then we were able to include extra topics because that is what they saw they needed. I think it is very interesting sharing such design.

Another option might be to use Dynamic Assessment (DA), already discussed in 7.2.9. but which bears repeating it... "...posits a dialectical relation between instruction and assessment. Specifically, joint activity intended to reveal a learner's ZPD and the provision of mediation to support continued development are fully integrated in DA" (Poehner & Lantolf, 2010, p. 312).

The relevance of this for thinking about alternative assessment is that the learner co-mediate with the instructor in the ZPD, whose task it is to guide the learner towards the "desired outcome in a way that encourages the learner to take as much responsibility for the joint process as possible, to withdraw support when appropriate, and to reintroduce it when needed" (Poehner & Lantolf, 2010). That would be L3's role with her students when they were negotiating their course.

Poehner & Lantolf (2010) are suggesting a view of the learning and teaching process and relationships that resonates with L3's practice and potentially with many others in the new programme currently being developed. A novel method of assessment

was suggested to L3, namely roleplay, and she was enthusiastic about that possibility,

Ideal... very engaging, because then you are catering for a range of talents and ability. And then catering for what has been lost in recent years – oral presentation - which going back five or six years you always had one oral when everyone was on campus.

L1 reported (in a personal meeting) that she had used role play to good effect in her tutorials, and that it had had the effect of bringing the students to a real sense of what was happening in the extracts. They remembered their own experiences with teachers like Mr Hammond and could visualise themselves in a classroom. SW18 introduced the idea of role play herself and is supported by DeNeve and Heppner (1997, p. 244). A critical factor in these ideas is the involvement of the students in the process. Costa (1984, p. 61) comes to the fore again with his idea that “Dramatisation serves as a hypothesis or prediction of how that person would react in a certain situation.” Closely related to assessment is the topic of critical thinking.

7.3.6. Critical thinking.

The lecturers were asked about their own focus on encouraging critical thinking.

L3 responded:

It really varied, I suppose there wasn't a lot of critical thinking overall if you are looking at on campus and online students who were not in their 1st year or were mature age. The latter were inclined to be more critical and more opinionated about how literacy should be taught in a classroom. I found students in face to face mode straight from school were generally a little disinterested. The first 2 modules were quite jargonistic and were probably not an ideal way to transition them into the conversation, but that has changed over time.

L1 described an exercise developed in a fourth-year early childhood course where the students go out on teaching practicum and must think of a metaphor that represents their teaching; they then turn it into principles and implement the principles and get evidence from their five weeks of professional experience, which shows how they have implemented their principles. They must record and analyse a lesson as a test of the implementation of their principles. The lecturer found that 60% of the teacher talk was at the giving directions level. This supports the comments

made earlier about how hard it is for novice teachers. They are on practicum and feel they must impress their mentor teacher, so management is important. This is clearly an area in which improvement is needed for critical thinking, noticing and mindfulness to be valued in the schools, and for the students to be empowered to practise them as well as ‘manage’ their children in the classrooms.

7.3.7. Modelling.

The issue of modelling was covered in two of the three staff interviews. It is a vital aspect of teaching students what is meant by the theory. L3 felt that those students who were taking the literacy course in their second or third year, or who had been on teaching practicum, found the issues more real and were more engaged as a result because they understood the relevance of the knowledge they were acquiring in the course. L1 spoke at length about how they managed their tutorials on campus. They showed relevant videos and discussed the cognitive moves the teachers in the videos were making that modelled the teaching point and then the students would role play what they had seen, thus experiencing a sort of reality. Unfortunately, most students taking this course were studying online and that sort of experience was more limited, particularly as subsequent course examiners had different styles of teaching. Also, international students who came from transmission-style educational backgrounds found this sort of pedagogy very difficult to relate to as it was so different from their experience. L1 said:

... it is also important for students to learn to speak the speak, to use the jargon meaningfully to get a firm understanding of the concepts and how and why certain behaviours are valued. It is up to us to provide a depth and quality of learning experiences that will help them to move their thinking and help them recognise what “noticing” means. It is like moving children from the pre-operational stage to the stage of cognitive operations.

As Piaget argues, it can’t be forced, it is a development process. (Singer & Revenson, 1978). In modelling it is necessary for lecturers to demonstrate clearly and consistently what is supposed to happen to enable students’ HOTS to absorb and operationalise the appropriate behaviours, part of which is changing attitudes. L1 recounted an anecdote in which a child improved enormously in a reading recovery programme and her teacher still assumed that she would fail. Lecturers too need to demonstrate belief in their students’ ability to master the skills being taught. If some

sort of assessment was practised that modelled the target skills, such as faith in their students would not be tested but would be evidenced as they went about the assessment. Chun (2010, p. 24) writes about performance assessment:

...the ultimate goal of teaching is the development in students of transferable skills and knowledge. Arguably, if they complete ... sufficient performance tasks, students will not only master the content knowledge and skills for a particular course, but they will also gain the practice they need to be better critical thinkers when they face novel scenarios or problems, either within the same domain or across domains.

His claim that their critical thinking skills would also be developed is worth considering when planning and designing new courses and programmes and would arguably enhance their experience of performing the assessment by being relevant and engaging.

7.3.8. Scaffolding.

L1 and L3 had varying views on the issue of scaffolding in the course under discussion and both reflect on the students' experience of writing the assignment. L3 considered that the students were provided with so much scaffolding that it almost created a template for them, which did not create a real learning experience. However, L1 viewed the sort of scaffolding differently as in her view it consisted of a series of inputs, videos and descriptions of real lessons, that demonstrated the principles being taught in the course. The debate is redundant now as the course will not be taught in that form again, but it is important to keep the issues in mind when creating new courses. The quality and interest of the students in the course will indicate the type and quantity of scaffolding required but a foundation literacy course such as this one has very large numbers, which makes consistent assessment difficult across many tutors.

7.3.9. HOTS – Marzano et al.

Section 7 of TEMAG is the “crunch” with its call for collaboration on a national scale and the assumption that the Australian Institute for Teaching and School Leadership (AITSL) standards and procedures are what provide the detail for planners in initial teacher education. It is noteworthy that the development of HOTS is not mentioned in either document. Indeed, the word “thinking” is only used twice

in the entire document outside the references. It is possible that it is a given that thinking skills are part of what children should learn at school; however, it could also be a given that literacy is part of what children learn at school, yet the recommendations emphasise its importance many times. Similarly, as was highlighted in Chapter 2, HEIs focus strongly on the quality of students' English in terms of entrance qualifications as well as remediation and almost totally ignore their HOTS. Part of the value of this research is that it shows that even when students' English writing is not of a particular standard they may still show evidence of HOTS,

L1 responded to a question about the usefulness of using Marzano et al.'s work by saying that it would require many changes to the way such things are viewed currently. She saw value in making those changes...

...because just broadening their view of this whole metacognitive area would be worthwhile; teaching them to have a better understanding of just what the objectives are so that there would not be a simple traditional narrowish focus in the assignment.

This response indicates that using Marzano et al.'s analytical criteria could be of value in designing and assessing within the curriculum. It would not be an add-on but would be integrated into the teaching and learning experience. The next issue is how it is possible to engage and enhance students' self system and metacognitive skills in the curriculum. Zepke (2013, p. 5) writes about "student self-belief" and recommends a "strengths-based" approach to learning and teaching. This resonates strongly with the theory proposed in this thesis relating to the VUB and Marzano's self system thinking.

Part of the purpose of this research is to discover what new students can do that resonates with the demands of the academy so that academics might be able to capitalise on students' existing skills in their teaching and assessment. They could then teach and assess in ways that enable students to develop the new skills and discourses required for ongoing success. Marzano's descriptors of HOTS are all directly related to academic success but might not be the qualities that academics expect to think of as vital skills and behaviours for academic success. They go beyond the standard expectations of academic reading, writing and academic

discourse as they also focus on the students' emotional and intellectual characteristics.

Reason et al. (2006) conducted a large and complex survey of first year colleges and students in the US and in their distillation of all the results found that two factors were critical: firstly, "students' perceptions of the campus environment as supportive were the most powerful predictor of growth in academic competence" (p. 170), while the form of engagement most recommended was that "faculty members should provide opportunities for first-year students to engage in and practice advanced cognitive activities including opportunities to analyse, synthesize, judge, and apply information" (Reason et al., 2006).

L3 and her colleagues were doing both in that they provided a lot of support in the form of scaffolding, and what was being supported was cognitively challenging. The question then arose as to whether it was more challenging for online students than for on-campus students.

L 3. For some online students certainly but I am tending to think that the online students did better on that task generally, from looking at the report. This could be because there are more mature age students there than among the on-campus students.

There is research that supports this view and it might be that it was not only on that task that they performed better. They had to find their way without face to face tutorials and meetings with lecturers. Hart (2012) conducted a survey of all the literature that covered persistence in online students and found that some of the factors predicating success/persistence correlated with Marzano HOTS descriptors. Among them are viewing their education as important (p. 31); relevance and satisfaction (p. 34); and self-efficacy (p. 34). In addition, she found that the convenience of online study is a facilitating factor for online students who have families and jobs. Similarly, Rovai (2003, p. 12) has noted that "learner autonomy has been a hallmark of adult education and an assumed characteristic of the non-traditional students enrolled in distance education programs." It seems that L3's students were autonomous and that is echoed in SW1 and SW3's interviews. SW1 used the on-line forums and the internet and communicated with her lecturers, and came across as a motivated independent learner, as did SW18. SW16 was more

dependent on her colleagues for support and SW10 on her tutor, but of the four on-line students, three were autonomous.

Part of assessment is grading and L3 noted that she would sometimes look for the understanding underlying the faulty language.

Yes, I tried to value that understanding and differentiate, as you said, that people could write smoothly but at the end of the day when you peel it away there is sometimes not a great deal of depth. I do look for that difference for people who seem to understand the theory and put it into practice. And then you can encourage them and enable them to write more effectively.

When asked if some sort of marking guideline for identifying HOTS would be useful for her, L3 replied:

Yes, I think that would be very valuable and it's lacking from our course design, and what you're suggesting, as well as thinking about levels of cognitive engagement generally, in terms of Study Desk and conversation, I don't think we have enough guidelines or frameworks...to help us with structure and for us to reflect on our own teaching and the outcomes as a way of moving forward. Like we would be doing in schools, we're not operating quite the same way about course design which is still content-driven.

Meyers and Nulty (2009, p. 565) have published an article in which they provide...

...a framework of thoughts, ideas and information, to progressively enhance the sophistication of our learners' thinking. Thus, the assessment required for students to integrate, synthesise and construct their understandings in ways consistent with the discipline and the professional pathways on which they had embarked.

They reference a range of scholars who think about thinking but do not include Marzano et al. The development of a framework that would include Marzano et al.'s work is a potential future development, towards practicalising the thinking here and making it possible for academics to apply the work to their assessments and planning.

The next question related to the usefulness of a HOTS hierarchy like the one being used in this research. (Both 'voices' are included in the last interchanges because that creates a neat summation to this section.)

L3: I think it would be very useful and it is a very precise guideline, it is clear about the level of engagement. It would be a way of critiquing your own assessment task as well, wouldn't it? You might think "Oh yes there's HOT happening", but perhaps as you review perhaps not so much as you imagined. And it keeps a lot of information in the forefront. You might think I could have more about metacognition and looking at the breakdown in your descriptors some of the specific points that are outlined underneath. Yes, I would find it useful.

I think one of the advantages of what you're doing and the information in the article (Faragher & Huijser, 2014) is reminding people that students coming straight from school, as with children who have their virtual schoolbag, all the people coming in as well have something to contribute and it's a matter of enabling those students to transition across. So, it's a matter of being mindful of some of the aspects differentiating between their thinking and their writing. That is quite helpful in the article.

INTERVIEWER: I think that is a very important word you used, 'enable', because what we're trying to do is get the students to demonstrate what they can do so we need to set contexts that will enable them to do that. We are looking at what they do rather than what we want them to do. So the question is, what do they do when they tackle an assignment? I am trying to have a bit of focus on that so that people can use it.

L3: I think that the application of the Marzano descriptors is very useful and quite informative if you were using it as a regular guide and it would contribute to some kind of continuity across the kinds of assessments and the level and quality of assessment across a programme as well.

INTERVIEWER: How would you go about introducing this to your colleagues? There's a mindset involved here, where we have a huge body of literature that promotes the mindset, which is about what students do rather than what we want them to do. There has to be some kind of mediation between what they know and what we want them to know because we are the people who know what they need to know.

L3: I think that really it's how you go about that to introduce it at a preliminary meeting when looking at either course design or redesign and assessment for the course and we need to look at cognitive load and level of engagement and look at this particular framework for example and see what they think and how it could be applied. I guess if you'd applied it yourself and you'd found it useful then you can take the next step and introduce it to other people because you've had actual experience with it...would be the way I would go using it in a smaller course, which I run myself as a Course Examiner and found it beneficial; then I could take it to a wider audience.

L3: I think we're not addressing this sort of thing in our course design and as we go into the new programme there's a lot of talk about how to improve the students' level of engagement and trying to improve their cognitive load in

terms of what's happening, it's also timely in terms of what's happening at USQ.

7.3.10. Engaging curriculum.

Kahu et al. (2013, p. 792) provide some definitive phrases as guidelines to understanding this important concept in terms of its outcomes and evidence. However, they do not suggest ways in which this can be achieved.

... the dominant approach in tertiary education sees student engagement as both the time and energy students invest in educationally purposeful activities and ...

the effort institutions devote to effective educational practices' (Kuh, Cruce, Shoup, Kinzie, & Gonyea, 2008, p. 542). It is a multifaceted construct incorporating academic challenge, active learning, enriching educational experiences, supportive learning environment, staff and student interaction and work-integrated learning. Engagement theory suggests that both academic and social integration are essential (Tinto, 2006). Engagement is a key indicator of the quality of student experience (Krause, Hartley, James, & McInnis, 2005) and of institutional performance (Kuh, 2009a) and is positively correlated with a range of student outcomes such as critical thinking, cognitive development, self-esteem, student satisfaction and improved grades and persistence (Kuh, 2009b; Pascarella, Seifert, & Blaich, 2010). Trowler and Trowler (2010) go so far as to suggest that the 'value of engagement is no longer questioned' (p. 9).

Having observed the outcomes of engagement Zepke (2013b, p. 8) expands on how to promote engagement in the classroom:

Engaging teachers are welcoming, supportive of learning, facilitate students learning collaboratively and respect students coming from diverse backgrounds (Kuh, 2009). Hockings, Cooke, Yamashita, McGinty and Bowl (2008) found that students who are expected to reflect, question, conjecture, evaluate, and make connections between ideas are most deeply engaged. Teachers expecting high academic standards, supporting students to achieve these standards, and challenging them to "stretch further than they think they can" (Kuh et al., 2005, p. 178) enhance engagement.

This provides clear examples of the sort of behaviours that teachers can enable. However, the students must be receptive of the sort of pedagogies that will enable the behaviour. L3 noted that the younger students appeared to be reluctant to contribute to discussions. Bye et al.'s (2007) findings that traditional students are extrinsically motivated might provide further explanation here. They are said to be

more motivated by the prospect of “jobs, careers, financial opportunities, or societal expectations” (p. 144). Exposing themselves to their peers might not be an attractive prospect if all they want out of the experience is the above. The interview with SW10 raises some doubt about this statement in terms of her assertion that she asked a lot of questions, with the *caveat* that she indicated that she was one of the few doing this. What is not known is what sort of questions she asked. If they were procedural and not knowledge gaining then the behaviour does not display engagement as such. The AUSSE (2010) figures relating to questioning and collaboration in class suggest low levels of collaboration but not of questioning. What L3 says about her traditional students being “reluctant to join in the conversation” is partly reflected in the AUSSE figures. AUSSE does not distinguish between traditional and mature age students but it does between first years and later years and the figures improve for later years’ students. Nevertheless, the figures mentioned above suggest that enough students report not collaborating with their peers for this to be an area needing attention. Of course, this assumes that they attend classes. As mentioned by L1 there are always those students who attend tutorials at first but stop coming as soon as they have had the guidance they want for completing the assignments. It does seem to undermine the university’s agenda of enabling student teachers to become excellent teachers if they do not take the opportunity to learn the theory they need, to become the best possible practitioners.

7.3.11. Virtual uni bag.

On a slightly different note, Crossan et al. (2003) conducted a study of non-traditional adult learners and developed the concept of a learning career which “seeks to break with a linear concept of career as progression” (p. 64). “Our model of learning careers involves recognition that learning careers are contradictory and volatile. They do not travel in one direction alone, but can go into reverse, not once but many times (p. 65). ...

Participating in organised learning as an adult serves as a strategy for coping with the risks associated with contemporary career trajectories and at the same time, by enabling greater mobility, it gives rise to further instability and fragmentation of established occupational structures. (pp. 65-66)

The above extracts add value to our consideration of the online SWs in this course, as it does to the VUB idea. Our students are drawn from many different sources and it is possible that they may drop out and then return or that they may use what they have learnt in some other way in their work or lives. SW10 seems likely to fit this description once she has resolved her personal issues and has done her travelling and thinking. Whatever their movements, they will take their VUBs with them and will apply the skills and knowledge their VUBs contain. Figure 5.1 provides a snapshot of what are likely to be the contents of that VUB. Figures 5.4 and 6.1 indicate some possible detail of those contents and will be discussed in more detail in the next chapter.

7.4. Summary

The aggregated results of all the data analysis have been reported and discussed in chapters Five, Six and Seven, according to the descriptors in Chapters Three and Four. Using the building principles of bricolage has enabled the presentation of a view of the contents of the SWs' VUBs in aggregated form and provide information as to the HOTS and academic literacies that constitute those contents. The interviews produced fresh data that added to the data generated by the essays and introduced fresh themes that add value to the possibilities generated by responding to the research questions. These are gross results and could be tempered with a view of individual SW accomplishments using the descriptors in a future study.

CHAPTER EIGHT: THE CONTENTS OF THE VUBS

8.1. Introduction

This chapter will be structured around the core reason for undertaking this research. This arises from the Research Questions. Firstly how do first year students experience the demands of writing critical comparative analysis in literacy pedagogy? To answer this question it was decided to ask what the students can do when they join the university. This led to deciding to find out what academic literacies, including HOTS they had when they started. Then secondly, related to the lecturers' perceptions of the demands of the exercise as expressed in interviews much was said about how they supported the experience which went towards answering the third question about how PFT might enhance that experience. The results of the investigation into the HOTS and academic writing and discourse provided information as to how pedagogy for transition in the university can take some responsibility for those skills being enhanced.

What has been discovered in the research process? The theories underlying PFT have been thoroughly explored and built into the bricolage approach in this research project in the form of interrogation of the issue of engagement as well as the sort of support available for beginning students. Other issues raised by the original TP theorists have been covered, for example widening participation and diversity, as well as at risk students. The creation of an institution-wide embedded curriculum that scaffolds, mediates and honours students' existing skills is one of PFT's ultimate goals, and it is a central part of this thesis. The use of bricolage implies a radical change and transformation agenda (c.f. 4.4.2.2) for the research and if HEIs were to adopt the principles espoused in this thesis and supported by the data, this would bring about radical changes in curriculum development and assessment in the HEIs. In the professional degrees there is always going to be an extra player in the form of external accrediting bodies like the Queensland College of Teachers and the Australian Professional Standards for Teachers. However, in terms of providing

engaging, enabling curriculum without risking standards it is suggested that testing the strength of the self system and recommending strategies for developing it should be promoted. This has been foregrounded because it is the highest level of skill in the Marzano model used in this research, and the one least represented in the data. The other skill levels as well as academic literacies are also considered.

In the case of the data sample used here, the SWs were mostly true beginners in that they had not had experience of university before undertaking this course. Some had done one or two courses before but the majority were beginners at the time. It is important to make this point because although they were beginners in the university, of those interviewed, one had come straight from school and another had tried another course, dropped out, done ESL training, done some work abroad and decided to return to university to become properly qualified to teach. The others all had had employment and other life experience before joining the university. According to Thomson and Hall's (2008) theory of the *virtual school bag*, which has been adapted here and is referred to as the *virtual uni bag* (VUB), those students all arrived at university with a bag full of experience, knowledge and skills, which are just not necessarily useful skills for studying at university, but could potentially be adapted and used if they were recognised.

8.2. The HOTS in the VUBs

In this thesis a start has been made to discover what HOTS and academic literacies students had when they embarked on their university journeys that would be useful to them in writing a critical comparative essay in the persuasive genre, and, in the case of the SWs in this data sample, to become practising teachers in schools. The skills needed for the above task also include some of the generic skills needed for success at university. When the university outcomes and skills criteria were examined, one of the highly prized generic skills was critical thinking. This concept has been developed here through a study of Marzano et al.'s work on HOTS which were then used to analyse the essays written by seventeen of the SWs in the sample to discover what skills they used in their writing of those essays. More skills are needed to write an academic essay than purely thinking skills so what they could do in terms of academic literacies was also explored.

The following table (Table 8.1) represents the comparative levels of the HOTS and is included here to provide added value and meaning to the discussion. It also places Costa's criteria within the Marzano HOTS, between metacognition and knowledge utilisation, which was deemed to be a logical position for it in a comparative view. This is followed by Figure 8.1 to show the comparison between the data levels in the essays as compared with the interviews. In this table it is possible to compare the interview and essay results directly in the case of the self system and metacognition as well as Costa's understanding. In all but one of those cases the interview results were stronger than the essays. This is probably because the interviews were conducted when three of the SWs interviewed were completing their degrees and another was a borderline traditional student from a good school. The fifth interviewee was the student who had decided to drop out of university and whose essay was not available. This result probably also diminished the total result. Not that that is important it just tempers the view. The point really is that towards the end of their degrees the SWs had markedly developed from when they had written their essays at the start of their journeys.

Table 8.1

Approximate Comparative Levels of Marzano and Kendall and Costa's Criteria

100							
90							
80							
70							
60							
50							
40							
30							
20							
10							
	SELF SYSTEM 36.75	METACOGNITION 74	COSTA 78	KNOWLEDGE UTILISATION 63	ANALYSIS 83.5	COMPREHENSION 88	RETRIEVAL 100

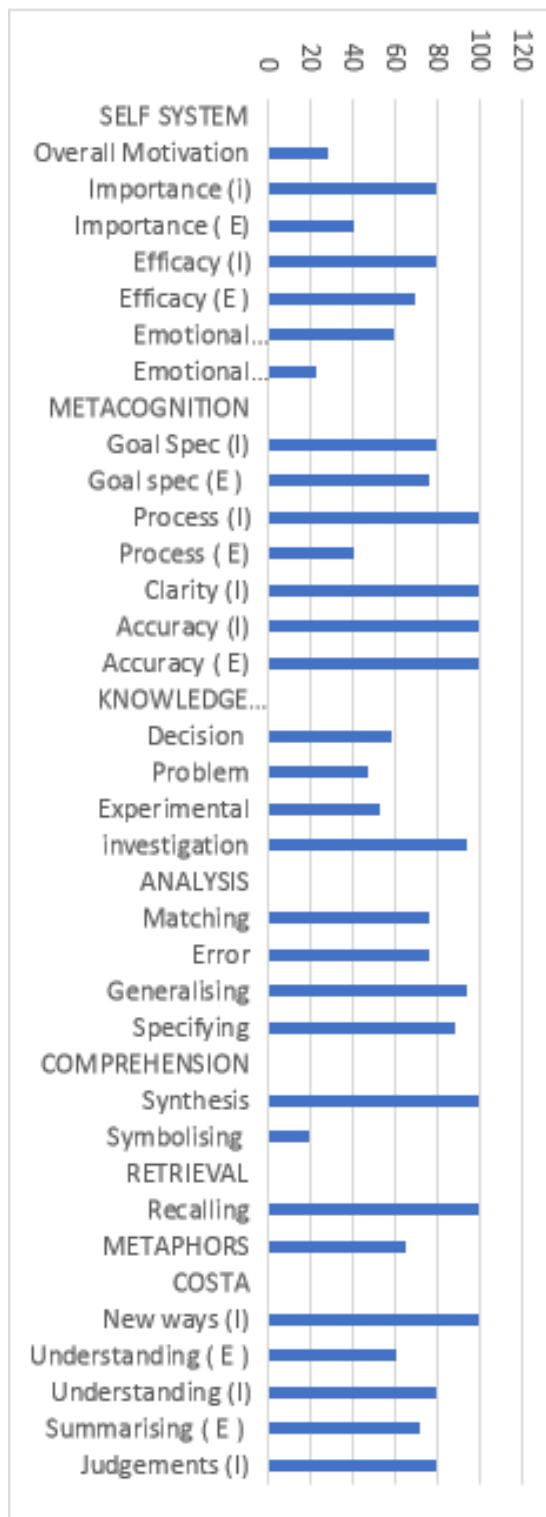


Figure 8.1. Levels of HOTS – derived from Marzano and Kendall and Costa expressed in percentages of numbers of the SWs. I = Interview and E = Essays.

This figure shows the extent to which the interview data influenced the final results. In the self system, the overall motivation figure is based on Table 5.1, which shows that five out of eighteen SWs (or 28%) showed overall motivation. This calculation included both essay and interview results. A complication here is that SW10's essay is not represented because it was never received for analysis. If overall motivation is not included and only the essay data is, then the self system is represented at 44% rather than 36.75%. It is not the purpose to engage in refined detailed statistical data analysis here, it is not necessary for this study. The purpose of the use of these numbers is to provide a view of the SWs' potential ability in terms of these descriptors. This use of numerical data also means that the research method can be described as mixed or integrative research (Johnson & Onwuegbuzie, 2004) whereas the overarching methodology is qualitative with a strong emphasis on bricolage. The use of numbers provides a sense of the proportions and indicates strengths and weaknesses in the SWs' VUBs.

8.2.1. The self system.

The highest level of skill in their descriptors is the self system and, as noted in 5.3.1, this is, in aggregate, the lowest level of achievement in this cohort, with only 28% of SWs achieving overall motivation. The surprise result here was the low level of sense of importance evidenced in the essays, considering that the descriptor focussed on the SWs' sense of the importance of literacy and the essay was written in a literacy course. It is only possible to speculate as to the reason for this and it is possible that the issue did not arise in the essay instructions. If the SWs had been questioned about it they might have been surprised to be asked such a question, as the answer might have seemed obvious.

Elements of the self system were relatively strongly represented in the analysis, the SWs' sense of efficacy was stronger than their sense of importance or their emotional responses to their studies. This is important information for curriculum planning and development that would enrich and enhance future students' study experiences. It is hoped that academics in the planning and development field will use the information towards enhancing engagement and developing curriculum that will develop students' existing HOTS as well as introducing them to new ones.

It is possible to enhance the sense of importance. L3 described a process in which she introduced her students to the world of teaching literacy and at the same time discovered what they knew and what she still had to teach them. She observed that part of that process led to the students discovering what was important about the course they were studying. Thus, she enhanced their sense of importance and emotional response within the self system skills, at the same time as developing their sense of efficacy and their sense of being members of a profession. O'Donnell and Tobbell (2001) write about how engaging in the necessary skills develops students' professional personas and enables a sense of belonging to a community of practice.

The low level of emotional response recorded in the essays is not surprising as the essay task would not have provided much scope to show this, whereas the interviews did. It is however, important for this project, to pay some attention to the low level of emotional response. An emotional response to what the student is learning is very important to their success in a subject. They must have an emotional sense of connection to the knowledge and of what the subject means to them. Their emotional attachment to their work was strongly represented in the interviews but not in the essays. This might have been expected because it was not part of the essay requirement but the way it was interpreted during the analysis of the essays, was to assess the SW's sense of the importance of affect. This was poorly represented in the essays, which suggests a low level of emotional attachment to their studies. This is noted as an area to be attended to when introducing students to the university and to developing curriculum and course assessment. Marzano and Kendall (2008, p. 154) say that

...a key feature of this type of self system thinking is the identification of the logic underlying emotional responses There is no necessary attempt to change these associations – only to understand them. This said, an argument can be made that awareness of one's emotional associations provides the opportunity for some control over them.

They connect this understanding of one's emotions to enabling motivation. Without a positive affect towards certain aspects of knowledge, acquiring it is likely to be more difficult. Enabling students to identify their feelings about certain aspects of the knowledge they hope to acquire might make a difference to their actual

acquisition of that knowledge and therefore enhance their chances of success in their studies.

O'Neill and Geoghegan (2011) conducted research into first year students' responses to the course featured in this case study. Their students considered they had learnt much of what was needed to be effective literacy teachers. Research such as this could provide a sense of what would make incoming students appreciate the importance of their studies and alert them to their emotional attachment to their learning. Marzano and Kendall (2008) describe how they would ask students what they feel about doing a task and then ask about the logic of their thinking. This might be useful in planning tasks and presenting lectures as it develops students' thinking about how they feel about the task or knowledge acquisition in which they are engaged, thereby developing their overall motivation.

The sense of efficacy was highly represented, although there is a tension here. Four of the five SWs who were interviewed all reported some doubts as to their ability to manage their studies when they began, thus indicating low self-belief at the start of their studies. Three (SWs 1, 3, and 16) were in the last stages of their studies when they were interviewed and reported in the interviews how they had overcome those doubts. SW18's problems were more about resisting the academic process and just doing what she thought she had to do to get the marks. It was more about feeling that she was entitled to have her own ideas and could not do so because she had to reference, so she felt disempowered rather than doubting her ability. SW10 did not express doubts but mentioned how she had depended on the support of her tutor. The results of the analysis of efficacy in the essays shows 70% in the essays. However, that was not a personal response to the question, and in the interviews 80% showed strong efficacy, but there too a *caveat* is necessary: most of the SWs interviewed were well on their way to obtaining their degrees and they had admitted to suffering from low self-belief when they began their studies. Therefore, the sense of efficacy would be a matter for attention when designing courses for new students. The next level, five, metacognition, gives a higher gross score which is to be anticipated and will be discussed next.

8.2.2. Metacognition.

There are no surprises in the analysis at this level. Process monitoring, the lowest level in the essays, 40%, is not surprising considering the descriptor was about consciously monitoring your own processes. As is mentioned in 5.3.2.2, if SWs showed that they were monitoring the learning and teaching processes in the transcripts, they were coded positively at this node because it indicated a sense of the importance of process. In the interviews they all responded positively. With regards to goal specification, the essays scored 76% and the interviews 80% and in all the other descriptors, in both essays and interviews, the SWs scored 100% which would account for the high overall score of 72%.

As explained, in Table 8.1, Costa's results are inserted between metacognition and knowledge utilisation because what he recommends relates strongly to variations of metacognition. The overall percentage of 78% fits neatly into the picture and displaying it like that in Table 8.1, shows the relationship between the skills.

8.2.3. Costa's descriptors.

The overall total for Costa's descriptors is 78%, which neatly follows metacognition at 72%. Figure 5.3 is another version of Table 5.11 and it shows the gross result of how almost all the SWs in either essay or interview, feature in Costa's criteria of showing empathy, being able to think differently about an issue, paraphrasing another's thoughts, and removing their autobiographical judgments. The criteria are also closely linked to the emotional response criterion in the self system. Although only four SWs qualified across all the criteria, most of them scored around 50% so there would not be a lot of concern about their level of achievement according to Costa's descriptors. However, it would be necessary to see the SWs in action in the classroom to ensure that they really did know how to speak to the children appropriately and engagingly and listen to them and hear them. This would be an issue for the lecturers designing the practicum assessments.

8.2.4. Knowledge utilisation.

The result for knowledge utilisation is described as anomalous because it should show a higher total result than it does to fit into the expected HOTS hierarchy. Table

5.3 is duplicated here in Table 8.2 for guidance in the discussion that follows. It shows the breakdown of the evidence of the coding for knowledge utilisation.

Table 8.2

Knowledge Utilisation

SW	Decision-making	Problem-solving	Generate hypotheses	Investigation
1	XX(E)	XX(E)	XX(E)	X(E)
2	X(E)			X(E)
3			X(E)	X(E)
4	X(E)		X(E)	X(E)
5	XX(E)			X(E)
6	XX(E)	X(E)	XX(E)	X(E)
7				
8	X(E)			X(E)
9		XXX(E)		X(E)
10 (No essay)				
11	XXX(E)	XX(E)	X(E)	X(E)
12	XX(E)			X(E)
13				X(E)
14		X(E)	X(E)	X(E)
15	XXX(E)	XXXX(E)	XXXXX(E)	X(E)
16		XX(E)		X(E)
17			XX(E)	X(E)
18	XX(E)	X(E)	X(E)	X(E)

E = essay data; I= interview data. Green highlight = 'full house' of skills and beige highlights = other examples per SW. Multiple X = numbers of instances of the occurrence of the skill per SW.

This node only scored 63%. They all scored for investigation except for one SW, SW7, who scored zero on everything, which partly contributes to this result. However, she scored very poorly everywhere. This is an area where they are thinking for themselves and applying knowledge. If their writing did not show this

they were not coded. There is evidence of decision making, problem solving, experimental thinking and hypothesis development and testing, as well as investigation. It could be argued that the essay did not specifically require the performance of those skills but the fact that five out of seventeen essays were coded fully at this node and only one SW was not coded at all, shows that it should have been possible for a higher result to have been achieved. The details of how the descriptors were applied are fully described in 5.3.3, and the conclusion drawn here is that although this level is in the middle of the hierarchy, it should have shown a higher score. They achieved highest in investigation – all SWs bar one qualified there, decision-making was next (ten SWs), followed by experimental enquiry and generating hypotheses (nine SWs), and finally eight in problem-solving. Marzano and Kendall (2008, p. 20) describe this node as the “cognitive system”. They all featured somewhere in the table but only five featured in all four descriptors. This could be an issue of concern and merit serious attention as it seems that their cognitive systems are underpowered. The SWs all show well in metacognition and in Costa’s criteria, discussed in 5.3.8. Thus, it is likely that the SWs were aware of the need to display appropriate affective behaviour. However, applying knowledge is an area that will have to be given focus in new programmes and courses. It is strongly related to critical thinking and the ability to think outside what has been learnt in the lectures, if lectures are the main way the courses are taught. The SWs did express how they felt they had to get the right answer as opposed to thinking through a problem. In constructivist terms this would be a problem. Halx and Reybold (2006, p. 312) identified institutional culture as a source of the encouragement of critical thinking, and Weimer (2003, 2013) has identified ways of changing institutional culture and introducing critical thinking as part of engagement. The area of critical thinking is outside the scope here, except to say that without the detail provided by Marzano et al. it is difficult to work out ways to implement it and cause students to practise it. In terms of the bigger picture and discovering the contents of the VUBs and what incoming students do when they write their early assignments is it important to know that the area of knowledge application is a weak one and would be something that PFT would have to attend to in the embedded institution-wide curricula envisaged there.

8.2.5. Analysis and comprehension – symbolising.

In analysis nothing unusual shows up but in comprehension there is an oddity that needs further discussion. It is the issue of symbolising that has been discussed in some detail in 5.3.5.2. As noted earlier, the use of graphic organisers to promote thinking is uncontroversial and needs to be promoted to assist students to sharpen their thinking as well as organise their material. In terms of the HOTS content of the VUB, metaphor is the last aspect to be addressed.

8.2.6. Metaphors.

A relatively small number of the SWs generated metaphors, 65%, but the essay did not specifically require them to show this skill. Nevertheless, the fact that nearly two out of three did so shows that it is reasonable to expect them to demonstrate it. The point about using metaphors is that it shows the ability to think abstractly and figuratively and is related to symbolising. It appears that Marzano and Kendall and even Costa did not consider this skill to be very important. However, it is an important skill for teachers in explaining things to children, and when the SWs are teachers, they will need to find images that resonate with the children's experience as well as to help them understand new words and concepts. Raising awareness of this way of thinking across the disciplines would be an important part of course development and assessment, and Pugh et al. (1997) show a variety of ways in which metaphors can be activated and taught. The ability to think abstractly and metaphorically is of value in all disciplines when dealing with new and sometimes alien concepts.

8.2.7. Summary of HOTS contents of VUBs.

In summary the SWs in this data sample show strength in their sense of efficacy, in the metacognitive and empathy areas as well as in the basic academic strategic areas of analysis and retrieval. However, they need additional support and development in the areas of their emotional response, their overall motivation, knowledge utilisation and symbolising. This suggests that although their writing may not be smooth and academic, they still have significant HOTS on which to build their success.

8.3. Academic Language and Discourse in the VUBs

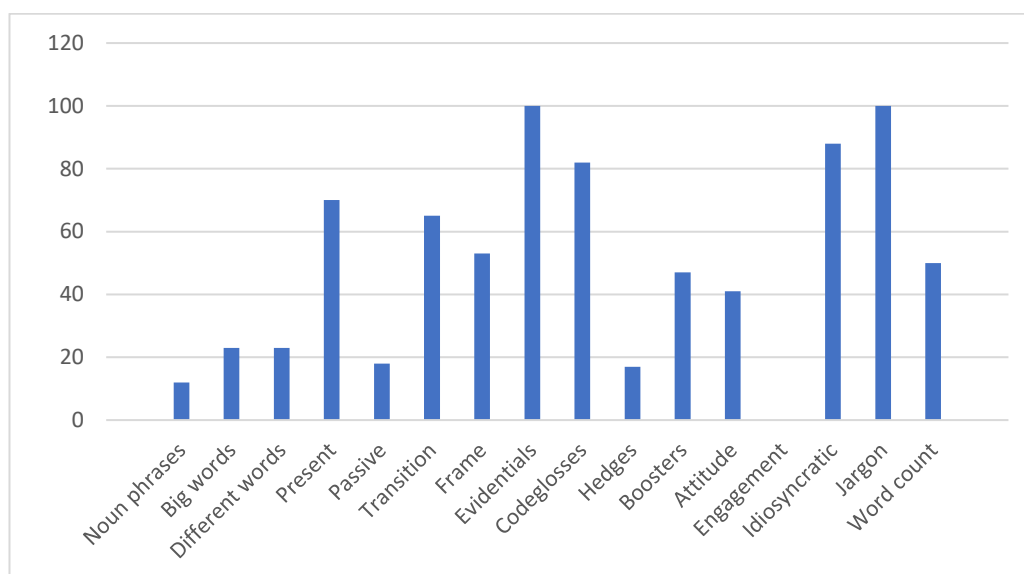


Figure 8.2. The percentages of SWs showing evidence of the use of Academic Literacies in their essays.

Apart from the use of the present tense, transition markers, evidentials and code glosses in the writing aspect of the SWs' use of academic language there is much work to be done here. The first three categories - complex noun phrases, big words and those of Greek and Latin origin, and lots of different words to differentiate the writing from everyday speech - are all indicators of issues with vocabulary. When their vocabulary count of 50% of the words needed in the academy, as represented by the Academic Word List, is factored into the discussion this is supported. However, on the positive side their strong mastery of the jargon of the discipline needed to write this essay, shows that they were aware of the necessary jargon vocabulary and possibly need more experience of academic language to develop the rest. In the interviews the SWs (except for one) commented on the quantity of reading they had to do and how they managed that by finding ways to read only what was necessary. This might indicate a reason for them not acquiring the necessary vocabulary and stylistic features, such as the use of the passive, which also showed a low result in the analysis.

They wrote more simply than is usual in academic prose, and they did not use modals much nor did they need to engage in more complex structures like adverbials

that are used for navigation in documents. This was too short a text to need the adverbials showing position in the text. However, it is possible that they could have used modals to better effect. It is interesting though that when it came to the metadiscourse aspects of academic discourse they performed better. In textual metadiscourse they all used evidentials and the majority used code glosses as well as transition markers. Even frame markers came in at over 50% all of which added to the readability of their essays. Endophoric markers play a similar role to the adverbials of place and would not have been needed in a text of this length.

In terms of interpersonal metadiscourse, they made good use of boosters and demonstrations of attitude – almost 50% in each. However, hedges gave a poor result as did engagement. Introducing their personal position into the text would not have happened as they would have been trained not to do this, and this has only recently become acceptable practice in academic prose. Ways of hedging and developing engagement need to be found when writing in the persuasive genre, so there is also work to be done there. When mentioning work needing to be done by course designers and assessors, an immediate observation must be made about different discipline styles. They need to be taught what is expected of them when writing in their specific discipline. L2 made it clear that in the new BEd programme a communication course is included which would cover those issues. However, there is no way around confronting the vocabulary issue. Remarks were made about the fact that these results are based on one essay on a specific subject and therefore could not possibly have generated all the word families needed when writing at university. Nevertheless, as was mentioned in 3.8., the SWs in this sample need to acquire a more extensive vocabulary. There is a plethora of information about how this can be done and supported but the important thing is that the individual students need to be aware of their own responsibility for doing this and academics need to raise awareness in the students. This is an important comment on the content of the VUBs and relates to the research questions in terms of what students can and did do when they wrote their essays and on how PFT needs to be angled to enhance their chances of success.

8.4. Challenges Experienced by the SWs - Interviews

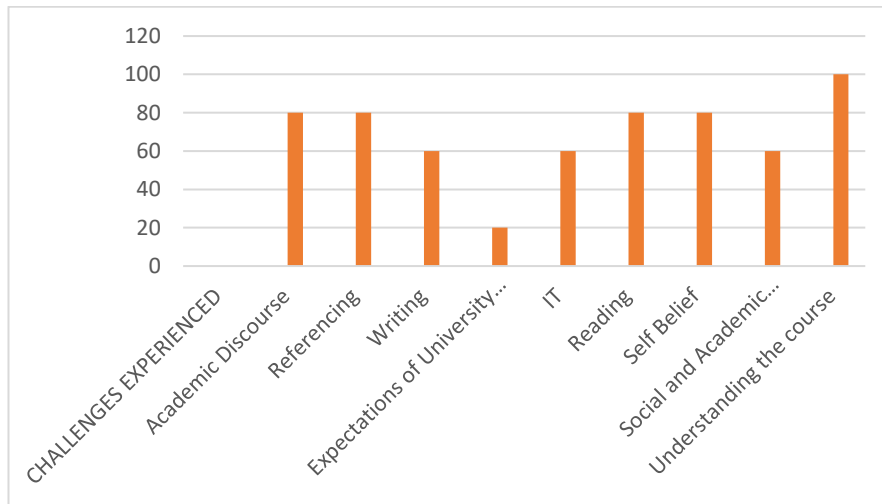


Figure 8.3. Challenges Experienced by SWs arising from their interviews expressed in percentages of the number of SWs who reported experiencing those challenges.

The challenges experienced by the SWs when they first started at the university mention academic discourse, writing, reading and understanding the course, all of which relate to issues connected with vocabulary. This shows up as relatively poor in the analysis as well, and while a more extensive vocabulary of words and linguistic structures would have made a difference in those areas, not much can replace immersing themselves in the prescribed course readings as well as other related reading. It is possible also that once the self system has been developed more, they would be more motivated and organised to find the time to do the reading. However, this is a neglected aspect of academic support and anecdotally, academic advisers, do not focus directly on developing reading skills, even though they are arguably more important than writing because it is where they acquire the knowledge and information that they need to write about. Thus, training in reading skills could increase their reading efficiency and retention of information as well as enable them to manage their time better. They might also be able to take pleasure in reading and researching for their essays and projects.

In technology-related issues, their expectations of the lecturers and social and academic engagement were related to the environment of the university and according to the interviews, problems in this regard were resolved quickly and

easily. Social engagement is an exception, which for online students is an important issue, and unless the courses include discussion forums, Facebook chat forums, and online tutorials, they are likely to be lonely students and not socially engaged with their peers. In the interviews reference was made to using the online forums as well as communicating with lecturers and attending tutorials. In a conference paper presented at the recent Students Transition Achievement Retention Success (STARS) conference, Callahan and Boyle (2017) described a project they ran in which they established geographical nodes and meetings where students could meet with them and other students and receive support and socialise on a semi-regular basis. The only on-campus student in my data mentioned that she had found it helpful to have friends in the course.

In terms of referencing and self belief, students reported in the interviews that although they had found referencing challenging they had accepted it as part of academic discourse, except for SW18, who although she obviously referenced properly, considered it a source of disempowerment. The fact that they were all able to reference correctly when they wrote their essays suggests that support and focussed training in the referencing system relevant to their discipline should be part of course design. It is a shibboleth that could be reduced with a small amount of training and explanation on the part of the teaching academics (Green & Agosti, 2011), at least the mechanics of it. Self belief has been discussed earlier and other than to reinforce its importance and the need for course designers and assessors to be conscious of supporting students' sense of self belief and efficacy, it is not necessary to expand further here.

8.5. Staff Perceptions of Importance of HOTS

The contribution of the staff interviews to the quality and depth of this thesis is significant. L1 as the Course Examiner who designed the course and assessment could give valuable insights into how the course was intended to educate students in the importance of teacher talk and dialogic pedagogy. Her interview also gave a view of the sort of schools students could be prepared to work in where school wide pedagogy is the norm.

L2 is now the Co-ordinator Primary Programmes, and was deeply involved in the development of the new BEd programme, which will provide students with a much-improved learning experience. The TEMAG has been a strong influence here as well. When reflecting on how things were, and how they will be, it is the strong positives that come to mind. Courses being scoped and sequenced and lecturers being able to cross-refer to each other's courses to make the linkages clear to the students is a major step forward. The professional preparation aspect of their education will also be foregrounded, and their communication skills will be overtly developed. The inclusion of HOTS across the programme is another important innovation although how they will sequence the teaching of the skills and incorporate them in the courses in the programme, remains to be seen. However, the intention is there.

L3 gave the perspective of a lecturer who has taught the course under discussion from its inception and provided valuable insights into the way scaffolding has increased to the point where she thought it was overdone. She also described pedagogy that she had used in her teaching, which is exemplary for purposes of this thesis as it promotes the self system skills as well as students' awareness of their professional futures. There were issues on which there was consensus from all three lecturers.

For example, they agreed it is important that students should understand the relevance of what they are learning in their studies and be able to apply this to themselves as teachers. They agreed that different modes of assessment should be used to enable a wider range of success and broader testing. Different ways of promoting critical thinking was another focus, and that the teaching of the courses should model the behaviour expected of teachers in classrooms. They all agreed that the HOTS used in this study would provide useful assessment criteria in their courses and that the concept of the VUB was of great value as well. Finally, the fundamental importance of an engaging curriculum could not be emphasised enough.

8.6. Summary

In this chapter the research questions have been answered in terms of the discovery of the contents of the SWs' VUBs related to their experience of writing their essays in student-related data as well as staff interviews and issues relating to pedagogy for transition and enhancement. It has been shown that the SWs represented in this data have a relatively low level of self system skills, as defined by Marzano et al. The self system skills, according to Marzano et al. are the top level of HOTS and are summarised in the SW's sense of overall motivation, which consists of a unity of three specifics, their sense of importance, their sense of efficacy and their emotional connection to their studies. The last mentioned showed lower than the other two. This is significant because it contributed to the poor showing of the level of the self system and is one of the innovations introduced by Marzano et al. in their new taxonomy of HOTS. It is important because according to them an argument can be made that awareness of one's emotional associations provides the opportunity for some control over them which would arguably enhance their potential for success. This is an area of HOTS that will need attention to enhance future students' chances of progression. The next level down is metacognition where the SWs in this data sample showed well, it consists of personal behaviours that contribute to their performance: goal specification, process monitoring, monitoring clarity and accuracy. Costa's descriptors followed: showing empathy, being able to think differently about an issue, paraphrasing another's thoughts, and removing their autobiographical judgments. Here too they showed up well according to an expected pattern of higher scores as they moved down the hierarchy. However, there was an anomalous result in the next level, knowledge utilisation where only five of the seventeen essays qualified showing all the descriptors. The weakest area here was problem solving. This is an area that will need attention from curriculum developers and course planners. It is central to most HEI's desired graduate skills and would be an area needing attention in PFT's embedded curriculum relating to the third research question as to how PFT could enhance progression.

The lower levels of the Marzano, Kendall, and Costa hierarchy were well represented except for symbolising. This relates to the use of graphic organisers and it is arguable that students should at least be given the opportunity to be exposed to their possibilities. Two out of three showed ability in the use of metaphorical

language suggesting an ability to think abstractly. However, all higher education students should have this ability. This is also an area that the PFT embedded curriculum would do well to develop. Reference has been made to scholarly articles arguing strongly for the importance of the development of the ability to think abstractly.

The discussion of their academic writing and discourse skills showed weakness in vocabulary except for their mastery of the jargon of the course they had studied. This relates strongly to the research question regarding their experience of writing their critical comparative essays as well as ways in which PFT can enhance that experience. There was argument that supported the idea of lecturers focussing on the development of student vocabularies it is obvious that without the appropriate vocabulary their experience of writing academically will be limited. However the fact that the SWs showed some mastery of the discipline jargon showed that they are well able to develop the necessary word skills.

There was also weakness in some of the classic indicators of academic writing; use of the passive, hedges and the metadiscoursal area of engagement. On the other hand there was strength in their use of evidentials, present tense framing and code glosses. The structural areas are likely to develop as they read more academic texts and are encouraged to notice how they are written. The SWs expressed a sense of challenge in writing academic texts in their interviews which reflects towards answers to the first research question about their writing experience.

While writing and academic discourse featured large in the interviews, the amount of reading required and difficulties in understanding the course as well as their shortage of self belief and the need “to get the right answer” were also high on their lists. Referencing was another challenge and it related mainly to the technicalities while one SW felt the need for referencing constrained her self-expression. IT and social and academic engagement were other challenges as well as their expectations of the academic staff. Those are not surprising challenges but the sense of it being imperative “to get the right answer” is a comment on their view of the academic exercise of writing the essay and it might also be said it was a comment on the way it was taught. Neither perspective is what would be seen as desirable in an academic

environment that prioritises the values inherent in academic discourse, like open debate and valuing different ideas and researching around an issue to develop one's own stance. The lecturers who taught the course had comments on this last issue.

They differed but it was clear that more than enough scaffolding was provided to assist the SWs in navigating the course and writing the essay and that the essay was intended to enable the SWs to show that they had grasped the principles of literacy teaching and dialogic pedagogy that were taught in the course enough to demonstrate a personal stance in a critical view of the transcripts provided. The staff interviews also provided insights into their valuing of this research into HOTS and how it could contribute to future planning as well as to how the BEd programme at their university would appear in the future in terms of clear articulation between courses and an emphasis on the professional identity of the students from the start of their studies.

How might all the above become part of the emphasis on HOTS in first year programmes and courses? How might it be possible to enhance the first-year learning experience? How does it all contribute to reducing attrition? Potential answers to those questions will be found in the next chapter.

CHAPTER NINE – CONCLUSION

9.1. Introduction

This chapter presents the key findings of the research as well as the strengths and limitations of the study. Central to this is the contributions it makes to knowledge. In addition, implications for practitioners are suggested as well as suggestions for potential future research.

9.2. Key Findings

The key findings include the understanding that the original TP as understood in Australia does not include much specific detail about pedagogy in the classroom. The findings also include detail about the academic literacies the SWs had when they started at university. This includes HOTS and academic discourse and writing.

There are also findings about teacher education which include schoolwide pedagogy, dialogic pedagogy, engaging curriculum, higher order thinking skills, training in equity, teaching for higher order thinking skills, scaffolding, assessment, and aligning theory and practice. This includes developing a professional persona from the start.

9.2.1. Transition Pedagogy (TP) or pedagogy for transition (PFT)

The overall context for the study was Transition Pedagogy (TP) which was later referred to as pedagogy for transition (PFT) to reflect the emphasis on learning and teaching pedagogy in this study. The research problem focussed on first year students who found their introduction to the world of university overwhelming and alienating (James et al., 2010, p. 28).

Key findings from the TP literature showed that the embedding of a supportive curriculum institution-wide can make a difference to the attrition rate of an institution. However, that research had an emphasis on administration-supported strategies, rather than a specific focus on curriculum design (Kift, 2008, 2009a, 2009b; Kift et al., 2010; Nelson et al., 2012; Nelson & Kift, 2005; Nelson et al.,

2006). An engaging curriculum (Krause, Hartley, James, & McInnis, 2005) is part of the original TP but there is no mention of how that would translate into specific teaching and learning activities, including for example assessment. TP is not as high profile a construct as it has been although clearly it is still applicable to the first year experience, so to reflect the different emphasis within TP, based on the findings in this study, it was decided to refer to it as pedagogy for transition PFT rather than TP. In this research, as in the original TP, the concept of engagement is central and a key finding of this study is that pedagogical styles relating to learning and teaching should promote critical thinking and cognitively challenging learning experiences. According to the more inclusive PFT theory used in the later sections of the thesis, these need to be embedded in the curriculum and applied institution-wide in the first year to affect attrition and progression rates.

Also central to TP theory is the reality that widening participation in university study brings in increased numbers of diverse first year students many of whom belong to so-called equity categories. The data in this study reflect this diversity in that most participants were non-traditional students (mature age, low SES, first in family, non-English-speaking background, disabilities, low entry qualifications) and were therefore differently prepared for university than traditional students. The issue of international students and their economic contribution was also discussed. Although TP/PFT is an Australian construct, the first year experience (FYE) has been widely researched in other national contexts. The literature supported the findings in this study in terms of the sorts of challenges experienced by students in their first experiences in the university.

The first research question asked how first year education students experience the activity and demands of academic literacies in the context of writing critical comparative analysis in literacy pedagogy. In the student interviews participants spoke about the challenges they had faced when they started their studies. These challenges included coping with academic discourse, writing and referencing, getting the right answer, and understanding the course. All these challenges are reflected in the literature about the FYE. As teachers in training, these students also spoke about the desirability of aligning theory and practise. This was reflected in the Craven

report (2014) on the Teacher Education Ministerial Advisory Group (TEMAG). Providing a more complete answer to the question required more detailed research which involved the written data, the actual essay. The literature richly reflects concern with first years' English language skills and ways to address the perceived shortcomings in this area. However more in depth reading into the first year experience suggested that there is more to the academic problems faced by students than deficiencies in English language. Faragher (1995, 2011) suggested that student writers might have strong thinking skills despite having poor English writing skills. It was therefore decided for this study, to find a way of discovering what academic literacies, which includes higher order thinking skills (HOTS) as well as academic discourse skills, were used in the production of student writing. This provided a more complete picture of their experience in the writing of a critical comparison essay in the persuasive genre thus aligning with the research questions

9.2.2. Academic literacies.

Key findings in the academic discourse and writing area were that apart from use of the present tense, transition markers, evidentials and code glosses in their writing, there is much work to be done. The low result in the first three categories - complex noun phrases, big words and those of Greek and Latin origin, and a wide range of different words to differentiate the writing from everyday speech - are all indicators of issues with vocabulary. When their vocabulary count of 50% of the words needed in the academy, as represented by the Academic Word List, is factored into the discussion this is supported by the data in this study. However, their strong mastery of the jargon of the discipline, which was needed to write this essay, shows that they were aware of the necessary vocabulary. (c.f. 6.7) There is detail in the thesis about the interpersonal metadiscourse markers used where some of them rated significantly higher than others. Ways of hedging and developing engagement need to be developed when writing in the persuasive genre and the participants had a poor showing in this analysis. The preceding discussion does not take account of the work of a range of academics who argue that the criteria described above are potentially part of the "assumption that the discourse of the academy, as it was understood in the 'white, male academic establishment' of the past," (Bizzell, 2005, p. 323) is the only acceptable discourse". A key finding in this study is that there is considerable debate

in academia about ways in which student voices can be validated even when they are not in sync with the prevailing attitudes of the university. Bizzell (2005), Fernsten (2005), Priest (2009), Ivanic et al. (2007), Lea (2004), Lillis (2003), and Haggis (2006) are just a few of the voices arguing for flexibility regarding acceptable discourse.

It was a key finding that HOTS are very important to student success and that the work of Marzano et al. could be used to identify HOTS in student writing, and interviews (in the case of this study). While the bulk of the literature focusses on linguistic skills as being vital for academic success this study found that HOTS are also vital and can be identified and potentially enhanced using Marzano et al.'s descriptors.

Further key findings emerged during the SW interviews about the challenges they experienced. Those rated highest were understanding the course, referencing, and academic discourse. However, while they all said those were challenges, they had embraced them and moved on with their new knowledge and experience. It was only possible to find out in the interviews which participants had completed the degree; three had completed, one had dropped out and the fifth was continuing. At the time of completing this thesis all four will be practising teachers. It is significant that they were all mature age students, which is also a key finding, as the literature suggests that although many online, mature age students drop out, they often have a better chance of persisting than traditional students.

9.2.3. Teacher education.

The SWs in the data sample will not have experienced the new, improved models of teacher education envisaged in the discussion of the findings of this study. TEMAG have published their findings, and the university in which this thesis is based has re-structured its BED programme in accordance with the TEMAG recommendations and guidelines. They embarked on a consultative, collaborative process and their proposals are being considered by the relevant accreditation bodies. The key findings about teacher education are that it should include a mentoring process for students in schools, thus bringing theory learnt in the classroom close to practice in the schools. In addition the schoolwide pedagogy (SWP) movement is gaining ground in

Queensland and it might be useful for students to be prepared to work in SWP schools. Resonant with that finding is the idea that equity and democracy teaching should have a place in the teacher education curriculum according to Cochran-Smith (2005). Also required in the curriculum would be training in teacher talk with an emphasis on dialogic pedagogy. Furthermore, there was consensus that assessment models could be more varied and provide students the opportunity to show proficiency in other modes than essay writing. The interviewed lecturers all agreed that their courses would benefit from the use of the Marzano descriptors as guidance for them in the encouragement of HOTS.

Another finding was that there was no consensus on the issue of the amount of scaffolding required for the writing of the essay under analysis. Two of the lecturers described ways in which their practice was engaging, which included modelling best practice and including students in course planning, all of which could be generalised to other courses and disciplines. Another key finding relating to TEMAG is that there is no mention of teaching or developing HOTS specifically.

The findings discussed above address the research questions through an analysis of how some SWs experienced writing a critical comparative essay in the persuasive genre, insofar as the essays and interviews drew upon and showed their levels of HOTS and academic discourse and writing. The lecturers commented on the ways the course was taught and assessed, and they indicated how they supported students in the process and how it could have been improved. The lecturers and SWs all indicated ways in which pedagogy in transition could enhance the SWs' progress and success. These key findings reflect the extensive literature reviewed and applied to the issues that arose during the process. They represent extended understandings of the issues and have brought together research and ideas that have not been related or juxtaposed before. In terms of TP, thinking of it as pedagogy for transition rather than transition pedagogy, and promoting a specific focus on classroom learning and teaching with an emphasis on cognitively challenging experiences for engagement, is a new development. This also relates to the need to develop Marzano's level of knowledge utilisation. Related to the principle of cognitive challenge, identifying HOTS according to Marzano's taxonomy via SWs' written and spoken data

represents a significant new direction. This study has provided evidence that according to Marzano there is a need for development of the self system as well as knowledge utilisation. The innovative analysis of the writing has shown a clear emphasis on the need for the development of vocabulary as well as learning to write academically. Moreover, the construct of the VUB is also a novel use of the concept of the *virtual school bag*, commonly used in teacher education. It allows for the affirmation and enhancement of the knowledge and skills that children have when they start school. Finally, bringing together education for democracy, dialogic pedagogy, SWP, mentoring, building a professional identity from the start, as well as teaching for HOTS in the same teacher education space has powerful implications for curriculum planning and bringing about change. This is a valuable contribution to knowledge. The research shows areas of strength and weakness in the SWs' capabilities that have the potential to assist curriculum developers and university teachers to develop curriculum and assessment that will enhance the student journey and provide greater chance of success for a more diverse cohort.

9.3. Strengths and Limitations of the Study

9.3.1. Case study.

One of the strengths of the study is that it is a case study which enabled detailed research and descriptive information to be collected from the data. Although it is a relatively small study it has depth and richness which is created by the amount of detail extracted from the data. It is mixed or integrative research so hard statistical arguments would not be expected but the qualitative aspects presented in the bricolage perspective do enable rigorous, valid arguments. Riege (2003) and Yin (2014) recommended applying theoretical replication logic throughout the study to ensure external validity. Marzano's taxonomy is an example of this and the use of written and spoken data constitutes the use of multiple sources of evidence to provide a chain of evidence thus ensuring construct validity. Morse et al.'s (2002) strategies for ensuring rigour were also followed by maintaining coherence-congruence between the research questions and the methods used, choosing appropriate samples of data; students' essays and staff and student interviews; and maintaining theoretical thinking throughout and developing theory continuously

because of movement between data and conceptual understanding. Starting with TP as in transition pedagogy and transforming it into pedagogy for transition PFT is an example of this as is the application of the construct of the virtual school bag as the VUB. All of this has added to the arguments that diverse first year students bring skills and knowledge with them that can be enhanced and developed to improve their chances of success.

A potential criticism is the relatively small number of interviewees but the literature suggests that large numbers are not essential in a case study such as this. Yin, (2014, p. 40) suggests that this type of study could be “an opportunity to shed empirical light on some theoretical concepts or principles”. This study has strived for “analytic generalisations...that may potentially apply to a variety of situations” (Yin, 2014). Since qualitative research focusses on process, meaning and understanding, the product of a qualitative study is richly descriptive (Merriam, 1998, p. 8). Words, and the images they evoke, rather than numbers, have been used to convey what has been learned in this study. (c.f. 4.3.2)

9.3.2. Number of data.

The Marzano criteria that had to be answered via the interviews and that related to the student experience of their writing would have been more generalisable if there had been more interview participants. In that respect the student voice was incomplete. Future studies could have more interviewees with more information in the student profiles to enable more rigorous follow up. In terms of the interviews, in future studies they could be more structured and have clearer protocols so that more clearly comparable data could be derived from all the interviews. About research methodology – the use of the bricolage is a strength of this work, since it allowed for overt expression of the equity agenda as well as the use of a wide range of evidence that might not have been allowed in a more constraining paradigm..... However, the fact that it was only discovered and used later in the research is a limitation of this study, because it could not be fully exploited as a paradigm for social change. Still, it provides an opportunity for future work on the themes contained here to promote the social justice agenda more strongly.

9.3.3. Limited scope.

The study could not include a range of creative activities that will develop in the future especially regarding the development of rubrics for monitoring HOTS and developing guidelines for curriculum developers as well as exemplars of the sorts of assessments that would indicate academic literacies including HOTS and academic discourse. The lecturer interviews provided good examples of how their course presentations were engaging and more can be done with such interviews in the future also to fill in the gaps and make the study more generalisable to other disciplines.

A limitation in the results is that they are based on a single essay in a specific discipline. The findings could be expanded by analysing a wider range of written and spoken texts which would add to the generalisability of this study to other courses and disciplines.

9.3.4. L2 interview.

The result of L2's interview, which focussed mainly on the development of the new BED programme she is involved in, might seem not to relate very strongly to the research question concerning the lecturers' view of the students' writing task but it does provide direct comment on how teachers will be educated for the profession in the future and as this study aims to impact on that future process it was important to include it here.

9.4. Contribution to Knowledge

9.4.1. Virtual uni bag (VUB).

The virtual school bag is a construct first developed by Thomson and Hall (2009) to enable school teachers to value the skills young children brought with them to their first days at school. In this study it was adapted to apply to university students and it has the same agenda. It is a central construct in this research as it provides a metaphor for what the students, in their diversity, bring with them to the university experience and what they were able to use in the writing of their essays viz. the contents of their VUBs. This construct contributes to the social justice agenda of this research and enables a diversion of focus from what the students cannot do to what they can and do do. What they can do is in the VUB and anyone thinking about how

to engage the first year cohort will be able to think about their skills and abilities and how to incorporate them into a scaffolded development towards greater skills and abilities, starting from where students are at. In the case of mature age students the contents will also involve skills and abilities related to their previous careers. Other students from non-mainstream cultures will also have other knowledge in their VUBs which could be used in their academic development. It is a construct that could be presented to students for them to suggest contents as well, thus building their sense of efficacy. Students in this study readily embraced the jargon of their courses, showed strong abilities in metacognition, wrote readable prose and quickly embraced and conquered many of the other challenges that confronted them at first, showing resilience. Resonating with the Vygotskian ZPD these qualities could be built on, and all academics across the institutions would therefore need to be aware of the concept of VUBs.

9.4.2. Marzano, Kendall and Costa – HOTS.

The application of Marzano et al.'s taxonomy in this research is a different way of using it. It was originally designed to be used in schools for developing children's HOTS. In this research the descriptors have been used to judge the extent to which those HOTS were present in this cohort, to identify what HOTS the SWs had in their VUBs. This is a new dimension in terms of curriculum design and allows for a diversified approach by providing a link between language, as in writing and thinking. It contributes to the social justice agenda by providing a framework that allows the identification of HOTS even in the presence of poor written language skills. A perception often expressed by academics is that poor English suggests poor thinking skills which is explored by Rosyati and Rosna (2008) and they concluded that there is not necessarily a connection. This is confirmed by the possibility of identifying HOTS from writing and speaking. The sections on idiosyncratic expression (2.6.4., 3.7., and 6.5.) all discuss how this phenomenon is identified in the texts and how it contributes to the VUBs. Then in 6.5 the examples suggest poor thinking, but in most cases the thinking itself is fine, just poorly expressed.

9.4.3. Pedagogy for transition – PFT.

The way that the original TP has been expanded into PFT, in this study is new and adds a dimension to an important construct. It focusses on developing what happens in HEI classrooms and other learning spaces. There is nothing new in promoting the idea of constructivist teaching with all its ramifications and multiplicity of terms and approaches but linking it explicitly with PFT and the attendant intention to limit attrition and enhance success is a new approach. Also linking it with engagement and suggestions by scholars such as Weimer (2003, 2013), that it could become embedded institution-wide in the learning curriculum, is a new contribution.

9.4.4. Academic discourse vs student voice.

Another contribution to knowledge is the inclusion of conventional criteria for identifying academic discourse skills alongside the academic discourse argument in favour of flexibility and greater inclusion of the current student vernacular and idiom. The use of the principles of bricolage enabled this juxtaposition, which includes the idea that respect should be paid to students' histories and backgrounds. Students' cultures, histories and lived experience should be included in the curriculum, which is a relatively novel idea in Australian HEIs and is thus a contribution to knowledge, especially when it comes to developing practical applications (such as the VUB) that would allow for such inclusion.

9.5. Implications for Practitioners

9.5.1. VUB.

If the arguments in this study are persuasive, practitioners will find it easy to develop an attitude towards their students that affirms and values the contents of their VUBs and enables both parties to develop mutual respect and understand each other's differences. Compromises could be reached in matters of discourse and expectations thus enabling students to proceed with greater confidence and teachers with greater understanding.

9.5.2. Application of HOTS in planning and assessment.

Application of the findings in this study would provide an opportunity for practitioners to develop ways of reading undergraduate writing that consider HOTS by applying Marzano et al.'s descriptors. They could invite students to self-identify in terms of the self system skills and metacognition skills, and assist them to develop themselves. This could happen without having to make major changes to their existing course materials.

In terms of major changes, the discovery and use of HOTS should form part of all curriculum statements in detail. It involves more than saying that critical thinking is a good thing and should be promoted. All course outlines would need to show where the HOTS will be assessed and explicitly state how that would happen. Teachers would be trained to recognise and value HOTS and promote their development as well as teaching their students to recognise them in themselves and take responsibility for their development.

9.6. Future Research

9.6.1. Value of the use of graphic organisers.

It was a finding in the research that graphic organisers are a valuable aid to developing HOTS and there was some evidence that they were not used much by the SWs. In relation to the contents of the VUBs it might be useful to pursue research into their value and ways to promote their use in HEIs. This would be in conjunction with current research into critical thinking, concept mapping and other work in the area.

9.6.2. Knowledge utilisation.

An area needing more attention is that of knowledge utilisation, as it was unclear what created the anomalous result of this level having a lower percentage than the previous one, metacognition. The results of the data analysis altogether could be tested over a wider range of written and spoken texts with more participants, which would enhance the generalisability of this study to other disciplines.....

9.6.3. Rubric development.

The results of this study provide the opportunity to develop rubrics in a range of disciplines to be developed and tested for the identification and measurement of HOTS as well as academic discourse skills. This would make it easier for academics to apply this knowledge and thus enhance the progression of first year students.

9.6.4. Theory to be tested over a wider range of data.

Further testing of the theory of HOTS, particularly the self system and symbolisation as well as metaphors, in a wider range of disciplines would strengthen it and would allow for more nuanced results to be obtained that would be of greater value to a wider range of academics. This is important when considering how to embed the acquisition of HOTS institution-wide.

9.6.4.1. Passing despite poor motivation.

The low showing of overall motivation in the self system should have signalled a low pass rate if the idea that a strong self system is likely to ensure academic success. However all the SWs interviewed did pass and their self system results were boosted by the interview data. It would be useful in the future to have information about student pass rates as well as more personal information to factor into the research. It is interesting that in the interviews SWs demonstrated stronger self system qualities than the aggregated result from the essays. This suggests that as they matured and advanced in their studies that their self systems developed more strongly.

9.6.4.2. Strategies for enhancement.

More research could be done on how best to enhance the contents of the VUBs and how to redress the weaknesses shown by the research. The work of Marzano et al. already describes such strategies but there should be a lot more available particularly regarding the development of vocabulary and other academic writing issues. The gaps in the academic discourse descriptors, 2.2.1 and especially 7.1.1.6, based on Wallace et al. (1999), and more research into identifying them, would also be useful to fill out the academic discourse component of the VUBs.

9.7. Conclusion

The experience of first year education students writing a comparative critical essay in the persuasive genre in a literacy course has been thoroughly explored. Their lecturers' perceptions of the exercise and ways of enhancing the experience have been considered. The context of PFT has been applied and new ways of developing that construct have been proposed. A critical difference is that a focus on the development of HOTS rather than on language skills has been shown to be central to the progress and success of first year students. The bricolage paradigm was employed to enable disruption of the *status quo* and introduce radically different approaches to how students are admitted to university and once admitted how they might be taught and how they might learn. The prevalent emphasis on language skills being the prime factor in student success has been argued and an emphasis on HOTS developed and placed centre stage together with some training in specific aspects of academic discourse and writing including thorough education in the practice of referencing. It is clearly argued that differently prepared students from defined equity categories deserve a curriculum that values their skills and capabilities as well as their cultural origins.

Future research and studies in how to implement assessment of individual students' HOTS and other content of their VUBs has been flagged as important as well as broader data collection to test the applicability of the theory in this thesis to other disciplines than teacher education.

REFERENCES

- Ambrose, I., Bonne, M., Chanock, K., Cunnington, C., Jardine, S., & J. Muller, J. (2013). "Like catching smoke": Easing the transition from TAFE to university. *Journal of Academic Language & Learning*, 7(2).
- Andrade, H. G. (2005). Teaching With Rubrics: The Good, the Bad, and the Ugly. *College Teaching*, 53(1), 27-31. doi:10.3200/CTCH.53.1.27-31
- Andrews, D., & Lewis, M. (2005). *Building capacity: Teachers thinking and working together to create new futures*. Paper presented at the International Congress of School Effectiveness and Improvement, Barcelona
- Archer, A. (2008). Cultural studies meets academic literacies: exploring students' resources through symbolic objects. *Teaching in Higher Education*, 13(4), 383-394. doi:10.1080/13562510802169657
- Ashwin, P., & Trigwell, K. (2012). Evoked prior experiences in first-year university student learning. *Higher Education Research & Development*, 31(4), 449-463. doi:10.1080/07294360.2011.634384
- AUQA. (2009). *Good Practice Principles for English language Proficiency for international students in Australian universities*. Sydney Retrieved from www.deewr.gov.au/HigherEducation/Publications/Documents/Final_Report-Good_Practice_Principles.pdf.
- Baik, C., Naylor, R., & Arkoudis, S. (2014). *The first year experience in Australian universities: findings from two decades 1994-2014*. Retrieved from Melbourne: <https://www.ncsehe.edu.au/publications/the-first-year-experience-in-australian-universities-findings-from-two-decades-1994-2014> http://melbourne-cshe.unimelb.edu.au/__data/assets/pdf_file/0017/2305061/FYE-2014-FULL-report-FINAL-web.pdf

- Bailey, A. L., & Huang, B. H. (2011). Do current English language development/proficiency standards reflect the English needed for success in school? *Language Testing*, 28(3), 343-365. doi:10.1177/0265532211404187
- Barnes, B. R. (2012). Using mixed methods in South African psychological research. *South African Journal of Psychology*, 42(4), 463-475.
- Barthel, A. (2011). Table 1b - ALL staff:student ratio. Retrieved from <http://www.aall.org.au/sites/default/files/table1b-ALLstaffStudratio2011-3.pdf>
- Bekele, T. A. (2009). Cognitive Skills in Internet-Supported Learning Environments in Higher Education: Research Issues. *Scandinavian Journal of Educational Research*, 53(4), 397-419. doi:10.1080/00313830903043182
- Bernay, R. (2014). Mindfulness and the Beginning Teacher. *The Australian Journal of Teacher Education*, 39(7), 57 - 69.
doi:<http://dx.doi.org/10.14221/ajte.2014v39n7.6>
- Birrell, B. (2006). Implications of low English standards among overseas students at Australian universities. *People and Place*, 14(4), 53-64.
- Bissell, A. N., & Lemons, P. P. (2006). A New Method for Assessing Critical Thinking in the Classroom. *BioScience*, 56(1), 66-72.
- Bizzell, P. (1992). *Academic Discourse and Critical Consciousness*. Pittsburgh and London: University of Pittsburgh Press.
- Bizzell, P. (2005). Persuasion and Argument: Coterminous? *Pedagogy*, 5(2), 317-323.
- Blair, D., & Collins, P. (Eds.). (2000). *English in Australia*. Philadelphia PA: John Benjamins Pub Co.
- Bock, Z., & Winburg, C. (1993). Literary Criticism and Background Knowledge: Readings of Oswald Mtshali's "Reapers in a Mealiefield". *Language in Academic Development at UCT*, 68 - 81.

- Bourgeois, P., & Hess, U. (2008). The impact of social context on mimicry. *Biological Psychology, 77*, 343-352.
- Bowl, M. (2001). Experiencing the barriers: non-traditional students entering higher education. *Research Papers in Education, 16*(2), 141-160.
doi:10.1080/02671520110037410
- Boyd, V. S., Hunt, P. F., Kandell, J. J., & Lucas, M. S. (2003). Relationship between identity processing style and academic success in undergraduate students. *Journal of College Student Development, 44*(2), 155-167.
- Bradley, D., Noonan, P., Nugent, H., & Scales, B. (2008). *Review of Australian Higher Education. Final Report*. Retrieved from Canberra:
http://www.innovation.gov.au/HigherEducation/Documents/Review/PDF/Higher%20Education%20Review_one%20document_02.pdf
- Bretag, T. (2007). The emperor's new clothes: yes, there is a link between English language competence and academic standards. *People and Place, 15*(1), 13-21.
- Brinkworth, R., McCann, B., Matthews, C., & Nordström, K. (2009). First year expectations and experiences: student and teacher perspectives. *Higher Education, 58*(2), 157-173. doi:10.1007/s10734-008-9188-3
- Brownlee, J., Walker, S., Lennox, Exley, B., & Pearce, S. (2009). The first year university experience: using personal epistemology to understand effective learning and teaching in higher education. *Higher Education*.
doi:10.1007/s10734-009-9212-2
- Bull, G., & Anstey, M. (2003). *Literacy Lexicon*. Australia: Pearson.
- Buzan, T. (1993). *The Mind Map Book*: BBC Books.
- Bye, D., Pushkar, D., & Conway, M. (2007). Motivation, interest, and positive affect in traditional and nontraditional undergraduate students. *Adult Education Quarterly, 57*(2), 141-158.

- Cadence. (2016). The graduate effect: higher education spillovers to the Australian workforce. Report for Universities Australia.
- Callahan, R., & Boyle, A. (2017). *A regional university's approach to connect and prepare distance education students' transition to study*. Paper presented at the Students, Transitions, Achievement, Retention and Success, Adelaide. Emerging Initiative retrieved from <http://unistars.org/papers/STARS2017/01F.pdf>
- Campbell, R., & Green, D. (2006). *Literacies and learners* (R. Campbell & D. Green Eds. 3rd ed.). Australia: Pearson.
- Chapman, V. G., & Inman, M. D. (2009). Rubrics or Creativity/Metacognitive Development? *Education Digest*, 75(2), 53-56.
- Cheng, L., Watanabe, Y., and A. Curtis (Ed.) (2004). *Washback in Language Testing: Research Contexts and Methods*. Mahwah New Jersey: Lawrence Erlbaum and Associates.
- Chun, M. (2010). Taking Teaching to (Performance) Task: Linking Pedagogical and Assessment Practices. *Change*, 42(2), 22-29.
- Coates, H. (2009). *Engaging Students for Success: Australasian student engagement report: Australasian survey of student engagement*. Retrieved from http://research.acer.edu.au/cgi/viewcontent.cgi?article=1017&context=higher_education
- Coates, H. (2010). Development of the Australasian survey of student engagement (AUSSE). *Higher Education*, 60(1), 1-17. doi:10.1007/s10734-009-9281-2
- Cochran-Smith, M. (2005). The New Teacher Education: For Better or for Worse? *Educational researcher*, 34(7), 3-17.
- Coleman, L. (2012). Incorporating the notion of recontextualisation in academic literacies research: the case of a South African vocational web design and development course. *Higher Education Research & Development*, 31(3), 325-338. doi:10.1080/07294360.2011.631519

- Collier, P. J., & Morgan, D. L. (2008). "Is that paper really due today?": differences in first-generation and traditional college students' understandings of faculty expectations. *Higher Education*, 55(4), 425-446. doi:10.1007/s10734-007-9065-5
- Conway, J. M., & Andrews, D. (2016). A school wide approach to leading pedagogical enhancement: An Australian perspective. *Journal of Educational Change*, 17(1), 115-139. doi:10.1007/s10833-015-9258-0
- Corden, A., & Sainsbury, R. (2006). *Using verbatim quotations in reporting qualitative social research: researchers' views*. Retrieved from York: <https://www.york.ac.uk/inst/spru/pubs/pdf/verbquotresearch.pdf>
- Costa, A. L. (2008). The Thought-Filled Curriculum. *Educational Leadership*, 65(5), 20-24. Review of: Figurative language and figurative thought : New York, Oxford: Oxford University Press, 1998. 195 pp. \$14.95 (pb.), 34 C.F.R. (2002).
- Coxhead, A. (2000a). The Academic Word List. Retrieved from <http://www.victoria.ac.nz/lals/resources/academicwordlist>
- Coxhead, A. (2000b). A New Academic Word List. *TESOL Quarterly*, 34(2), 213-238. doi:10.2307/3587951
- Coxhead, A., & Byrd, P. (2007). Preparing writing teachers to teach the vocabulary and grammar of academic prose. *Journal of Second Language Writing*, 16(3), 129-147. doi:10.1016/j.jslw.2007.07.002
- Craven, G., Beswick, K., Fleming, J., Fletcher, T., Green, M., Jensen, B., . . . Rickards, F. (2014). *Action Now: Classroom Ready Teachers*. Retrieved from Canberra: file:///C:/Users/Lynette/Desktop/PDFs/PDFs/action_now_classroom_ready_teachers_print.pdf
- Creswell, J. W. (2013). *Qualitative inquiry & research design : choosing among five approaches* (3rd edition. ed.). Thousand Oaks: Sage Publications.

- Crisp, G., Palmer, E., Turnbull, D., Nettelbeck, T., Ward, L., LeCouteur, A., . . . Schneider, L. (2009). First year student expectations: Results from a university-wide student survey. *Journal of University Teaching & Learning Practice*, 6(1), 11-26.
- Crossan, B., Field, J., Gallacher, J., & Merrill, B. (2003). Understanding Participation in Learning for Non-traditional Adult Learners: Learning careers and the construction of learning identities. *British Journal of Sociology of Education*, 24(1), 55-67. doi:10.1080/01425690301907
- Crossley, S. A., Salsbury, T., & McNamara, D. S. (2012). Predicting the proficiency level of language learners using lexical indices. *Language Testing*, 29(2), 243-263. doi:10.1177/0265532211419331
- Croucher, G. (2017, May 9 2017). University fees and cuts, Opinion piece. *The Conversation*. Retrieved from <https://theconversation.com/federal-budget-2017-whats-changing-in-education-77177>
- Crystal, D. (2004). *Making Sense of Grammar*. Essex: Pearson.
- Culican, S. J. (2005). Deakin, ACT: Australian Association for Research in Education.
- Daniels, H. (2001). *Vygotsky and Pedagogy*. Oxford: RoutledgeFalmer.
- Davies, M. (2013). Critical thinking and the disciplines reconsidered. *Higher Education Research & Development*, 32(4), 529-544. doi:10.1080/07294360.2012.697878
- DEEWR. (2010). *English Language Standards for higher Education*. Retrieved from <http://aall.org.au/sites/default/files/FinalEnglishLanguageStandardsMay2012.pdf>
- Deloitte. (2015). The importance of universities to Australia's prosperity. Deloitte Access Economics. Retrieved from: www2.deloitte.com/au/en/./importance-universities-australias-prosperity.html

- DeNeve, K. M., & Heppner, M. J. (1997). Role play simulations: The assessment of an active learning technique and comparisons with traditional lectures. *Innovative Higher Education*, 21(3), 231-246. doi:10.1007/bf01243718
- Department of Immigration and Border Protection. Retrieved from <https://www.border.gov.au/Trav/Stud/More/Student-Visa-English-Language-Requirements>
- Donesch-Jezo, E. (2010). Teaching academic discourse writing in ESP courses for medical students and professionals. *US-China Foreign Language*, 8(1), 32-39.
- Edwards-Groves, C. J., & Hoare, R. L. (2012). Talking to Learn: Focussing teacher education on dialogue as a core practice for teaching and learning.,. *Australian Journal of Teacher Education*., 37(8).
- Edwards, R., Ivanič, R., & Mannion, G. (2009). The scrumpled geography of literacies for learning. *Discourse: Studies in the Cultural Politics of Education*, 30(4), 483-499. doi:10.1080/01596300903237248
- Elander, J., Harrington, K., Norton, A., Robinson, H., & Reddy, P. (2006). Complex skills and academic writing: a review of evidence about the types of learning required to meet core assessment criteria. *Assessment & Evaluation in Higher Education*, 31(1), 71-90.
- Elder, C., Bright, C., & Bennett, S. (2007). The role of language proficiency in academic success: Perspectives from a New Zealand university. *Melbourne Papers in Language Testing (MPLT)*, Volume 12(Issue 1).
- Faragher, & Huijser, H. (2014). Exploring evidence of higher order thinking skills in the writing of first year undergraduates *The International Journal of the First Year in Higher Education* 5(2), 33-44
- Faragher, L. (1995). *Reading for riches: a Vygotskyan analysis of english writing by D.E.T matriculants*. (M.Ed), University of Stellenbosch, Stellenbosch. Retrieved from http://eprints.usq.edu.au/21705/1/Faragher_MEd_SU_Dissertation.pdf
<http://eprints.usq.edu.au/id/eprint/21705>

- Faragher, L. (2011). *Is it the Thought that counts?* Paper presented at Forging new directions in ALL, Adelaide. Conference paper retrieved from <http://www.aall.org.au/clpd/aall2011/program.shtml>
- Fernsten, L. (2005). Discourse and difference. *International Journal of Inclusive Education*, 9(4), 371-387. doi:10.1080/13603110500147138
- Flateby, T. (2010). A System for Fostering and Assessing Writing and Critical Thinking Skills. (Cover story). *Assessment Update*, 22(3), 1-15.
- Freeman, M. H. (1995). Metaphor making meaning: Dickinson's conceptual universe. *Journal of Pragmatics*, 24(6), 643-666. doi:10.1016/0378-2166(95)00006-e
- Gammill, D. M. (2006). Learning the write way. *Reading Teacher*, 59(8), 754-762. doi:10.1598/RT.59.8.3
- Gibson, L. (2011). Student-Directed Learning: An Exercise in Student Engagement. *College Teaching*, 59(3), 95-101. doi:10.1080/87567555.2010.550957
- Gourlay, L. (2009). Threshold practices: becoming a student through academic literacies. *London Review of Education*, 7(2), 181-192. doi:10.1080/14748460903003626
- Graham, J. G. (1987). English Language Proficiency and the Prediction of Academic Success. *TESOL Quarterly*, 21(3), 505-521. doi:10.2307/3586500
- Green, T., & Agosti, C. (2011). Apprenticing students to academic discourse: Using student and teacher feedback to analyse the extent to which a discipline-specific academic literacies program works. *Journal of Academic Language & Learning*, 5(11), 18 - 34.
- Grimberg, B. I., & Hand, B. (2009). Cognitive Pathways: Analysis of students' written texts for science understanding. *International Journal of Science Education*, 31(4), 503-521. doi:http://dx.doi.org/10.1080/0950069070170480

- Haggis, T. (2006). Pedagogies for diversity: retaining critical challenge amidst fears of 'dumbing down'. *Studies in Higher Education, 31*(5), 521-535.
- Halx, M. D., & Reybold, L. E. (2006). A pedagogy of force: Faculty perspectives of critical thinking capacity in undergraduate students. *The Journal of General Education, 54*(4), 293-315.
- Hand, C., & Payne, E. M. (2008). First-Generation College Students: A Study of Appalachian Student Success. *Journal of Developmental Education, 32*(1), 4-15.
- Hanson, W. E., Creswell, J. W., Clark, V. L. P., Petska, K. S., & Creswell, J. D. (2005). Mixed methods research designs in counseling psychology. *Journal of Counseling Psychology, 52*(2), 224-235. doi:10.1037/0022-0167.52.2.224
- Harper, R., Prentice, S., & Wilson, K. (2011). English language perplexity: Articulating the tensions in the DEEWR "Good Practice Principles". *The International Journal of the First Year in Higher Education, 2*(1), 36-48. doi:10.5204/intjfyhe.v2i1.51
- Hart, C. (2012). Factors Associated With Student Persistence in an Online Program of Study: A Review of the Literature. *Journal of Interactive Online Learning, 11*(1), 19-42.
- Heagney, M., & Benson, R. (2017). How mature age students succeed in higher education: implications for institutional support. *Journal of Higher Education Policy and Management, 39*(3), 216-234. doi:10.1080/1360080X.2017.1300986
- Heath, S. B. (1983). *Ways with words: language life and work in communities and classrooms*. Cambridge: Cambridge University Press.
- Hyland, K. (1997). Persuasion and context: The pragmatics of academic metadiscourse. *Journal of Pragmatics, 30*, 437-455.
- International student numbers surge to record high. (2017). [Press release]. Retrieved from <https://www.universitiesaustralia.edu.au/Media-and-Events/media-releases/International-student-numbers-surge-to-record-high#.WML3QzuGPcs>

- Ivanic, R., Edwards, R., Satchwell, C., & Smith, J. (2007). Possibilities for pedagogy in further education: harnessing the abundance of literacy. *British Educational Research Journal*, 33(5), 703-721. doi:10.1080/01411920701582298
- Jackson, C. (2016). Let's be guided by the facts on attrition [Press release]. Retrieved from <https://www.universitiesaustralia.edu.au/Media-and-Events/media-releases/Let-s-be-guided-by-the-facts-on-attrition---Catriona-Jackson-oped#.WMMBxDuGPcs>
- James, R. (2008). *Participation and equity*. Retrieved from Melbourne: <http://hdl.handle.net/10536/DRO/DU:30006777>
- James, R., Jennings, C., & Krause, K.-L. (2010). *The First Year Experience in Australian Universities: Findings from 1994 - 2009*. Retrieved from Melbourne and Brisbane: http://www.cshe.unimelb.edu.au/research/experience/docs/FYE_Report_1994_to_2009.pdf
- Johnson, R. B., & Onwuegbuzie, A. J. (2004). Mixed Methods Research: A Research Paradigm Whose Time Has Come. *Educational researcher*, 33(7), 14-26. doi:10.3102/0013189X033007014
- Kahu, E. R., Stephens, C., Leach, L., & Zepke, N. (2013). The engagement of mature distance students. *Higher Education Research & Development*, 32(5), 791-804. doi:10.1080/07294360.2013.777036
- Kandlbinder, P., & Peseta, T. (2009). Key concepts in postgraduate certificates in higher education teaching and learning in Australasia and the United Kingdom. *International Journal for Academic Development*, 14(1), 19-31. doi:10.1080/13601440802659247
- Kessler, C., & Quinn, M. E. (1987). Language Minority Children's Linguistic and Cognitive Creativity. *Journal of Multilingual and Multicultural Development*, 8(1 and 2), 173-186.

- Khani, R., & Tazik, K. (2013). Towards the Development of an Academic Word List for Applied Linguistics Research Articles. *RELC Journal*, 44(2), 209-232. doi:10.1177/0033688213488432
- Kift, S. (2009a, 16th November 2009). Solving the first year struggle for new students. *QUT Expert Guide*. Retrieved from H:\LTSU\First Year Experience\Sally Kift ALTC.mht
- Kift, S. (2009b). A Transition Pedagogy: The First Year Experience Curriculum Design Symposium 2009. *HERDSA News*, 31(1), 1, 3 and 4.
- Kift, S. (2008). The next, great first year challenge:sustaining, coordinating and embedding coherent institution-wide approaches to enact the FYE as “everybody's business”. Paper presented at the 11th International Pacific Rim First Year in Higher Education Conference, An Apple for the Learner: Celebrating the First Year Experience, Hobart.
- Kift, S., Nelson, K., & Clarke, J. (2010). Transition pedagogy: A third generation approach to FYE - A case study of policy and practice for the higher education sector. *The International Journal Of The First Year In Higher Education*, 1(1), 1-20. Retrieved from <https://fyhejournal.com/article/view/13>. doi:10.5204/intjfyhe.v1i1.13
- Kim, K., Lee, Y., & Lee, C. H., (2012). College students’ style of language usage: clues to creativity. *Perceptual and Motor Skills*, 114(1), 43-50. doi:10.2466/04.21.28.PMS.114.1.43-50
- Kincheloe, J. L. (2005). On to the Next Level: Continuing the Conceptualization of the Bricolage. *Qualitative Inquiry*, 11(3), 323-350. doi:10.1177/1077800405275056
- King, A. (1993). From sage on the stage to guide on the side. *College Teaching*, 41(1), 30.
- Knoch, U. (2008). The assessment of academic style in EAP writing: The case of the rating scale. *Melbourne Papers in Language Testing (MPLT)*, 13(1).

- Kohn, A. (2004). Challenging students-and how to have more of them. *Phi Delta Kappan*, 86, 184-194.
- Kozulin, A. (1990). *Vygotsky's Psychology*. Cambridge: Harvard University Press.
- Kozulin, A. (2004). Vygotsky's theory in the classroom: Introduction. *European Journal of Psychology of Education - EJPE (Instituto Superior de Psicologia Aplicada)*, 19(1), 3-7.
- Krause, K. (2006). *On being strategic about the first year: Keynote paper presented at First Year Forum*,. Paper presented at the First Year Forum, Queensland University of Technology,. <http://www3.griffith.edu.au/03/ltn/docs/GIHE-First-Year-Experience.pdf>
- Laird, T. F. N., Chen, D., & Kuh, G. D. (2008). Classroom practices at institutions with higher-than-expected persistence rates: What student engagement data tell us. *New Directions for Teaching & Learning*, 2008(115), 85-99.
doi:10.1002/tl.327
- Lake, D. (1999). Helping students to go Solo: teaching critical numeracy in the biological sciences. *Journal of Biological Education (Society of Biology)*, 33(4), 191.
- Lakoff, G., & Johnson, M. (1980a). The Metaphorical Structure of the Human Conceptual System. *Cognitive Science* 4, 195 - 208.
- Lakoff, G., & Johnson, M. (1980b). *Metaphors we live by*. Chicago and London: University of Chicago Press.
- Laufer, B., Elder, C., Hill, K., & Congdon, P. (2004). Size and strength: do we need both to measure vocabulary knowledge? *Language Testing*, 21(2), 202-226.
doi:10.1191/0265532204lt277oa
- Lea, M. & Street, B. V. (1998). Student writing in higher education: An academic literacies approach. *Studies in Higher Education*, 23(2), 157.

- Lea, M. & Street, B. V. (2006). The "Academic Literacies" Model: Theory and Applications. *Theory into practice*, 45(4), 368-377.
doi:10.1207/s15430421tip4504_11
- Lea, M. (2004). Academic literacies: a pedagogy for course design. *Studies in Higher Education*, 29(6), 739-756. doi:10.1080/0307507042000287230
- Leathwood, C., & O'Connell, P. (2003). 'It's a struggle': the construction of the 'new student' in higher education. *Journal of Education Policy*, 18(6), 597-615.
doi:10.1080/0268093032000145863
- Leitner, G. (2004). Australia's many voices : Australian English--the national language. Berlin: Mouton de Gruyter.
- Lenko-Szymanska, A. (2000). How to Trace the Growth in Learners' Active Vocabulary? *A Corpus-based Study*. Paper presented at the Teaching and Learning by Doing Corpus Analysis, Graz.
- Leong, P. A. (2013). Thinking critically: a look at students' critiques of a research article. *Higher Education Research & Development*, 32(4), 575-589.
doi:10.1080/07294360.2012.708322
- Levin, D. M., Hammer, D., & Coffey, J. E. (2009). Novice Teachers' Attention to Student Thinking. *Journal of Teacher Education*, 60(2), 142-154.
doi:10.1177/0022487108330245
- Li, L., & MacGregor, L. J. (2010). Investigating the receptive vocabulary size of university-level Chinese learners of English: how suitable is the Vocabulary Levels Test? *Language and Education*, 24(3), 239-249.
- Lillis, T. (2003). Student writing as 'academic literacies'. *Language and Education*, 17(3), 192-207.
- Lillis, T., & Scott, C. (2007). Defining academic literacies research: issues of epistemology, ideology and strategy. *Journal of Applied Linguistics*, 4(1), 5-32.

- Lindqvist, P., & Nordanger, U. (2010). Encounters in metaphors: Connecting the bridgeheads of teachers' practical knowledge and professional language. *International Journal of Pedagogies and Learning*, 6(1), 49-61.
- Lizzio, A., & Wilson, K. (2013). Early intervention to support the academic recovery of first-year students at risk of non-continuation. *Innovations in Education & Teaching International*, 50(2), 109-120. doi:10.1080/14703297.2012.760867
- Lombard, B., J., J. (2011). Revisiting the value of rubrics for student engagement in assessment and feedback in the South African university classroom. *The journal for transdisciplinary research in Southern Africa (TD)*, 7(2), 367-382.
- Lopez, M., Ponce, H., & Quezada, R. (2010). Use of interactive graphic organisers for developing cognitive skills in higher education. *International Journal of Digital Society*, 1(2).
- Maddern, K. (2012). Get them ready for take-off. *Times Educational Supplement*(5003), 4-7.
- Malvern, D., & Richards, B. (2002). Investigating accommodation in language proficiency interviews using a new measure of lexical diversity. *Language Testing*, 19(1), 85-104. doi:10.1191/0265532202lt221oa
- Mannion, G., & Ivanič, R. (2007). Mapping literacy practices: theory, methodology, methods. *International Journal of Qualitative Studies in Education (QSE)*, 20(1), 15-30. doi:10.1080/09518390600924063
- Mansilla, V. B., Duraisingh, E. D., Wolfe, C. R., & Haynes, C. (2009). Targeted Assessment Rubric: An Empirically Grounded Rubric for Interdisciplinary Writing. *Journal of Higher Education*, 80(3), 334-353.
- Martin, S., & Koob, S. F. (2017, January 18, 2017). Third of university students failing to complete course. *The Australian*.
- Marzano, R., (2001). *Designing a New Taxonomy of Educational Objectives* (first ed.). Thousand Oaks: Corwin Press, Inc.

- Marzano, R., & Kendall, J. S. (2007). *The New Taxonomy of Educational Objectives: Corwin*.
- Marzano, R., & Kendall, J. S. (2008). *Designing and Assessing Educational Objectives: Applying the New Taxonomy: Corwin*.
- McCarron, G. P., & Inkelas, K. K. (2006). The gap between educational aspirations and attainment for first-generation college students and the role of parental involvement. *Journal of College Student Development, 47*(5), 534-549.
- McIntyre, J., & Todd, N. (2012, 26-29 Jun 2012,). *Building pathways to higher education success: a longitudinal case study*. Paper presented at the 15th International First Year in Higher Education Conference: New Horizon (FYHE 2012), Brisbane, Australia.
- McIntyre, J., Todd, N., Huijser, H., & Tehan, G. (2012). Building pathways to academic success. A Practice Report. *The International Journal of the First Year in Higher Education, 3*(1), 109-118. doi:10.5204/intjfyhe.v3i1.110
- McKenzie, K., & Schweitzer, R. (2001). Who Succeeds at University? Factors predicting academic performance in first year Australian university students,. *Education Research & Development, 20*(1), 21-33.
doi:10.1080/07924360120043621
- McMillan, J., & Western, J. (2000). Measurement of the socio-economic status of Australian higher education students. *Higher Education, 39*(2), 223-247.
- McNaught, K., & McIntyre, F. (2011). When a pass is not a pass. *Journal of Academic Language and Learning, 5*(1), A-100-A-109.
- Menary, R. (2007). Writing as thinking. *Language Sciences, 29*(5), 621-632.
doi:10.1016/j.langsci.2007.01.005
- Merriam, S. B. (1998). *Qualitative Research and Case Study Applications in Education* (Second ed.). San Francisco: Jossey-Bass.

- Meyers, N. M., & Nulty, D. D. (2009). How to use (five) curriculum design principles to align authentic learning environments, assessment, students' approaches to thinking and learning outcomes. *Assessment & Evaluation in Higher Education*, 34(5), 565-577. doi:10.1080/02602930802226502
- Milburn, C. (2012). Tuning in to those dropping out. *The Age*. Retrieved from file:///F:/PDFs/PDFs/Tuning%20in%20to%20those%20dropping%20out.htm
- Mitchell, A. G. (1965). *The pronunciation of English in Australia* (Rev. ed. ed.). Sydney: Angus and Robertson.
- Morrison, G. (2016). *Transition to university: managing constraints and successfully persisting with study on a pathway program*. (PhD Research), University of Southern Queensland. Retrieved from <https://eprints.usq.edu.au/29506/2/13%20Jul%2016%20Clean%20copy%20of%20>
- Morse, J. M., Barrett, M., Mayan, M., Olson, K., & Spiers, J. (2002). Verification Strategies for Establishing Reliability and Validity in Qualitative Research. *International Journal of Qualitative Methods*, 1(2), 1-19.
- Murphy, H., & Roopchand, N. (2003). Intrinsic Motivation and Self-esteem in Traditional and Mature Students at a Post-1992 University in the North-east of England. *Educational Studies*, 29(2-3), 243-259. doi:10.1080/03055690303278
- Murray, N. (2012). Ten 'Good Practice Principles' ... ten key questions: considerations in addressing the English language needs of higher education students. *Higher Education Research & Development*. Retrieved from <http://ezproxy.usq.edu.au/login?url=http://search.ebscohost.com/login.aspx?direct=true&db=a9h&AN=74278471&site=ehost-live>
- Nakata, M. (2012). CDSI Plenary: Widening participation, social inclusion, closing the gap. *Journal of Academic Language & Learning*, 6(12), 11-18.
- Negy, C. (2003). Undergraduate students' adaptation to college: does being married make a difference? *Journal of College Student Development*, 44(5), 670-690.

- Nelson, K., Quinn, C., Marrington, A., & Clarke, J. (2012). Good practice for enhancing the engagement and success of commencing students. *Higher Education*, 63(1), 83-96. doi:10.1007/s10734-011-9426-y
- Nelson, K., & Kift, S. (2005, 2005). *Beyond Curriculum reform: embedding the transition experience*. Paper presented at the HERDSA 2005, Sydney.
- Nelson, K., Kift, S., Humphreys, J., & Harper, W. (2006). *A blueprint for enhanced transition: taking an holistic approach to managing student transition into a large university*. Paper presented at the First Year in Higher Education Conference,, Gold Coast, Australia.
- Noor, K. B. M. (2008). Case Study: A Strategic Research Methodology. *American Journal of Applied Sciences*, 5(11), 1602-1604.
- Norton, A., & Cakitaki, B. (2016). *Mapping Australian higher education 2016*. Retrieved from Melbourne: <https://grattan.edu.au/wp-content/uploads/2016/08/875-Mapping-Australian-Higher-Education-2016.pdf>
- O'Donnell, V. L., & Tobbell, J. (2007). The transition of adult students to higher education: legitimate peripheral participation in a community of practice? *Adult Education Quarterly*, 57(4), 312-328.
- O'Keeffe, P. (2013). A sense of belonging: improving student retention. *College Student Journal*, 47(4), 605-613.
- O'Neill, S. (2015). *Literacy and Learning*. Course notes. University of Southern Queensland. Toowoomba.
- O'Neill, S., & Geoghegan, D. (2011). First year pre-service teachers' views about literacy: Exploring the breadth and depth of their pedagogical needs. *International Journal of Pedagogies & Learning*, 6(3), 187-205.
- Oliver, R., Vanderford, S., & Grote, E. (2012). Evidence of English language proficiency and academic achievement of non-English-speaking background

- students. *Higher Education Research & Development*, 31(4), 541-555.
doi:10.1080/07294360.2011.653958
- Pampaka, M., Williams, J., & Hutcheson, G. (2012). Measuring students' transition into university and its association with learning outcomes. *British Educational Research Journal*, 38(6), 1041-1071. doi:10.1080/01411926.2011.613453
- Panadero, E., & Jonsson, A. (2013). The use of scoring rubrics for formative assessment purposes revisited: A review. *Educational Research Review*, 9, 129-144. doi:http://dx.doi.org/10.1016/j.edurev.2013.01.002
- Pascarella, E. T., Pierson, C. T., Wolniak, G. C., & Terenzini, P. T. (2004). First-Generation College Students. *Journal of Higher Education*, 75(3), 249-284.
- Pitman, T., & Koshy, P. (2015). Uni drop-out rates show need for more support, not capped enrolments. Retrieved from <https://theconversation.com/uni-drop-out-rates-show-need-for-more-support-not-capped-enrolments-45577>
- Poehner, M. E., & Lantolf, J. P. (2010). Vygotsky's Teaching-Assessment Dialectic and L2 Education: The Case for Dynamic Assessment. *Mind, Culture & Activity*, 17(4), 312-330. doi:10.1080/10749030903338509
- Polkinghorne, D. E. (2005). Language and meaning: Data collection in qualitative research. *Journal of Counseling Psychology*, 52(2), 137-145. doi:10.1037/0022-0167.52.2.137
- Ponterotto, J. G. (2005). Qualitative research in counseling psychology: A primer on research paradigms and philosophy of science. *Journal of Counseling Psychology*, 52(2), 126-136. doi:10.1037/0022-0167.52.2.126
- Priest, A.-M. (2009). "I have understanding as well as you": Supporting the language and learning needs of students from low socio-economic status backgrounds. *Journal of Academic Language and Learning*, 3(2), A1-A12.
- Pugh, S. L., Hicks, J. W., & Davis, M. (1997). *Metaphorical Ways of Knowing*. Urbana Illinois: National Council of Teachers of English.

- Ramson, W. S. (2001). Anna Wierzbicka and the Trivialization of Australian Culture. *Australian Journal of Linguistics*, 21(2), 181-194.
doi:10.1080/07268600120080550
- Reason, R., Terenzini, P., & Domingo, R. (2006). First Things First: Developing Academic Competence in the First Year of College*. *Research in Higher Education*, 47(2), 149-175. doi:10.1007/s11162-005-8884-4
- Riege, A. M. (2003). Validity and reliability tests in case study research: a literature review with “hands-on” applications for each research phase. *Qualitative Market Research: An International Journal*, 6(2), 75-86.
doi:10.1108/13522750310470055
- Robbins, S. B., Lauver, K., Le, H., Davis, D., Langley, R., & Carlstrom, A. (2004). Do Psychosocial and Study Skill Factors Predict College Outcomes? A Meta-Analysis. *Psychological Bulletin*, 130(2), 261-288. doi:10.1037/0033-2909.130.2.261
- Roberts, T., & Billings, L. (2008). Thinking Is Literacy, Literacy Thinking. *Educational Leadership*, 65(5), 32-36.
- Robinson, B. (2016). University enrolments stable [Press release]. Retrieved from <https://www.universitiesaustralia.edu.au/Media-and-Events/media-releases/University-enrolments-stable#.WMMAfTuGPcs>
- Rosyati, A. R., & Rosna, A. H. (2008). *The Relationship between Critical Thinking and Language Proficiency of Malaysian Undergraduates*. Paper presented at the EDU-COM International Conference Sustainability in Higher Education: Directions for Change, Edith Cowan University, Perth Australia.
<http://ro.ecu.edu.au/ceducom/36>
- Rovai, A. P. (2003). In search of higher persistence rates in distance education online programs. *The Internet and Higher Education*, 6(1), 1-16.
doi:http://dx.doi.org/10.1016/S1096-7516(02)00158-6

- Scutter, S., Palmer, E., Luzeckyj, A., Burke da Silva, K., & Brinkworth, R. (2011). What do commencing undergraduate students expect from first year university? *International Journal of the first Year in Higher Education*, 2(1), 8 - 20.
doi:10.5204/intjfyhe.v2i1.54
- Seargeant, P. (2009). Metaphors of possession in the conceptualisation of language. *Language & Communication*, 29(4), 383-393. doi:DOI: 10.1016/j.langcom.2009.02.001
- Sheridan, V. (2011). A holistic approach to international students, institutional habitus and academic literacies in an Irish third level institution. *Higher Education*, 62(2), 129-140. doi:10.1007/s10734-010-9370-2
- Singer, D., & Revenson, T. A. (1978). *A Piage primer: how a child thinks* (First ed.). New York: Plume.
- Smith, C. H. (2012). Interrogating Texts: From Deferent to Efferent and Aesthetic Reading Practices. *Journal of Basic Writing*, 31(1), 59-79.
- Southgate, E., Douglas, H., Scevak, J., Macqueen, S., Rubin, M., & Lindell, C. (2014). The academic outcomes of first-in-family in an Australian university: An exploratory study. *International Studies in Widening Participation*, Vol. 1(2), 31-45.
- Stoll, L. (2007). *Professional learning communities divergence, depth and dilemmas* K. S. Louis (Ed.) *Professional learning* (pp. xx, 207 p). Retrieved from <http://ezproxy.usq.edu.au/login?url=http://site.ebrary.com/lib/unisouthernqld/Doc?id=10197007>
- Swales, J. (1990). *Genre analysis : English in academic and research settings*. Cambridge: Cambridge University Press.
- Thomson, P., & Hall, C. (2008). Opportunities missed and/or thwarted? 'Funds of knowledge' meet the English national curriculum. *Curriculum Journal*, 19(2), 87-103. doi:10.1080/09585170802079488

- Tickell, G., & Smyrnios, K. X. (2005). Predictors of Tertiary Accounting Students' Academic Performance: A comparison of Year 12-to-university students with TAFE-to-university students. *Journal of Higher Education Policy and Management*, 27(2), 239-259. doi:10.1080/13600800500120142
- Tinto, V. (1974). University productivity and the organization of higher education in Turkey. *Higher Education*, 3(3), 285-302. doi:10.1007/BF00168209
- Tinto, V. (1987). *Leaving college : rethinking the causes and cures of student attrition*. Chicago: University of Chicago Press.
- Tinto, V. (2009a). How to Help Students Stay and Succeed. *Chronicle of Higher Education* 55, A33-A33.
<http://ezproxy.usq.edu.au/login?url=http://search.ebscohost.com/login.aspx?direct=true&db=a9h&AN=36546638&site=ehost-live>
- Tinto, V. (2009b). *Taking student retention seriously: Rethinking the first year of university*. Paper presented at the FYE Curriculum Design Symposium 2009,, Queensland University of Technology, Brisbane, Australia.
http://www.fyecd2009.qut.edu.au/resources/SPE_VincentTinto_5Feb09.pdf
- Trotter, E., & Roberts, C. A. (2006). Enhancing the early student experience. *Higher Education Research and Development*, 25(4), 371-386.
 doi:10.1080/07294360600947368
- Turley, E. D., & Gallagher, C. W. (2008). On the "Uses" of Rubrics: Reframing the Great Rubric Debate. *The English Journal*, 97(4), 87-92. doi:10.2307/30047253
- Uchiyama, K. P., & Radin, J. L. (2009). Curriculum Mapping in Higher Education: A Vehicle for Collaboration. *Innovative Higher Education*, 33(4), 271-280.
 doi:10.1007/s10755-008-9078-8
- USQ Annual Report*. (2012). Retrieved from Toowoomba: *USQ final 2016 annual report*. (2016). Retrieved from Toowoomba: <https://www.usq.edu.au/-/media/usq/about-usq/about-us/annual-report/final-2016-annual-report.ashx?la=en>

- Van Gelder, T. (2005). Teaching Critical Thinking: Some Lessons From Cognitive Science. *College Teaching*, 53(1), 41-48. doi:10.3200/CTCH.53.1.41-48
- Van Gelder, T. (2015). Using argument mapping to improve critical thinking skills.: In M. Davies and R. Barnett (Ed.), *The Palgrave Handbook of Critical Thinking in Higher Education*. (pp. 183-192.): Palgrave Macmillan.
- VanWynsberghe, R., & Khan, S. (2007). Redefining Case Study. *International Journal of Qualitative Methods*, 6(2), 1-10.
- Villegas, A. M. (2007). Dispositions in teacher education: a look at social justice. *Journal of Teacher Education*, 58(5), 370-380. doi:10.1177/0022487107308419
- Vygotsky, L. S. (1962). *Language and Thought*. Cambridge: The MIT Press.
- Vygotsky, L. S. (1986). *Language and Thought*. Cambridge: The MIT Press.
- Wallace, A., Schirato, T., & Bright, P. (1999). *Bginning university: thinking, researching and writing for success*. Sydney: Allen and Unwin.
- Weimer, M. (2013). *Learner-centered teaching five key changes to practice* (pp. xiv, 287 p). Retrieved from <http://ezproxy.usq.edu.au/login?url=http://site.ebrary.com/lib/unisouthernqld/Doc?id=10653948>
- Wertsch, J. V. (1985). *Vygotsky and the Social Formation of Mind*. Cambridge: Harvard University Press.
- Whittington, V., Ebbeck, M., Diamond, A., & Hoi Yin Bonnie, Y. (2009). A pathway to enhancing professionalism: Building a bridge between TAFE and university early childhood qualifications. *Australasian Journal of Early Childhood*, 34(1), 27-35.
- Wierzbicka, A. (1997). *Understanding Cultures Through their Key Words* (First ed. Vol. 8). New York Oxford: Oxford University Press.

- Wierzbicka, A. (2001). Australian Culture and Australian English: A Response to William Ramson. *Australian Journal of Linguistics*, 21(2), 195-214.
doi:10.1080/07268600120080569
- Willis, J. (2007). Foundations of qualitative research : interpretive and critical approaches. Thousand Oaks: Sage Publications.
- Wilson, K. (2009). Success in first year: the impact of institutional, programmatic and personal interventions on an effective and sustainable first-year student experience'. Paper presented at the First year in higher education conference, Brisbane.
http://www.fyhe.com.au/past_papers/papers09/ppts/Keithia_Wilson_paper.pdf
- Wilson, M. (2007). Why I won't be using rubrics. *The English Journal*, 96(4).
- Wingate, U. (2015). Academic Literacy and Student Diversity: The Case for Inclusive Practice: Channel View Publications.
- Wolf, K., and Stevens., E. (2007). The role of rubrics in advancing and assessing student learning. *The Journal of Effective Teaching*, 7(1), 3-14.
- Woodward-Kron, R. (2008). More than just jargon – the nature and role of specialist language in learning disciplinary knowledge. *Journal of English for Academic Purposes*, 7(4), 234-249. doi:10.1016/j.jeap.2008.10.004
- Worthman, C. (2008). The positioning of adult learners: appropriating learner experience on the continuum of empowerment to emancipation. *International Journal of Lifelong Education*, 27(4), 443-462.
doi:10.1080/02601370802051355
- Yin, R. K. (2014). *Case study research : design and methods* (Fifth edition. ed.). Los Angeles: SAGE.
- Yorke, M., & Thomas, L. (2003). Improving the Retention of Students from Lower Socio-economic Groups. *Journal of Higher Education Policy and Management*, 25(1), 63-74. doi:10.1080/13600800305737

Zainal, Z. (2007). Case study as a research method. *Jurnal Kemanusiaan*, 9, 1-6.

Zepke, N. (2013a). Student engagement: A complex business supporting the first year experience in tertiary education (Vol. 4).

Zepke, N. (2013b). Student engagement: A complex business supporting the first year experience in tertiary education. *The International Journal of the First Year in Higher Education*, , 4(2), 1 -14.

doi:<http://dx.doi.org/10.5204/intjfyhe.v4i2.183>.

APPENDICES

Appendix 1



Appendix Student
Participant data.xlsx

Appendix 2

A copy of the assessment task set for the SWs in this study

The Assignment.

Assignment 2

Description

Length 1750 words

Wtg 55 %

Due date: 8 June 2015

Format: Written comparative analysis (essay)

This written comparative analysis is designed to assess the following course objectives, as listed in course specifications: Objective 3. Understand socio-cultural contexts for language and literacies learning. Objective 4. Identify various approaches to language and literacies learning. Objective 5. Analyse teacher talk and understand the implications for effective literacy teaching. Objective 6. Demonstrate competence in and appropriate use of language and literacy, including spelling, grammar, punctuation and APA referencing. Assignment details: 1. Examine two transcripts of talk (provided on the EDX1170 Study Desk) involving an adult (teacher/parent) and children/a child. Both are instructional settings but one is set in the home environment and is a conversation between a parent and child, while the other is in a classroom and is a conversation between a teacher and students. Please note that the home context is a naturalistic setting and is not a case of home schooling. 2. Working from your learning and the supportive resources provided in the lead up to this assignment, including your knowledge of the role of talk in literate, cultural and social practices from Module 6, analyse the characteristics of the talk in the two situations to compare the effectiveness of literacy pedagogy. Your comparative analysis should discuss the evident differences between the social worlds of home and school, the roles of adults in both settings and the role of

children in both settings. Some questions to consider, though not exhaustive, are: How is learning conducted at home and in school? What are the differences and similarities? Finally, your essay should demonstrate insights about why students in classrooms participate in particular ways and what changes may be necessary to classroom pedagogy because of this. 3. Further guidance in mastering the genre of comparative analysis and the tools and approach to transcript analysis will be provided in lectures, tutorials and resources on the Study Desk. 4. You should have at least five references located through your own research for this essay in addition to those provided to complete the assignment. Notes and supporting documentation:

1. Ensure that you use and refer to the dialogue in the transcripts to support your stance.
2. Ensure your references are listed at the end of the essay and are in APA style.

Appendix 3

Spreadsheet showing the comparison between the AWL and the vocabulary used by the SWs in this study.



AWL analysis
APPENDIX (version 1)