WRITING-CENTRED SUPERVISION FOR POSTGRADUATE STUDENTS

Thesis submitted by

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Abstract

Over the last decade there has been a considerable increase in research which centres on postgraduate supervision and research supervision has recently changed significantly (Grant, 2010; Walker, 2010; McCallin and Nayar, 2012). time postgraduate pedagogy has taken a lesser role in supervision practice compared with the role of supervisor as researcher. More recently supervision pedagogy has taken a more central role in the supervision debates and there is recognition of research teaching as a necessary and sophisticated skill (Grant, 2010; Walker, 2010; McAlpine and Amundsen, 2011). This shift in doctoral training away from viewing the thesis as a product to a pedagogy of training has resulted in a growing field of interest in postgraduate research writing. The emphasis on the research supervision role is beginning to acknowledge the work on postgraduate academic writing (Caffarella and Barnett, 2000; Kumar and Stracke, 2007; Aitchison and Lee, 2010; Catterall et al., 2011; McCallin and Nayar, 2012; Lee and Murray, 2015). However, for many supervisors writing is still seen as 'marginal or ancillary' to the real work of research and consequently there is very little research that 'opens out the complexity of PhD writing practice' (Kamler and Thomson, 2001, 6). This research, located in two disciplines in a Science faculty in a research-intensive university in South Africa, provides a local perspective on supervision pedagogy and research writing in a Science Faculty.

In this thesis, research writing is seen as contextualized social practice in that supervision and writing practices have implications for the development of individual research writers. Within the institution there is little discussion between supervisors or between supervisors and their postgraduate students around research writing. There needs to be sensitivity to the disparate needs of individual students in the context of their research writing. Historically in the context of this thesis, this related to opening up academic literacy practices to historically disadvantaged undergraduate students, but more recently has widened to include all students, including postgraduate students. It has become increasingly important to find out what the writing challenges and practices are for postgraduate students and their supervisors, not only by focusing on their research texts but also by critically engaging with written feedback given to these students as they struggle to engage with the academic discourse of the institution.

This research employs a qualitative approach to investigate the flow of events and processes related to the writing aspect of supervision and the perceptions and reported experiences of both postgraduate students and their supervisors. The thesis considers how participants understand these using a case study approach, consisting of eleven pairs of supervisors their Masters and doctoral students. A variety of data sources are employed including interviews with the participants, and drafts of student writing with written feedback from supervisors.

Some aspects of supervision and postgraduate research writing remain hidden from view as these practices are intensely personal, revolving around the identities of those taking part and power relations which centre on both the relationship between co-supervisors and the supervisor-student relationship. This thesis puts forward a new model of co-supervision i.e. a writing-centred co-supervision model with a content supervisor and a writing supervisor both located within the discipline. This co-supervision model allows the writing co-supervisor to provide a 'safe space' in the writing process for the student. Significantly issues of power between the co-supervisors remain inherent in this model of co-supervision and thus research writing remains to a large extent on the margins of academic work.

A further finding relates to the research writing issues identified by supervisors and/or postgraduate students mainly linked to positioning viz. structure; coherence; argument and flow; voice; and audience. There is little pre-thinking about the process of assisting postgraduate students to write. Despite the identification of some writing issues (either by supervisors and /or students), these are not always linked to *strategies to* enable students to overcome their writing difficulties. The analysis shows that the majority of these relate to the *process* of research writing and *positioning issues* (argument, voice, and audience). Furthermore these strategies are not always made explicit when supervisors work with students and surprisingly there is little match between those suggested by supervisors and those utilised by their students.

Central to this research is the nature of written feedback given to postgraduate students. Supervisors' knowledge of their written feedback practices is critical. The diverse feedback practices of the supervisors are uncovered using a new analytic feedback framework illustrating a continuum of feedback practices varying from big

picture feedback; superficial surface-level feedback; and a combination of the two – mixed feedback. An analysis of the findings show that the majority of the supervisors use mixed feedback as their modus operandi. It is suggested that a shared meta-language regarding feedback would allow supervisors to open a space for an improved feedback dialogue both with their colleagues *and* with their postgraduate research students.

DECLARATION

I, Cheryl Chamberlain (Student Number 032 909/9) declare that this thesis is my

own original work. It is being submitted for the degree of Doctor of Philosophy at the

University of the Witwatersrand, Johannesburg. It has not been submitted before for

any degree or examination, or to any other university.

Cheryl Chamberlain

Date: 15 April 2016

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Chapter 1: Introduction

1.1 Context and Background to the Research

The effectiveness and efficiency of research supervision is attracting increased international scrutiny as the quality of research writing is of critical importance for higher institutions. As increasing emphasis is placed on the general nature of supervision practices internationally (Moses, 1985; Aspland and O'Donaghue, 1994; Pearson and Brew, 2002; Wisker, 2004; Grant, 2010; Walker, 2010; Thomson and Walker, 2010; Paré et al., 2011; McCallin and Nayar, 2012), one area of postgraduate pedagogy: that of research writing, has become increasingly important. In South Africa, over the last few years, the numbers of our postgraduate students are increasing, and the development of research writing is thus becoming more important.

Globally the profile of postgraduate students is changing: there are many more mature postgraduate students and many study part-time or at a distance (Evans and Gruber, 2002; Kamler and Thomson, 2006). Students from developing countries are encouraged in many Western universities and there is an increasing global flow of students. Postgraduate students come with a range of academic experiences and language ability. The culture and norms of the diverse student populations add to the pressure of supervisors coping with the diversifying genres of research writing. Internationally in countries such as Australia and the UK, there is pressure to improve on postgraduate throughput rates (Kamler and Thomson, 2006). This pressure exists in the South African context where locally, low rates of retention, success and progression are seen as a priority (University of the Witwatersrand, Principles of Teaching and Learning, 2005). "Wits is paying particular attention to growing its postgraduate student numbers in all faculties. Coupled with this is the initiative to develop considerable staff supervisory competence and support structures at this level" (Ballim, 2008).

This focus on research writing is evidenced by a plethora of new texts offering advice on research writing, for example Paltridge and Starfield, 2007; Badenhorst, 2007 and

2008; Kamler and Thomson,2006b; Thomson and Kamler, 2013. Kamler and Thomson (2006) have offered pedagogical strategies for supervision of doctoral writing by locating this work in personal, institutional and cultural contexts. It has become clear that academic writing is both difficult and potentially alienating for **all** students (Aspland and O'Donoghue, 1994). Writing at postgraduate level presents challenges for even the most successful students (Prior, 1995). Despite the increasing emphasis on supervision practices, little research has been carried out on the nature of interactions between supervisors and postgraduate students that deal with writing.

1.2 Rationale for the Research

New emphasis on the research supervision role is beginning to acknowledge the work on postgraduate academic writing (Caffarella and Barnett, 2000; Kumar and Stracke, 2007; Aitchison and Lee, 2010; Starke-Meyering, 2011; Paré et al., 2011; McCallin and Nayar, 2012; Maher et al., 2014; Lee and Murray, 2015). Recently there has been a shift in doctoral training from viewing the thesis as a product to a pedagogy of training researchers to develop their research skills and expertise (Deem and Brehony, 2000; Gilbert, 2004; Thomson and Walker, 2010; McCallin and Nayar, 2012; Lee and Danby, 2012). Previously, postgraduate pedagogy took a lesser role in supervision practice compared with the role of supervisor as researcher (Pearson and Brew, 2002). Recognising that research writing remains significantly under theorised (Aitchison and Lee, 2006; Aitchison et al.; 2012), this research offers new insights into the writing pedagogy employed by supervisors. In addition this research, located in South Africa, in the context of a developing country, provides a local perspective on supervision pedagogy and research writing in two disciplines located in a Science faculty in a research-intensive university.

The dynamics of research writing has become of major interest to both supervisors and their postgraduate students. Kamler and Thomson (2001, 6) maintain that because writing is seen as 'marginal or ancillary' to the real work of research there is very little research that "opens out the complexity of PhD writing practice". This is still currently the case. Some universities in South Africa have recently shifted their focus to become more research-intensive institutions and with this change there is

increasing pressure to accept more postgraduate students whilst retaining quality (Wits 2010). Quality postgraduate writing supervision is thus of fundamental importance, particularly since it has the potential to address the concerns of all students across the spectrum.

The theoretical framework used in this research sees research writing as a contextualised social practice (Wisker and Sutcliffe, 1999; Lillis, 2001; Lea 2005). Supervision of postgraduate students needs to be individualized to suit each student who comes with a distinct background and set of academic abilities. supervision process is always a diverse one since it is tailored to meet the needs and context of the postgraduate student. Thus there are two sides to the contextualized nature of research writing: firstly from the point of view of the student, it is critical to ensure the way in which postgraduate writers are able to engage with and be accommodated within disciplines in academia; and secondly, from the supervisory perspective, the development of the postgraduate student's writing needs to be handled in an appropriate and sensitive fashion. At the same time the writing identity of the postgraduate student needs to be nurtured and encouraged by the supervisor. I consider the work of Lillis (2001) to be of particular importance when engaging with all postgraduate students, despite the fact that her work foregrounded non-traditional/disadvantaged students. Lillis (2001, 2) suggests that we need to consider "specific instances" of student writing as these offer insight into writing practices. So in this study, engaging with the perceptions of research writing held by supervisors and postgraduate students and the written feedback given to students with regard to their research writing is a means of identifying current writingcentred supervision practice within my institution.

Using this theoretical framework in which writing is seen as a contextualised social practice, this research offers the opportunity to add to and enhance knowledge of the pedagogy associated with postgraduate research-writing and supervision. Postgraduate education, supervision and higher degree writing is now of critical interest to academics both globally and locally in South Africa. Thus this research will fill a much-needed gap in our knowledge as there is a need to increase research knowledge of the supervision models, practices and interactions concerning postgraduate research writing particularly in a South African university context.

1.3 The aim of the research

Aitchison et al., (2012, 2) comment that 'we still understand relatively little about how doctoral students actually learn research writing, how supervisors 'teach' or develop the writing of their students and what happens to students and supervisors during this process".

The **purpose** of this research is to explore the nature of postgraduate supervision practices with a specific focus on writing, and the possibilities for the development of research writing provided by a writing-centre co-supervision model. The research is located in two allied disciplines in a science faculty in a research-intensive South African university. In addition to me as a practitioner researcher and supervisor, eleven supervisors and twelve postgraduates from both disciplines were participants in the research process. Some of these participants (both supervisors and postgraduate students) also participated in the writing-centred co-supervision model, which is part of the focus of this study.

This study has three research questions:

1. What is the nature of postgraduate writing supervision?

- What writing issues are perceived by supervisors and their postgraduate students with regard to the students' writing?
- What writing strategies are used by supervisors and their students?

2. What is the nature of written feedback given to postgraduate students by their supervisors?

What feedback issues are raised by supervisors and their students?

3. What is the nature of the new writing-centred co-supervision model?

What are the implications of this model for the development of postgraduate writing and supervision?

In discussions with their supervisors, postgraduate students express difficulty with their research writing and have requested deeper structural and linguistic assistance from their supervisors. The postgraduates in this research study at this research intensive South African university are a mix of first-language English students and local and foreign students who have English as an additional language. Further to the concerns raised by students, supervisors have anecdotally indicated that they are often unsure of how to improve the quality of their postgraduate students' writing. It is internationally recognised that supervisors find problems in getting their students to write well, and raise questions relating to argument, simplicity of prose and logic (Kamler and Thomson, 2006). Chapter 4 on writing issues and strategies addresses this ongoing research gap.

Central to this research is the nature of written feedback given to postgraduate students on their drafts. This aspect of postgraduate writing is relatively unexplored and research on feedback has typically focussed on that related to undergraduate students' assessments (Carless, 2006; Nicol, 2010, Vardi, 2012; Yang and Carless, 2013). In practice, feedback has consisted of largely superficial comments, with little practical feedback on *how* to improve writing (Chamberlain et al., 1998; Duncan, 2007). This aspect of supervision is given attention in Chapter 5.

In addition to writing-centred research and supervision practices, part of the focus in this research is on a new innovative writing-centred co-supervision model. This is a model of co-supervision with a research supervisor and a writing specialist both located *within* the discipline. These two supervisors have a joint responsibility to supervise the student. The research supervisor concentrates on content issues while the writing supervisor assists with the development of the student's research writing. Co-supervision is increasingly advocated for a variety of reasons: enriched knowledge and critical input, diversity of opinion, and flexibility for leave for supervisors (Charlesworth et al., 2007). This writing-centred co-supervision model is

not seen as primarily facilitating the success of students with English as an additional language but is designed to enhance the development of **all** postgraduate students' writing regardless of background. Lea and Street (1998) suggest that a shift away from skills-based deficit models enhances academic writing practices. It is thus important that this model is not construed as a deficit one by either supervisors or student researchers. This new model writing-centred co-supervision model is discussed in Chapter 6.

I have chosen to use a qualitative approach in my research to allow for a rich and useful understanding of the issues relating to postgraduate student writing and their supervision. The research uses a case study approach. The research sample consisted of eleven supervisors ranging in supervision experience and a sample of their Masters or doctoral students (See Table 4 p 54). The research instruments consisted of open-ended interviews with supervisors and postgraduate students, drafts of their student writing containing supervisor feedback, and the fieldnotes, emails and reflections of the researcher. The intention was to open up the private space of supervision. This research is practitioner research and as such, brings many additional layers of concern regarding power and influence, the potential for bias, and ethical considerations

1.4 The Research Focus and Principal Findings

In this research the first focus is on the perception of research writing issues which have been identified by supervisors and/or postgraduate students. This research is unique in that, in addition to providing a map of these issues, I also assess the extent to which these writing issues are linked to strategies employed to enable students to overcome their writing challenges. An analysis of the issues and strategies put forward by supervisors suggest that there is little pre-thinking about the process of assisting postgraduate students to write. There is also surprisingly little match between the writing strategies suggested by supervisors and those suggested by students.

The feedback practices of this group of supervisors are uncovered using a newly-constructed analytic feedback framework which illustrates a continuum of feedback practices. Given that feedback practice is diverse, three patterns of feedback are detected: big picture feedback; superficial surface-level feedback; and a combination of the two – mixed feedback. The majority of the supervisors interviewed in this research use mixed feedback as their modus operandi. The question of whether editing is part of a supervisory role remains open to question. Supervisors have some idea of their feedback practices but most cannot articulate their practice clearly. An analysis of the data leads me to conclude that supervisors' knowledge of their written feedback practices is critical and that a shared meta-language regarding feedback would allow supervisors to open a space for an improved and more useful feedback dialogue both with their colleagues and with their postgraduate research students.

The third focus in my research is on a new model of co-supervision i.e. a writingcentred co-supervision model and the implications of this model for supervision practice. This writing-centred co-supervision model is unusual in that it has a research supervisor and a writing supervisor both located within the discipline. In other versions of the co-supervision model a writing supervisor may be located outside of the discipline and may lack specialist content knowledge (Cadman, 2005; Aitchison and Lee, 2006). The promotion of good practice, particularly with regard to feedback practices has permeated through the discussions between the content supervisors and the writing supervisor. The writing-centred co-supervision model thus facilitates better research writing and may also be more efficient in terms of supervision than the traditional co-supervision model as the two supervisors are each able to concentrate on more focused and distinct feedback. This cosupervision model allows the writing co-supervisor to provide a 'safe space' for postgraduate students in the writing process. However the research also confirms that issues of power remain inherent in this model of co-supervision and that research writing remains on the margins of academic work and 'subordinate to the main work of thinking and knowledge production' (as argued by Aitchison and Lee, There is also evidence that this model of supervision enhances the confidence of the research students and this in turn leads to improved writing. In addition, and most importantly, this co-supervision model opens up a space for

communication between supervisors as they begin to openly disclose and share their supervision practices.

1.5 The Outline of the Chapters

Chapter 1:

This initial chapter has provided the background to this research, situating it within the global context. More importantly it has provided rationale for the study. The aims of the research have been placed within the local South African context with a focus on the key findings.

Chapter 2:

This literature review first considers the pedagogy of postgraduate supervision followed by the links between supervision, academic literacy and postgraduate research writing. An account of research into supervision which concentrates on postgraduate research writing is presented. Models of writing supervision, (including the writing-centred co-supervision model developed in this research) are categorised and critiqued. The issues around power are conceptualized. Finally the literature pertaining to written feedback is highlighted.

Chapter 3:

This chapter explores the qualitative nature of my research design and my rationale for using practitioner research and a case study approach. The research instruments (open-ended interviews, student drafts of their writing, fieldnotes and researcher reflections) are discussed, followed by the frameworks used for analysis: thematic content analysis for the interviews, and a new analytic framework (relating to the research mentioned in Chapter 2) developed to address the feedback question. Reliability and research subjectivity are addressed, followed finally by ethical considerations.

Chapter 4:

This chapter investigates the perceptions of supervisors and postgraduate students with regard to the difficulties and issues of academic research writing and addresses the second research question. Both supervisors and students reveal writing issues that they see as problematic in the development of postgraduates' writing. These challenges are followed by insights into the various strategies used by supervisors and their students to address these writing issues.

Chapter 5:

This chapter responds to the second research question which focuses on the nature of written feedback given to postgraduate students. The chapter begins with a reminder of the conceptual framework illustrating a continuum of feedback practices used for analysing the nature of written feedback on drafts given to postgraduate students. An explanation of this framework and its application to supervisors' feedback practice is followed by a discussion of issues regarding feedback raised by supervisors and students and the chapter concludes with a summary and recommendations for effective feedback practice.

Chapter 6:

This chapter addresses the third research question which investigates the implications of a new writing-centred co-supervision model for the development of postgraduate writing. Chapter 6 reports on the motivation for, and establishment of this innovative co-supervision model. The responses to the model by the participants – the co-supervisors and the postgraduate students are explored and the challenges and limitations of the model are discussed.

Chapter 7:

This final chapter summarises the research findings and draws conclusions from them. Limitations of the study are indicated. The implications of these findings are linked to recommendations for the development of postgraduate writing and possibilities for future research in this area are suggested.

Chapter 2: Literature Review and Research Framework

2.1 Introduction

This chapter considers the pedagogy of postgraduate supervision followed by the links between supervision, academic literacy and postgraduate research writing. An account of research into supervision which concentrates on postgraduate research writing is presented. Models of writing supervision, (including the writing-centred cosupervision model developed in this research) are categorised and critiqued. Finally the literature pertaining to written feedback is highlighted.

The theoretical framework used in this research sees research writing as a contextualised social practice (Lillis, 2001) and research supervision is considered to be a diverse and contextualised process (Wisker and Sutcliffe, 1999). Thus there are two sides to the contextualised nature of research writing: firstly the way in which postgraduate writers are able to engage with and be accommodated within disciplines in academia; and secondly the sensitive and diverse manner particularly useful for supervisors in the development of their postgraduate students' writing. Lillis (2001) was particularly interested in non-traditional/ disadvantaged students in the context of their research writing challenges. Lillis (2001, 2) argues that "detailed attention to appositio instances of students' writing halps to illuminate the nature of

attention to specific instances of students' writing helps to illuminate the nature of writing practices within the academy and, consequently to raise important questions for all of us who engage in them". So in this study, this entails engaging with the perceptions of research writing held by supervisors and postgraduate students and the written feedback given to students with regard to their research writing.

2.2 The Pedagogy of Postgraduate Supervision

Over the last decade there has been a considerable increase in research which centres on postgraduate supervision often referred to as 'doctoral education' or doctoral pedagogy (Grant, 2001, 2005 and 2010; Pearson and Brew, 2002; Grant, 2010; Walker, 2010; Walker and Thomson, 2010; Paré, 2010; Paré et al., 2011;

Aitchison et al., 2012; McAlpine, 2012; McCallin and Nayar, 2012). The supervision process can be viewed as an interactive relationship between supervisor and student which is pedagogical - rather than a simplistic set of processes (Grant and Graham, 1999; Searle et al., 2005). However, in contrast, for some supervisors "the tone of the Proper Traditional Supervisor is marked by formality and distance....a pedagogy of indifference.....from which only the fittest emerge" (Grant, 2001, 4). So the nature of supervision and particularly that of written feedback to postgraduate students is critical and will be investigated later in this study in the chapter on feedback.

Postgraduate pedagogy had for some time played a less important role in supervision practices when the notion of supervisor as researcher took precedence (Pearson and Brew, 2002). However supervisor training in higher education is now becoming more widespread with changes in the nature of what supervisors do. (Pearson and Brew, 2002; Thomson and Walker, 2012). There has been a significant shift in doctoral training, particularly in Australia, Britain and the USA from seeing the PhD as a process of producing research (the thesis as product) to a pedagogy of training researchers in order to develop their research skills and expertise i.e. a movement from scholarship to training (Deem and Brehony, 2000; Gilbert, 2004; McCallin and Nayar, 2012). Goode (2010) comments on the tension between producing a product, and those practices that focus on the process of becoming a doctoral researcher. Some evidence suggests that supervisors frequently base their practice on their own, often unscrutinised, experiences as postgraduates (Trivett et al., 2002; Lee, 2008), and there is pressure for supervisors to benefit from more formal training (McCallin and Nayar, 2012). The traditional view of supervision focused strongly on issues of process and methodology, whereas currently supervision is seen to be a pedagogic process. McCallin and Nayar (2012, 66) suggest that "when supervision pedagogy is emphasized, it is assumed that research students need to be taught how to research, how to write a grant proposal, how to prepare an ethics proposal, how to review the literature, how to write, how to analyse data and how to manage a research project" A useful distinction is between what graduates learn (the doctoral curriculum) and the pedagogy of how that supports their learning (Gilbert, 2004).

Anderson et al. (2006) investigated dissertation work in a British Masters by coursework focusing on the supervisory relationship, student agency and student and supervisory responsibilities. In this study supervisors saw themselves as having a gate-keeping role whilst their personal commitment to the students both supported and shaped the efforts of their students. More recently models of supervision have been examined critically as the issues of completion time and the introduction of pedagogic input become of greater importance. McCallin and Nayar (2012) suggest that there are possibly three types of supervision: the traditional model; group supervision; and a mixed model. The first model assumes the 'expert/apprentice' roles of the supervisor and the student. In this structured model, students may be excluded from wider interactions with other researchers and the isolation may limit the student's research development (Walker, 2010). In the second model (group supervision), there is a supervisor/student relationship as well as a student/student relationship. In this model the role of the supervisor is supported by informal peer support (McCallin and Nayar, 2012). Whilst this model may offer social and emotional support, it is also suggested that 'scholarly writing groups may improve writing outputs (Parker, 2009; Aitchison and Lee, 2010). The third model is a mixed model which adopts a blended learning approach. This blended learning model utilises individual face-to-face supervisor /student sessions as well as the environment of the student comprising infrastructural resources, communities of researchers, and a virtual classroom with online learning (De Beer and Mason, 2009; McCallin and Nayar, 2012).

Pearson and Brew (2002) suggest that coaching and mentoring are two important pedagogic strategies for postgraduate supervision. However these are often poorly-defined in the context of academic research. Coaching may involve critical reflection by the researcher in order to gain overt access to and control of their strategies for problem-solving and the process of doing research. Mentoring on the other hand, can be construed as supporting students in their personal, emotional and intellectual development, and involves providing access to relevant academic communities. Supervisors need to become "open to gaining critical feedback on their skills and performances as coaches and mentors" (Pearson and Brew, 2002, 146).

A further conceptual frame for theorizing doctoral education which has emerged recently is that of identity. McAlpine and Amundsen (2009) investigated how doctoral students develop their academic identities from the perspective of agency. McAlpine (2012) argues for an identity–trajectory view where individual agency is linked to the past and imagined future of the student, and where this is linked to increasing student independence.

The 'generic' conception of postgraduate supervision was understood as a clearly identifiable form of teaching research skills (Wisker and Sutcliffe, 1999). This generic conception outlines two trends: the expansion of the postgraduate research sector in higher education, which has led to an increased attention on the supervision process; and recent quality assurance and accountability requirements which have led to attempts to standardise and monitor supervision. Recent critique of the generic conception of supervision has focused firstly on the way 'quality' has been defined and practised in higher education and secondly on the lack of concern for the character of the university context. This signals a move away from the notion of the 'generic student' to 'specific students' in specific situations. Thus there was a trend towards encouraging the diversity of research supervision and a contextualised conception of supervision processes (Wisker and Sutcliffe, 1999).

This contextualised conception of research supervision ties in with the work of Lillis (2001) that research writing is a contextualised social practice in that supervision and writing practices have implications for the development of individual research writers. This thinking forms the framework for this research. My standpoint is that within the institution there is little discussion between supervisors or between supervisors and postgraduate students around postgraduate writing. There also needs to be sensitivity to the disparate needs of individual students in the context of their research writing. Many supervisors assume that postgraduate students with English as their first language can write well and that all students with English as an additional language (EAL students) i.e. where English is not their first/home language) are those needing writing assistance. In reality, many students of all backgrounds and language persuasion may require assistance with the development of their writing. Historically, in my institution, this related to opening up academic literacy practices to historically disadvantaged undergraduate students. More

recently this needs to widen to include **all** students, including postgraduate students as students coming into the university at this level are all in need of assistance with their academic writing. This has led to the development of a new writing-centred cosupervision model (See Chapter 6). So it is increasingly important to find out what the writing challenges and practices are for postgraduate students, not only by focusing on their research texts but also by critically engaging with written feedback given to these students as they struggle to engage with the academic discourse of the institution. These perceptions and practices form the focus of Chapters 4 and 5.

2.3 Supervision and Postgraduate Research Writing

There is a growing field of interest in postgraduate research writing. (e.g. Kamler and Thomson, 2006 and 2006b; Aitchison and Lee, 2006 and 2010; Paltridge and Starfield, 2007; Cotterall, 2011; Paré et al, 2011; Starke-Meyerring, 2011; Lee and Murray, 2015), and it is recognised that writing still remains significantly undertheorised within research degree programmes in universities (Aitchison and Lee, 2006; Aitchison et al., 2012). Problems of writing have been seen either as "individualized deficit and trauma (the problem) or of clinical technical intervention (the solution)" (Aitchison and Lee, 2006, 266). Research into thesis writing concentrates mainly on doctoral studies, although there are similarities, and differences, in thesis writing at honours, masters and doctoral levels (Ylijoki, 2001). The literature on dissertation research, writing and supervision at Masters level is only just beginning to expand: the management and supervision of Masters students has been investigated by Grant and Graham (1999) and Ylijoki (2001) who looked at thesis writing from a narrative approach. (Note that dissertation and thesis are used interchangeably in this study).

"Students can no longer write' (Lea and Street, 1998, 157) is a refrain often expressed in the corridors of academia. Strauss et al. (2003) point out that many language issues are shared by first-language speakers of English and students with English as an additional language. In addition, the extent of the role of supervisors in editing students' work is often problematic, and this may present supervisors with

ethical dilemmas. How far should a supervisor go in taking responsibility for their postgraduate students' writing? Leading from this is concern about the value placed on a degree by future employers and the responsibility of the university to reward the students' ability fairly.

The literature about supervision alludes to the difficulties supervisors have in assisting students with language (Delamont et al., 1997). It is often assumed that postgraduate students know how to write. Unfortunately these assumptions are rarely made explicit and are only raised when it is realized that there is a problem with research writing (Brown, 1994; Strauss et al., 2003). Some supervisors may have difficulty when faced with the writing of students with English as an additional language, particularly if the problem is cast as one of student deficit. The pressure to 'process' postgraduate students means that "the language of the thesis presents a very real dilemma both practically and ethically" (Strauss et al., 2003, 4). So in the current university climate supervisors are under pressure to move their postgraduate students through the system. This then means that the time needed to develop writing skills may be curtailed. Consequently the quality of the students' writing may be problematic as there is little time to devote specifically to academic writing.

Kamler and Thomson (2001, 6) suggest that there is "little systematic instruction in high-level writing for postgraduate students" and that "supervision practices rarely make explicit the complex rhetorical and scholarly devices used by different disciplinary communities". They comment further that there is very little research that "opens out the complexity of PhD writing practices" and that this may be because writing is seen as peripheral to the 'real work of research'.

Recently, Thesen (2014, 103) has suggested that the notion of 'risk' may prove useful in what she terms 'the contested space of research and knowledge making'. She argues that playing it safe in academic writing mutes creativity and advocates for the idea of 'edgework' where there is voluntary risk-taking in academic writing. In this context edgework relates to the ability of the researcher to inject voice into the research writing.

Postgraduate Research Writing-The Academic Literacies Approach

The academic literacies approach has much to offer postgraduate supervision practices. This approach views academic reading and writing as located in different disciplinary contexts, each with its own process of knowledge construction (Lea and Street, 1998). Reading, writing and meaning are situated within specific social practices (Gee, 2000). According to Lillis (2003, 194) the academic literacies approach "emphasises the socially situated and ideological nature of student academic writing" and highlights previously overlooked aspects pertinent to student writing viz. power relations, identity, and generic and specific writing practices. Lea and Street (1998) suggest that when thinking of undergraduate writing practices there needs to be a shift from a 'skills-based deficit model' of student writing to that of an academic literacies approach.

The strength of the academic literacies approach, as argued by Lea (2004), is that it acknowledges that students may have problems with academic discourse and practice as they become acculturated into academia. Lea argues that "students are active participants in the process of meaning-making....and central to this process are issues concerned with identity and the contested nature of knowledge" (Lea, 2004,142). The academic literacies approach is often implicit but can be made explicit as part of the development of a student's academic writing (Morss and Murray, 2001). Work in the field of academic literacies challenges "the notion that writing is concerned with the acquisition of individual cognitive skills which can be transferred with ease from context to context and in contrast, it conceptualises writing as contextualised social practice and examines the ways in which meanings are constructed through contrasting writing practices across the university" (Lea, 2005,191). Recently Badenhorst et al., (2015) comment that in the context of diverse student bodies and widening access, writing is often seen as 'a problem in need of fixing' and the students are seen as somehow deficient. They argue that an academic literacies perspective is useful in the development of a writing pedagogy. So if postgraduate students are to find their rightful place in academia, the academic literacies approach in the context of postgraduate writing is critical. Postgraduate students require an understanding of discipline-specific discourse and what counts for knowledge in their area of research.

Writing as a Contextualised Social Practice

Competence in tertiary academic literacy (the linguistic and conceptual skill needed to engage with the acquisition and communication of ideas in a specific discipline) is not simply a set of basics to be acquired by students, but is much more complex practice made up of ideologies, power relations, values and identities. current recognition that literacy practices operate within social and cultural contexts and are tied to social goals and embedded cultural practices (Gee, 2000). Kamler and Thomson (2001) see the conceptualising of doctoral writing as social practice to be far more useful than a focus on doctoral writing skills. Writing is seen as occurring within 'a particular time/place/tradition' (Kamler and Thomson, 2006b). So writing is construed as mediated not only by the context of the research writer but also "by the social, cultural and political climate within which the thesis is produced" (Clark and Ivanic, 1997, 11). This concurs with the idea held by Lee (1998, 127) who sees writers located in communities within which "they must construct and position themselves as legitimate knowers and text producers". Kamler and Thomson (2006, 3) touch on the heart of the matter when they state that "what often looks like poor writing is also a textual struggle to take on a scholarly identity and become authoritative". Scholarly identity consists of changes over time and context and depends on similarities between institutional practices and the individuals' existing identities.

Thesis writing may reveal some of the most severe problems and anxieties encountered by students at university. Whereas undergraduate students are 'consumers of knowledge', postgraduate students are expected to have more advanced critical thinking skills and a greater independence. They become 'producers of knowledge' (Ylijoki, 2001). Torrence et al., (1994) in their study of U.K graduate students in social science looked at the relationship between planning content and writing success. They distinguished between three groups of postgraduate students: those who planned their work followed by minimal redrafting of content (planners); those who wrote without preplanning the content (revisers); and students who planned in advance and then revised their content later (mixed strategy). The last strategy was reported as being the least effective of the three and the mixed strategy writers viewed writing challenges as a 'threat' to completion! In a

similar vein, an interesting study by Galbraith et al., (2006) distinguish between writers who are *high self-monitors*, who monitor and control their writing to meet external goals and prioritise explicit planning for text production (termed knowledge-transforming) and *low self-monitors* whose goal is to express their thoughts and who prioritise spontaneous text production (termed knowledge-constituting). These ideas link both to Lee (1998) who sees students as text producers, and to Ylijoki (2001) who argues that students should become producers of knowledge. In their study of ninety six undergraduate students, Galbraith et al., (2006) found that the number of new ideas produced in rough drafts is higher for low self-monitors than for high self-monitors, suggesting that dispositionally-guided text production (ideas discovered as writing takes place) actively produces knowledge. In terms of coherence, the low self-monitor's new ideas proved to be more conceptually coherent after writing rough drafts and planned essays i.e. "dispositionally-produced new ideas are relatively more coherent than those produced by rhetorical planning" (Galbraith et al., 2006, 134)

Work in this field has often focused on studies of non-traditional university students. (e.g. Ren Dong, 1998; Scheyvens et al., 2003; Hyland, 2004; Bitchener and Basturkmen, 2006). Lea (2004) suggests that this focus may create a deficit or study skills model and that academic literacies pedagogy has a much wider application. The stance taken in this research is that academic issues facing non-traditional students are pertinent for many traditional students and lessons can be learnt from research into issues facing non-traditional students, particularly those with English as an additional language (EAL students).

Traditionally, research writing has often been seen in terms of skills which need to be learned or as a technical skill which can be 'fixed'. These research-writing skills are usually supplied either on university websites or in the form of skills-based books (Ogden, 1993; Cryer, 2001; Mouton, 2001; Wolcott, 2001). Kamler and Thomson (2006b) see the literature on postgraduate writing divided into four groups: advice books; composition books focusing on writing forms/genres; textbooks theorizing about texts and lastly sociological texts which place writing as a social practice in a particular time/place/tradition.

Figure 1 (below) indicates basic research skills and competencies for beginning researchers. It is interesting to note that research writing is absent from this 'toolbox' of research skills and competencies and illustrates a 'product' view of writing which is merely skill-based.



Figure 1: Basic research skills and competencies (after George, 2006)

The process of writing is often taken for granted, and writing is often 'treated as a discrete set of decontextualised skills' (or deficits) distinct from knowledge production and research (Aitchison and Lee, 2006; Kamler and Thomson, 2006b). Academic literacy, and hence postgraduate writing, cannot be narrowly seen as a set of general skills, neutral and transportable, which once acquired, can be seamlessly transferred from one context to another (Lillis, 2001: Lea 2004).

Supervision and Research Writing in Science

Since this research is conducted in a Faculty of Science it is pertinent to include research relating to postgraduate research writing in Science. If research writing is viewed as social practice, writing in a particular discipline requires an understanding of context and how knowledge is constructed (Catterall et al., 2011). Thus an academic literacies approach unpacks how teaching and learning with regard to writing occur within a social system where epistemology, identity and power are of importance (Lillis, 2001).

Catterall et al., (2011) examined the perceptions of research students and their supervisors with regard to research writing in an Australian Science, Health and Technology Faculty in order to promote successful doctoral writing skills. Workshops, writing circles and retreats provided by the faculty were seen by both supervisors and students as supportive of writing. 31% of the students valued writing help/guidance from the supervisors. More than half the respondents identified collegial activity (e.g. critiques, formal writing opportunities) as a strategy for developing doctoral writing skills. Students and supervisors expressed frustration with regard to writing and there were some problematic late approaches to writing contrasting with the suggestion of one supervisor to write early and often. dominant pedagogy was that of feedback with students reporting both positive and negative experiences. Supervisors reported that frequently students simply adopted supervisor changes. Several native English supervisors were concerned about their ability to assist with writing as they themselves lacked explicit teaching in this area. Students reported the value of writing groups, reading groups and workshops which were not part of the supervisor/student relationship as useful. Confidence, research, and writing skills benefitted from writing for publication. However, most supervisors and students appeared to rely on a limited range of doctoral pedagogies with regard to writing. Catterall et al., (2011, 7) conclude that "the participants in this study seem to be caught in a vacuum between an imagined, traditional, apprenticeship model, in which student writing is developed slowly through immersion in disciplinary conversations within a close supervisory relationship, and the contemporary reality, in which student numbers and academic workloads preclude learning through slow acculturation". They further suggest that there are critical explicit transitions in writing skills which need to be addressed as students move from undergraduate to honours, Masters, and throughout the PhD.

In a paper by the same group of Australian researchers described above (Catterall et al., 2011), the writing experiences of the same cohort of Science students and

supervisors were investigated by Ross et al., (2011). Ross et al., (2011, 14) document the degree of difficulty conveyed by both supervisors and students and the "anxiety, stress, struggle and high emotion associated with learning to write". Students had difficulty with the process of writing as a 'way of doing' and 'knowing', whilst supervisors concentrated on the product. This final product was seen to be the responsibility of the supervisor, and at times the thesis was rewritten by the supervisor. Supervisors appear to have little interest and 'great difficulty' in teaching writing. There is a tension between error and sentence correction and allowing the students to learn in their own way. This tension is exacerbated by the pressure to complete and the pressure to publish. In their paper, Ross et al., (2011, 26) suggest that supervisors in Science disciplines "need to be mindful of creating a culture in which doctoral students can learn to write naturally as discipline-specific researchers" without stress. They further reflect on the need to create a discourse about writing in Science and the need for empirical research allowing critiques of the writing issues and the development of pedagogies of instruction.

Postgraduate research writing in Science-related disciplines (including engineering) may take place in a collaborative environment where the way in which the research is set up rests on the manner in which the research community in the discipline is constructed (Ren Dong, 1998). In one of the few studies on postgraduate writing in Science, graduates in an American study reported that supervisors were helpful in addressing ways of expressing ideas, improving organisation and coherence, presenting data, and correcting style and format. Some senior academics in the same survey listed a lack of both elaboration and clarity as issues in their students' thesis writing (Ren Dong, 1998). More recently, Aitchison et al., (2012, 445) in their study of the writing experiences of supervisors and doctoral students, comment that supervisors in their study lacked the ability "to guide their students in the literacy practices of other disciplines or research approaches". So there may be challenges for supervisors in working with the writing of research students outside of their discipline.

Maher et al., (2014) investigated learning to write for publication as an outcome of doctoral pedagogy in an American university. They explored the narratives of supervisors who regularly co-author publications with their doctoral students in a

Science, Technology, Engineering, and Mathematics (STEM) context. The writing challenges facing these supervisors centre around 'writing problems' facing international students, the issue of disciplinary writing and the students' anxiety relating to writing for publication.

Within the researcher's discipline (withheld in this study to protect the participants), there is a dearth of research into writing practices at postgraduate level. Delyser (2003) describes a Social-Science Writing course offered to graduate students at Louisiana State University. She comments that most published work deals with the process of writing, form or layout but is of the opinion that few texts actually teach graduates how to write. She laments the fact that while disciplines may not have distinctly different writing styles, there are few examples of texts dealing with writing in her discipline. More recently Cargill and Smernik (2015) commented on the lack of research into postgraduate student writing skills relating to science and technology. They investigated the suitability and effectiveness of using an Applied Linguistics framework in a school-level writing group programme in Australia, utilising a well-published research scientist. The insider knowledge of the scientist/presenter was considered critical and it is interesting to note that this scientist managed to maintain his own publication output during the programme. This programme made use of an analysis of example papers to focus on story papers, integrating English grammar and usage whilst also focusing on responses to reviewers' comments as part of the article-writing process.

Models of Writing Supervision

Across most tertiary institutions, writing assistance is offered to postgraduate students. This assistance can be viewed in terms of models of writing supervision, and can be categorised in a number of different ways. Models of *consultation and collaboration* foreground the power relations between the participants; while an *insider/outsider analysis* focuses on the position of the writing specialist relative to the discipline.

The first category of writing models are those models using either *consultation* or *collaboration* which foreground the balancing and integration of the skills of writing specialists and discipline-specific staff. Consultation is premised on the notion that

one party to the process remains in control despite the fact that the participants have different but complementary skills. The second approach is a *collaborative* one, where there is shared participation in goal-setting, action and responsibility. This collaboration may take the form of 'focused pairs' where writing is taught collaboratively by a writing specialist and a discipline-specific staff member. Workshops may also be run (in tandem with content lectures). The balance of power between the staff members is an issue for both the consultation and the collaborative models (Emerson et al., 2006). In both categories of writing models the power relations depend on both the experience and position of the staff members and the personal relationship that exists between them.

The second category of writing assistance models (outsider/insider models) is based on whether the writing specialist is located outside or inside the discipline. The first of these models, common across many institutions, utilises academic development, support staff or language specialists located outside the discipline to engage with postgraduate writing. These 'outside' advisors in outside units or writing centres offer writing support to research writers (Cadman, 2005). Often this form of research writing support is viewed as a deficit model (Lea and Street, 1998). In some instances the writing assistance is seen as being necessary only for those with writing difficulties. In this 'outsider' model, research writing is often separated from the pedagogy of supervision and is situated in support units (Aitchison and Lee, 2006). Aitchison and Lee (2006) are of the opinion that when assistance with research writing is undertaken in outside learning support units it becomes distanced from supervision pedagogy in that supervisors outsource writing to outside writing More formal writing courses outside the discipline may also be offered specialists. (Rose and McClafferty, 2001; Starfield, 2003). In some instances there may be a language specialist located outside the discipline working with a supervisor within the discipline (Cadman, 2005). . A further problem with this model of writing support has been identified by Chanock (2007, 272) who claims that there are issues of 'space and status', and that these 'outside' practitioners 'often operate at the margins of academic life'.

One of the criticisms directed at outsider models is the "over-reliance on clinical intervention by language or writing advisors at the point of crisis" (Aitchison and Lee,

2006, 266). The role of university writing centres offering writing assistance are of importance in the debate regarding the value of insider versus outsider models of writing intervention. Hutchings (2005, 731) highlights the role of the Writing Centre in that "links forged between students' backgrounds and social identities within consultations are highly productive in terms of helping students gain access into the academy". However although students may become conscious of their writing skills, this interaction takes place outside the discipline and it follows that this work is distanced from the discipline and that academics within the discipline may not be aware of writing issues. Chanock (2007, 273) suggests that "frequently our (writing) centres seem to be regarded as a form of crash-repair shop where welding, panelbeating and polishing can be carried out on students' texts - an idea that makes sense only if you regard the text as a vehicle for the writers' thoughts and separable from the thoughts themselves". Strauss et al., (2003) delved into the experiences and expectations of supervisors in relation to thesis writing. One supervisor suggested that Science and Engineering lecturers were less able to cope with language difficulties in students' writing than academics in disciplines where language ability was seen as more crucial. The fear was expressed that language assistance from a person outside the discipline could negatively affect the quality of the science. In a study conducted at a South African university, Butler, (2011) found that supervisors felt that both content and language specialists should take responsibility for providing writing support to the student. So a strong alternative emerging from a critique of outsider models, has led to a focus on insider models writing programmes which are discipline-specific (Kiley and Liljegren, 1999). Chapter 4 describes a specific insider model, (termed the writing-centred cosupervision model), which was developed to address the development of postgraduate research writing in a specific disciplinary context.

A further consideration to be examined is the nature of the power relations, both between supervisor and student, and between co-supervisors. Williams et al. (2014) identify power relations in three different ways. The first conceptualization of power is 'power over' and is manifested in the ability to 'control actions of others'. The second is seen as 'power to'. This relates to the control of resources. The third way in which power can be conceptualized is the Foucauldian notion of power as 'power within'. Grant and Graham (1999) suggest that the existence of power tensions

between supervisors and their students is inevitable, given the context of their institution and social position. They quote Foucault (1998, 18) who claims that "the problem is rather to know how you are to avoid in these practices – where power cannot play and where it is not an evil in itself – the effects of domination which will put a student under the power of an abusively authoritarian professor...". However Grant and Graham (1999) suggest that that the power relations between students and supervisors are more complicated than the notion of supervisor domination and student submission or 'power over'. Both parties are capable of action and that students are not necessarily disempowered. The issue of power relations (and their impact on learning opportunities) is also highlighted by Cotterall (2011) who examined the writing practices of two international doctoral students at an Australian university using a 'communities of practice' framework. In addition, Cotterall (2011, 423) concludes that "effective doctoral learning depends as much on the quality of the relationship between supervisor and student as on the practices in which they engage".

Grant (2005) lists four discourses of supervision: psychological, traditional-academic, techno-scientific and neo-liberal. Grant (2005,38) sees these relationships as "a fundamentally rational and transparent practice between autonomous individuals". In the first discourse (Psychological), the Psy-supervisor is seen to be a caring supportive and expert supervisor whereas the Psy-student is seen as experienced and in need of assistance. Trust and interpersonal respect are key to this form of supervision. The second discourse - Traditional-academic - is that of intellectual apprenticeship where the Trad-supervisor is 'a proven scholar and master of the discipline'. This discourse is characterized by distance and formality in contrast to the Pys-discourse of supervision. The Trad-student wishes to be associated with the exceptional qualities 'of the supervisor. This discourse is marked by indifference from the Trad-supervisor and submission on the side of the Trad-student. Both parties have been historically construed as male. Grant (2005) further suggests that this second discourse is seen as dated and elitist and thus unpopular. supervision discourse is the Techno-scientific. This discourse presents the supervisor as 'trained and expert' and the student is seen as 'malleable and obedient'. The intention here is to train the student to research correctly by close 'surveillance'. The final discourse presented by Grant (2005) is the Neoliberal discourse, where education is construed as a 'commodity'. Here the power relations are based on an explicit agreement between the supervisor and student in the context of a commercial enterprise. Grant (2005) comments that this form of supervision, when advocated by the institution, has the added effect of placing pressure on the student with regard to agreed completion times (often dictated by funding). In practice, this last discourse has much in common with the Technoscientific discourse.

Petersen (2007) alludes to supervision as 'category boundary work' where supervisors 'maintain, challenge and negotiate' boundaries in academia, and where both student and supervisor are involved in the processes of the regulation of self. This links to the work of Manathunga (2007,212) who strongly advocates that there is "a need to carefully explore, problematise and discuss inherent operations of power within postgraduate supervision, so that as supervisors, we become fully aware of the risks and tensions involved in shaping students' disciplinary identities".

2.4 Feedback on Postgraduate Writing

The final section in the review of postgraduate literature pertinent to this research is the literature relating to written feedback given to postgraduate students on their written drafts. Although feedback is of critical importance in the supervision process, it is relatively underexplored, particularly with regard to postgraduate feedback issues. It is critical that postgraduate students receive appropriate feedback on their work. Research into feedback in tertiary institutions has in the past, largely focused on feedback to undergraduate students (Carless, 2006; Duncan, 2007; Bailey and Garner, 2010; Nicol, 2010; Wingate, 2010; Beaumont et al., 2011; Vardi, 2012; Yang and Carless, 2013). Nicol, (2010) argues that this research literature either offers a 'transmission' view of feedback or alternatively one where the recipients are viewed as active 'constructors' of feedback. There does not appear to be an agreed definition of what constitutes 'feedback', and feedback is not often perceived from the viewpoint of the student (Scott, 2014). More recently there is a renewed interest in feedback on postgraduate research writing (Kumar and Stracke, 2007; Paré, 2010; Starke-Meyerring, 2011; Aitchison and Paré, 2012; Carter and Kumar, 2016).

Feedback can be seen as a practice that bridges the gap between what is required and the current performance (Parr and Timperley, 2010). Written feedback is part of the academic enterprise of postgraduate education, so if feedback is understood as a social process involving discourse, power and emotion (Mutch, 2003; Carless, 2006), then approaches to feedback are significant. Supervisory practices are often based on unequal power relations and dialogue is often difficult (Grant and Graham, 1999). One of the sensitive issues relating to feedback is the difficult task of critique in such a manner that the student continues to develop as a researcher. So the challenge is to provide critique in such a manner that damage to the student is minimised (Yelland, 2011).

Feedback as a social practice inevitably involves interrogation of the supervisor student relationship. Supervisory practices are often based on unequal power relations, and dialogue between the parties is thus often difficult. In this situation traditional feedback is often construed as a one-way supervisor to student process (Grant and Graham, 1999). Cooley and Lewkowicz (1997) suggest that a one-toone consultation between a student and a writing specialist is an effective way of addressing relationship issues which may emerge. Oral feedback is considered to assist with student identity, scaffolding their academic writing, particularly for those students with English as an additional language (Abdulkhaleq and Abdullah, 2013). Knowles (2007, 247) offers a critique of the traditionally held notion of the feedback relationship between supervisor and student. She suggests that the production of knowledge (and hence feedback) should not be construed too narrowly and that the power relations inherent in the supervisor-student relationship show a practice that is "less orderly, transparent, reciprocal and equal" than assumed. She argues that feedback may be difficult to understand, unequal and intangible.

One means of working with the power differential between supervisor and student is the idea of 'talkback'. 'Talkback' is seen by Lillis (2001) as commentary which focuses on the text as writing in the process of development.' as well as providing a space to interact and express the student's concerns. Using talkback allows the postgraduate writer to take ownership of the text and allows for the development of student identity. So 'talkback' is different from feedback in that the text is seen as

"provisional, in the making and still to be explored" (Lillis, 2001 10). A further supervisory practice which allows for the development of writer-identity and the acknowledgement of power issues in the supervisor-student relationship is that of *joint-texting*, where both parties work together to redraft work - particularly in the literature review (Kamler and Thomson, 2006). In addition supervision may entail two aspects of review: text work and identity work. The former involves "knowing the genres, conventions and textual" while the latter is identity work which takes a position and assumes "a hands on hips subject position" (Kamler and Thomson, 2006, 2).

This relationship may vary from a peer-to-peer model (Kumar and Stracke, 2007) to an apprentice-master model, where the power relations swing in favour of the supervisor (Knowles, 1999). Research has shown that feedback is often used superficially with little practical feedback on *how* to improve the writing (Chamberlain, et al., 1998). Wang and Li (2011,102 & 110) in a study on feedback given to international doctoral students suggest that when supervising and providing feedback on research writing it is important to engage with both *'the what'* and *'the how'* and to "use dialogic, culturally sensitive and holistic pedagogical approaches". Feedback typically focuses on the superficial (grammar and spelling) with a dearth of suggestion of the way forward for students (Duncan, 2007). Supervisor training could encompass an interrogation of what actually is said or written in supervision encounters with the intention of illuminating critical moments for "criticism, praise, advice-delivery or sensitive abandonment of conflictual issues" (Li and Seale, 2007, 522).

According to Turner (2004), the time it takes to engage with language is also often underestimated. She suggests that content is often prioritised above language in academic performance and that supervisors may believe that language errors are minor, and may be easily corrected. This links with Cummins' (1996) earlier notion that language and content can be successfully acquired by scaffolding in the form of textual and linguistic support.

An important function of feedback is that it enables the student to begin to participate in academia enabling independence in research (Caffarella and Barnett, 2000;

Stracke and Kumar, 2010). In this regard the notion of *feed-forward*, first suggested by Higgins et al., (2001), is a useful mechanism. The idea of feed-forward has been expanded by Hattie and Timperley (2007, 86) to include 'feed up (where am I going?), *feed back* (how am I going?), and *feed forward* (where to next?)'. Feedback enables the development of the research writer from that of novice to expert (Kumar and Stracke, 2011). Cafferella and Barnett (2000, 47) found that postgraduate students rated two areas of feedback as important for confidence-building: 'personalised, face-to-face feedback' and repeated feedback on drafts. The authors further recommend that supervision pedagogy and practice would benefit from the inclusion of materials which facilitate useful and effective critique. Their recommendations include "guidelines as to what skills reviewers should possess, what types of feedback to include in the critiquing process, how to handle conflicting feedback...., and an acknowledgement that being critiqued is both a rational and an emotional process..." (Caffarella and Barnett, 2000, 50).

One of the most useful tools for reflecting on the nature of feedback is a taxonomy. Two such feedback taxonomies are described here: the first devised by Kumar and Stracke (2007); and the second by Hyatt (2005). Kumar and Stracke (2007) and Stracke and Kumar (2010) used a case study to investigate the relationship between feedback and self-regulated learning (SRL). In their case study, the two authors devised a feedback taxonomy derived from an analysis of written feedback based on the first draft of a PhD thesis. Written feedback was classified as referential (providing information messages); directive (action-oriented feedback); and expressive (indicating the supervisor's feelings). These three categories of feedback (referential, directive and expressive) were further subdivided (See Table 1 below showing feedback categories and examples).

Table 1: Examples of referential, directive and expressive feedback (after Kumar and Stracke, 2007 and Stracke and Kumar, 2010)

1. Referential Feedback: (Provides information messages)

Editorial e.g. use italics consistently Please get rid of spaces

Organizational e.g. It more properly belongs in Section 5 of Chapter 2 This does not belong in the literature review.

Content e.g. more discussion is needed about the validity ... Are you sure you can make such a claim?

2. Directive Feedback: (directive action-oriented feedback)

Suggestion e.g. For example the data might have been fruitfully interrogated in terms of.... Maybe this is not necessary

Question e.g. Didn't Melinder also generate ideas? Whose term is this?

Instruction e.g. The figures should be consistently presented. Please clarify.

3. Expressive Feedback: (indicates supervisor's feelings)

Praise e.g. I find the cross-case analysis well done. Good, nice example.

Criticism e.g. This kind of last-minute hand-waving should be taken out unless actual comparative work has been undertaken. This table does not add to the text

➤ **Opinion** e.g. As your focus is on revision and process, I wonder how important this assessment is anyway?

Kumar and Stracke (2007) sourced in-text and overall summary feedback on the first draft of a PhD thesis. Nearly 50% of the feedback comments in the **in-text** feedback were referential, with 34% directive and expressive comments making up 18%. This contrasts with the **overall summary feedback** where expressive feedback made up nearly 45% of comments, followed by referential feedback (40%) and directive feedback (15%). There was a noteworthy change in the predominance of the expressive feedback from least in the in-text feedback, to most in the

summary feedback (Kumar and Stracke, 2007). In their later study, Stracke and Kumar (2010) confirmed the predominance of referential feedback, followed by expressive and directive feedback. The recipient of the feedback reflected that expressive feedback was the most important aspect of his academic development. In addition the authors suggest that feedback from examiners is a pertinent part of the doctoral experience.

The feedback taxonomy proposed by Kumar and Stracke (2007) functions as a way of reflecting on, and facilitating effective feedback. Whilst this taxonomy is useful as it allows a supervisor to reflect on his/her feedback it has several limitations. One drawback when using the taxonomy (as pointed out by Kumar and Stracke, 2007) is that some feedback comments can fit into more than one category e.g. *Are you sure you can make such a claim?* This feedback can be categorised as both referential (content) and also directive (instruction).

A further classification of feedback was proposed by Hyatt (2005) who put forward a list of comment types resulting from his analysis of assessment comments on Master's assignments. Comments alluding to content and style proved to be most frequent. The analysis incorporated seven categories: phatic, developmental, structural, stylistic, content-related, methodological, and administrative. These categories are further divided as shown in Table 2 below. In this study, Hyatt (2005) found that content comments (31,8%) were most frequent, followed by stylistic (27,8%) and developmental comments (23,5%).

Table 2: Classification of feedback comments (After Hyatt, 2005)

Comment type	Aim of comment type	Subcategory
Phatic	To maintain relationships between supervisor and student	Interest Encouragement
Developmental	To aid subsequent writing	Alternatives Future Reflective questions Informational comment
Structural	Organisation	Discourse level Sentence level
Stylistic	Use and presentation of academic language	Punctuation Lexis/vocabulary* Syntax/word order/grammar Proofreading/spelling Referencing Presentation Register
Content-related	Appropriateness/accuracy of content	Positive evaluation Negative evaluation Non-evaluative summary
Methodological	Research design /Analysis	Approach Procedures Process
Administrative	Administrative procedures	

^{*}The vocabulary of a language in contrast to its grammar

Both the feedback taxonomies described above in Tables 1 and 2 are useful tools for supervisors who wish to unpack what kind of written feedback they are offering their postgraduate students on their writing. The second taxonomy (Hyatt, 2005) has a stylistic section which focuses on academic language. This comment type would be considered as superficial feedback in the new feedback model presented in the later chapter on feedback. Nevertheless Hyatt's (2005) model offers a useful insight into the possibilities for those responsible for feedback to reflect on their feedback practices. However both taxonomies offer a possibility for a shared feedback metalanguage which could be useful for feedback discussion and interaction between supervisors, and more importantly between supervisors and their students.

In a New Zealand study of feedback across Humanities, Science and Commerce, Basturkmen et al., (2014, 443) reported that there was a focus on "linguistic accuracy/appropriateness and content" and fewer comments "on requirements and cohesion". The latter could indicate that coherence is a difficult and complex issue for supervisors who may lack the specific linguistic skills useful in this regard. Supervisors may be able to write coherently themselves and be able to recognise coherent writing but the majority may not be able to suggest how to make a text coherent (Basturkmen et al., 2014). This is a critical aspect as many external examiners' reports refer to the lack of coherence. At a recent supervision conference presentation where I questioned our understanding of coherence, I asked the audience to turn to their neighbour and explain what they understood by the term 'coherence'. This request was greeted initially by silence and then by laughter! The notion of coherence is further examined in the section of Feedback Strategies discussed later in this chapter. So there is a tendency for supervisors to resort to comments relating to grammar, punctuation and spelling at the expense of deeper, more developmental feedback.

So a critical element of feedback is that it should be developmental in nature. Wang and Li (2011, 102) suggest that feedback "allows the supervisor to communicate ideas, engage the student in intellectual dialogues, and provide coaching, modeling and scaffolding". In their study, Wang and Li (2011) found that students require different feedback during their doctoral research journey. New researchers were found to favour the 'apprentice-master' model which focused on 'structured and detailed' feedback. Later in the research process, more assured students found the 'mentor' model to be useful. Wang and Li (2011, 109) point out that over the long term "by closely following directive feedback without much questioning, students may not effectively develop their critical thinking and advanced academic writing skills". This study reinforces the notion that developmental feedback is of paramount importance in the writing journey of a postgraduate student.

Further to the idea of self-regulation and the ability of the student to develop research writing skills, Carless et al., (2010, 3) define the idea of sustainable feedback as "dialogic processes and activities which can support and inform the student on the current task, whilst also developing the ability to self-regulate

performance on future tasks". The notion of dialogic feedback is further elaborated in a later paper by Yang and Carless (2013, 287) who describe a feedback triangle where there is a relationship between feedback content, the 'social and interpersonal negotiation of feedback', and the 'organisation and management of feedback'.

Paré (2010) suggests that if feedback is difficult for the student to understand (vague, overly critical, not focused on appropriate parts of the text), students may become 'frustrated'. Paré (2010, 107) suggests that supervisor feedback is "often ambiguous, enigmatic and coded" and he further argues that close textual analysis of their students' writing may be beyond the ability of even well-published supervisors.

Little work has been published in the South African context. However in a study conducted at two South African universities on postgraduate supervision, Wadesango and Machingambi (2011) listed a number of issues raised by postgraduate students relating to supervisor feedback: viz. insufficient feedback; feedback inconsistent with earlier feedback and slow and intermittent feedback. The negative nature of feedback was also raised as an issue by students in the study.

Feedback Strategies

Several feedback strategies have emerged to assist students with research writing. The strategies can be divided into those which focus on surface-level feedback (mostly errors of grammar) and those which concentrate on content, structure and the bigger picture. Brown (1994, 94) comments that "the almost universal response, when commenting on a draft is to work at the lower levels to suggest changes that could be made". It is hard to argue against doing this as some improvement seems to result, but working from the bottom up (by trying to correct the individual words and phrases) doesn't always get to the top. Even when all the typos and poor grammar have been corrected, there is still no guarantee of producing a coherent document and most remain capable of substantial improvement". In Figure 2 below the hierarchical nature of the tasks undertaken by research writers and their supervisors is depicted.

Most complex tasks Overall coherence, cohesion and clarity Logical flow Sentence structure Paragraphing Links between paragraphs - connections Layout Headings Grammar Spelling Least complex tasks

Figure 2: The hierarchy of tasks both students and supervisors need to master (adapted from Brown, 1994, 95)

Bean (2001) found that when students make numerous errors the feedback concentrates on these, with little input regarding ideas and overall structure. Zamel (1983 and 1985) suggests that comments on grammar are not useful before students' ideas are clear. Dunlap (1990) suggests that poor grammar is simply 'unfinished thinking', and comments that writing invariably improves with clarity of thought. Bean (2001) agrees this is a common tendency in student writing and points out that this is an important part of the writing process. Bean (2001, 68) reveals two feedback approaches: superficial error correction; and revision—oriented feedback which focuses on the bigger picture of structure "with the aim of evoking a revised draft exhibiting greater complexity and sophistication of thought". It follows then that that superficial error correction results in premature editing.

The nature of feedback should also vary depending on where the student is in relation to the research writing process. Early in the writing process, attention should be placed on content and clarity. It is logical then, to suggest that superficial surface-level correction and feedback are not useful at the beginning stages of writing as they result in inefficient and premature editing (Bean, 2001). Bates et al., (1993) concede that it might be useful to draw attention to repetitive global errors which

interfere with understanding and that a student may be crushed by extensive feedback.

Ferris (1997) investigated feedback types to ascertain the importance of feedback on subsequent drafts written in a freshman composition course. Ferris produced an analytic model for teacher commentary and investigated marginal and end comments made on drafts. Ferris (1997, 333) confirms that "simultaneous attention to content and form" may assist student writing. She suggests that longer and text-specific comments seem to have greater impact on later drafts than general comments. These ideas are mirrored by Wisker (2004, 142) who suggests that 'selective' feedback allows for change at the 'conceptual, critical and analytical levels' of research writing. She confirms that supervisors should avoid correcting grammatical errors at this stage.

Mirzaee and Hasrati (2014) found that written feedback encouraged students' awareness of aspects of their writing and this enabled them to target improved writing competence. Race (1998) also linked feedback to the development of competence. He suggests that academics more frequently offer feedback on poor writing. He points out that students are aware of this shortcoming and suggests that it might be far more useful strategy to focus on what he terms the area of 'unconscious uncompetence' in order for the writer to arrive at 'conscious competence'. Figure 3 (below) shows Race's useful way of charting a student's progress in order to arrive at what he terms 'conscious competence'. Initially a student may be unaware of problems related to his/her writing (danger box), and hopefully with guided feedback may become aware/conscious of this in order to become 'consciously competent' (transit box). Ultimately the target is 'conscious competence', however in addition to lacking knowledge of what they do well with regard to writing, students may not be aware of their writing strengths (competence) (Magic box). So students' understanding of their writing ability (their strengths and weaknesses) will ultimately assist their development as research writers. feedback strategy addresses the common tendency on the part of the supervisor to offer feedback devoid of praise.

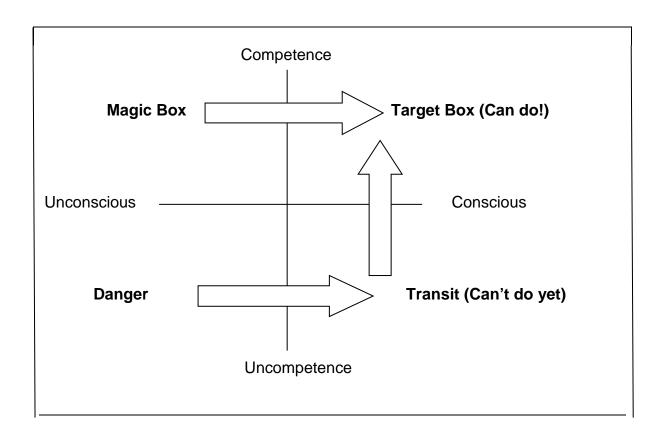


Figure 3: A feedback strategy to develop writing competence (after Race, 1998, 82)

The notion of coherence appears in many studies of research writing. Coherence has been described as that quality in a piece of writing which enables a reader to sense a flow in what is being communicated. In addition to content, coherence is what gives a piece of writing its logic and enables a reader to follow an argument from what is being communicated (Fahnestock, in Buffler et al., 1997). In their research into how external examiners assess research, Mullins and Kiley (2002) found that examiners cited lack of coherence (especially the coherence of theoretical and methodological perspectives) as one of the major characteristics of a poor thesis. Vardi (2012), in a study of undergraduate writing in an Australian university, highlights coherence. She suggests there is an important relationship between content, context (the university) and form. A further feedback strategy which would enable coherence, is to concentrate on the moves contained in the research argument. A good strategy is "to map the moves of the argument; to see how it is set up, staged and substantiated to allow convincing claims to be made" (Kamler and Thomson, 2006,91).

Linked to coherent writing is the notion of cohesion with respect to text readability. Whereas coherence refers to the relationships between large parts of the text, the term cohesion refers to "the linking of sentences and paragraphs through the use of devices - particular words and phrases - that show the relationship between one group of words and another" (English and van Tonder, 2009,55). Halliday (1985) has listed four ways by which cohesion is created in text: by reference, ellipsis and substitution, conjunction and lexical organisation. Basturkmen and Bitchener (2014) in a study investigating feedback comments across three disciplines, surprisingly found fewer comments relating to coherence/cohesion than those concerned with linguistic accuracy /appropriateness and content. They suggest that developing coherence is a complex task in that it requires the deconstruction of text and its logic.

Good feedback can be described as understandable, offered at the appropriate time and taken on by students (Gibbs and Simpson, 2004). These ideas are further elaborated by Nicol (2010, 512)) who sees feedback as 'a dialogical process'. His summary of what he considers good feedback comments to be, is given in Table 3 below.

Table 3: Recommendations for good feedback (after Nicol, 2010)

Understandable	Expressed in an understandable manner	
Selective	Comments on 2-3 aspects (in reasonable detail) that	
	students can do something about	
Specific	Indication of where the feedback applies	
Timely	In time to improve the next assignment	
Contextualised	Has reference to learning outcomes and/or assessment	
	criteria	
Non-judgemental	Descriptive – focused learning goals (not just performance	
	goals)	
Balanced	Positives and areas of concern	
Forward looking	Suggesting subsequent improvement possibilities	
Transferable	Focused on processes, skills, self-regulation(not only	
	content)	
Personal	Referring to what is already known about student and	
	his/her previous work	

2.5 Conclusion and Summary

This chapter began with a focus on the increasing attention currently paid to postgraduate supervision in higher education. Concomitant with this development is a move towards training for supervisors and the notion that research supervision needs to be contextualised and student-specific. The second area of interest centres on the links between supervision and postgraduate writing and the usefulness of the academic literacies approach. In this section various models of writing supervision were also considered. Finally the relatively underexplored field of feedback on postgraduate writing was examined. The next chapter will address the research design utilised in this study.

The initial section of this review focused on the pedagogy of postgraduate supervision and set the scene for my research. There are a number of implications for my research emanating from the review of the literature. Firstly, it is clear that globally postgraduate students struggle with their research writing and that their supervisors have difficulty assisting them. Many of the findings reported here are set in a southern hemisphere context, particularly from Australia. Whilst there are some similarities between the Australian and southern African context with regard to writing supervision, there is a lack of African research in this critical area of academic Postgraduate writing supervisors in the African context are faced with a dilemma as how to work in a developmental way that problematises the inherent power relations in the supervisor-student relationship given the frequency of language-related issues in the writing. Secondly, there is a dearth of research relating to writing in science. This field is relatively unexplored not only locally, but also globally. Hence my case study is located in two allied science disciplines located in a Science Faculty in a South African university. Thirdly, a review of the writing assistance offered to postgraduate students reflects an encouraging number of studies relating to 'outsider' models of writing assistance. However, there is a silence with respect to alternative models of writing assistance offered by supervisors within disciplines, such as the one explored later in Chapter 6. Finally, written feedback from supervisors on their postgraduate students' research writing is becoming increasingly important if students are to meet the demands of academic writing. The taxonomies of feedback comments mentioned have important implications for the ability of supervisors to reflect on, and improve, the nature of their feedback.

Chapter 3: Research Design and Analysis

3.1 Introduction

Qualitative research investigates "concrete cases in their temporal and local particularity....starting from people's expressions and activities in their local contexts" (Flick, 1998, 13). This research employs a qualitative approach to investigate the flow of events and processes related to the writing aspect of supervision, and considers how participants understand these events and processes. The intention is to understand the research phenomenon from the participants' perspective by looking at the various contexts and meanings for these events and processes (McMillan and Schumacher, 1993). This study takes the form of practitioner research and as such is primarily perception research linked to reported experience.

This qualitative approach, I believe, will allow for a rich and useful understanding of the issues relating to postgraduate student writing and their supervision. This chapter elaborates on the qualitative nature of my research design and my rationale for using a case study approach. The research instruments (open-ended interviews, student drafts of their writing with supervisor feedback, fieldnotes, emails and researcher reflections) are discussed, followed by the frameworks used for analysis: thematic content analysis for the interviews, and a new analytic framework (relating to the research mentioned in Chapter 2) developed to address the feedback question. Reliability and research subjectivity are addressed, followed finally by ethical considerations.

This study has three research questions:

- 1. What is the nature of postgraduate writing supervision?
 - ➤ What writing issues are perceived by supervisors and their postgraduate students with regard to the students' writing?
 - What writing strategies are used by supervisors and their students?

- 2. What is the nature of written feedback given to postgraduate students by their supervisors?
 - What feedback issues are raised by supervisors and their students?
- 3. What is the nature of the new writing-centred co-supervision model?
 - What are the implications of this model for the development of postgraduate writing and supervision?

These three research questions are linked. In order to unpack the nature of postgraduate supervision in this case study of a university department, it is necessary first to discover the perception of writing issues held by postgraduate students and their supervisors. Having investigated these aspects, it is then useful to open up the nature of the written feedback, given the context of the participants. In response to some of the writing and feedback issues the Writing-Centred Cosupervision Model was initiated. It is then pertinent that this new co-supervision model is interrogated as a possible initiative to develop postgraduate writing.

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The research study site is located in a South African University in a Science faculty. This university has recently focused on expanding its postgraduate cohort and the department in which the research is located draws postgraduate students both from within South Africa and from Africa (notably from Zimbabwe, Botswana, Lesotho, Malawi, Nigeria, and Cameroon). Thus diversity is apparent in the postgraduate student population, but less so in the composition of supervising staff. The majority of the supervisors in this sample are South African with one supervisor from Europe and one from Canada. The student sample consists of South African students as well as students from Botswana, Lesotho, and Zimbabwe.

3.2 Research Design, Instruments and Data Sources

Figure 4 below shows the research process including a pilot.

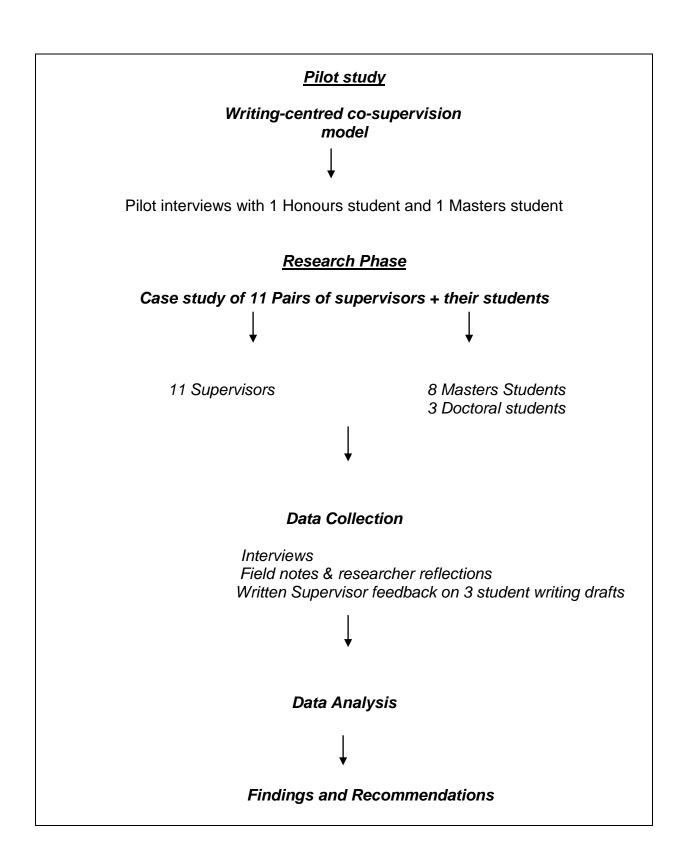


Figure 4: The Research Process

3.2.1 A Case Study Approach

A case study approach was chosen for this research, because its flexibility and adaptability to a range of contexts, processes, people and foci, provides one of the most useful methods available in educational research (McMillan and Schumacher, There are a range of descriptions of a case study. A case study can be defined as "an empirical inquiry that investigates a contemporary phenomenon within its real-life context" when the distinction between context and phenomenon are blurred; and in which "multiple sources of evidence are used" (Yin, 1989, 23). Merriam (1998, 16) describes a qualitative case study as "an intensive, holistic description and analysis of a single entity, phenomenon or social unit. Case studies are particularistic, descriptive and heuristic and rely heavily on inductive reasoning in handling multiple data sources". The use of case studies in this research is intended to unpack the issues of research writing and writing supervision and the intention is not to make empirical generalisations. Such a research approach may be categorised as 'intensive' where the "individual members of the research population need not be representative" (Herod and Parker, 2010, 69). Case studies present an ongoing situation which is available for investigation as is the context of this research. Case studies may utilise both observation and archival methodologies where a phenomenon is investigated using individual instances or cases. case study approach differs from other non-experimental methodologies in that it may use a multiple approach (McBurney, 1998). I chose not to use observation of supervision as I consider this to be invasive and somewhat disrespectful of the personal interactions between supervisors and students. Participants have the right to decide what it is they wish to share regarding the supervisor-student relationship.

Case study research may use one of three forms: *intrinsic case study* where one case is investigated often for the purpose of evaluation; *instrumental case study*, where the case is seen as one instance in order to shed light on an issue; and *collective case study* (chosen for this research), which is an extension of instrumental case study and where more than one case is selected to obtain representation. Case study research aims for depth and a 'thick' description in an attempt to capture multiple realities and meaning' (Cousin, 2005). Case study

research has been critiqued as not scientifically credible by some 'hard science' academics. The response to this view is first that the possibility of research neutrality is increasingly understood as impossible- the subjective bias of the researcher is accepted, and second that methodological rigour may be a combination of art and science (Cousin, 2005). I believe that aspects of supervision and postgraduate research writing remain hidden from view (for example the verbal interactions in a supervisor-student meeting) as these practices are intensely personal, revolving around the identities of those taking part and power relations which centre on the supervisor-student relationship. Thus the collective case study in this research consists of supervisors and students located in a Science department (consisting of two allied disciplines) in a South African university.

Cousin (2005, 426) gives examples of 'narrative fraud' in case study research where "the subjective bias of the researcher is accepted" such as "overstating from flimsy evidence, ignoring local effects, and opportunistically cherry picking the data". Six key strategies for researchers to minimise 'narrative fraud' in case study design are:

- adopting an ethic of caution with regard to their generalisations
- a need to be reflective about their own position and possible bias
- strengthening their evidence through triangulation if making a clearly contestable assertion
- ensuring a sufficiently 'thick description' of the case such that the reader can share in the interpretation with the researchers
- sharing their provisional analysis with stakeholders for their comments
- taking a postmodern stance claiming that all research reports are the stories
 of the researcherin order to advance debate and enrich understanding.
 (adapted from Cousin, 2005, 426).

One of the advantages of a case study is that insights gained from the study are useful for a range of purposes including among others, the development of academics and feedback to the institution (Adelman et al., 1976). Case studies present an ongoing situation which is available for investigation. In order to address Cousin's (2005) concerns, rather than drawing hard and fast conclusions, (which in

any case are not consistent with my notion of a qualitative case study) my findings provide rich insights into the complexities of supervision and research writing.

3.2.2 Practitioner Research

Practitioner research can be described as "a central commitment to the study of one's own professional practice by the researcher himself or herself, with a view to improving that practice for the benefit of others" (Dadds and Hart 2001,7 in Bartlett and Burton, 2006, 395). Dadds (1998) comments that practitioner research demands 'sophisticated understandings' of the area in which the practitioner operates, with the intention of understanding the perceptions and experiences of others. Dadds (1998, 43) further intoduces the notion of 'turbulence' in the research process created by the interpersonal demands of the process and the 'shock' of seeing the research self in the data, as "power structures and relationships are peeled away to examine people's lived experiences within them". The question of ethics with regard to practitioner research is raised by Ground-Water-Smith and Mockler, (2007, 57) who argue that "practitioner research that provides only celebratory accounts may meet procedural requirements but will fail to address the more difficult and challenging substantive ethical concerns in relation to the wider social and political agenda". There should be an honest attempt to develop authentic critique. They suggest five ethical guidelines for conducting practitioner research (Groundwater-Smith and Mockler, 2007):

- It should observe ethical protocols and processes e.g. informed consent and an attempt to 'do no harm'.
- It should be transparent in its processes as one of the aims of practitioner research is the building of community and the sharing of knowledge and ideas.
- It should be collaborative in its nature and aim to provide opportunities for sharing, discussing and debating practice with colleagues with the aim of improvement and development.
- It should be transformative in its intent and action in that it contributes to both transformation of practice and society to create actionable outcomes.

• It should be able to justify itself to the community of practice requiring collaboration and communication.

It is important to note that this research is primarily one of perception and reported experience. Hopefully the understandings gained through this participant research will inform and be of use to the community involved in the study. To date the findings of my research have been conveyed to the participant supervisors, the students, and to the wider academic community via a number of workshops run in the institution's Teaching and Learning Centre and in the presentation of three international conference papers.

In this research the unit of analysis or 'the case' is a group of supervisors and their postgraduate students in a science department at a South African tertiary institution. The nature of this group is outlined in the section on the participants which follows.

3.2.3 The Research Participants

The case in this context was determined by making use of *purposeful sampling*. For this study I consider purposeful sampling to be the most appropriate form of sampling, as compared with probabilistic sampling, it selects information-rich cases for in-depth study in order to understand the phenomenon. There is no necessity to generalise. The sample is specifically chosen for a particular reason and the participants are chosen because they are likely to be knowledgeable and informative about the research phenomenon (McMillan and Schumacher, 1993). In interview research, participants are selected in relation to the focus of the research (Secor, 2010). A limitation of this form of sampling is that in selecting the sample there may be an error in judgement on the part of the researcher i.e. bias in determining the sample may be an issue (McBurney, 1998; Jensen and Shumway, 2010). These supervisors and their students are reflective of an academic group working in a particular context: that of two allied disciplines in the Science Faculty of a tertiary institution as described earlier in this chapter.

For my study all supervisors in a university Science department were personally invited to be part of the research study. Three supervisors declined - one gave no reason, while two declined. So the research sample consisted of 11 supervisors ranging in supervision experience (See Table 4 below showing supervision experience). Of the eleven supervisors, four were female and seven male. Six of the supervisors were of professorial level. One of the ethical constraints which emerges in describing these supervisors and their students, is the context of the research. This is a dilemma as for ethical reasons the disciplines cannot be disclosed and the identities of the participants cannot be further elaborated upon other than information offered in Table 4 below.

Supervisors who were invited to be part of the study were asked to identify one postgraduate masters or PhD student that they were currently supervising. These students were then invited to be part of the research sample. The sample pair thus consists of a supervisor and his/her matching Masters or doctoral student. So the selection of which postgraduate students were selected for the study was largely determined by the supervisors although I was consulted if there was a choice of student participant. The choice was also constrained by the stage of the participant student's' research as mention below. Initially, honours students were to form part of the sample, however I decided that they should not form part of the sample as their time at the institution is very short — only one year. Thus it was felt that the timeframes for interviews (and later interrogation of written feedback on student drafts) would prove problematic.

The sample includes supervisors and students in what is termed the 'traditional supervision model' as well as those engaged in what I have termed the Writing-centred Co-supervision Model. The 'traditional' supervision model is defined here as supervision where there is only one supervisor. The newly conceptualized Writing-centred Co-supervision Model is a model of co-supervision where there are two supervisors, each with different roles: a content supervisor and a supervisor who is a writing specialist both located within the discipline with a joint and equal responsibility to supervise the student. The content supervisor concentrates on content issues while the writing supervisor assists with the development of the student's research writing. I am the writing co-supervisor in this new Writing-centred

Co-supervision Model. There were six supervisors who operated in the traditional supervision model and 5 supervisors who co-supervised with me in the new Writing-centred Co-supervision Model. This new model and its possibilities are explored more fully in Chapter 6.

The postgraduate student sample initially consisted of 12 students, 5 male and 7 female. Student 1 later withdrew when he cancelled his candidacy. Student 4 disappeared from the university and failed to respond to efforts to contact him by his supervisor, so Student 10 was then invited to be part of the sample. Hence Supervisor E has two students. Supervisor A took part in the interview research but indicated at this stage that he had no current postgraduate students. The degree status of these students is shown in Table 4 below: Eight were registered for a Master's degree and three were doctoral candidates. Seven of the students have English as an additional language (i.e. not their home language). The nature of the registration of the student sample (Masters or PhD) was dictated by which students the supervisors were supervising at the time of the commencement of this study, and the length of time they had been registered as postgraduate students. It was considered important that the students had passed the proposal stage, had gathered their data and were engaged in the writing of their results/discussion/analysis chapters at the time. This timing was important as the students were then able to articulate better some of the challenges embedded in their research writing and were able also to supply the researcher with drafts containing supervisor feedback. participants consented to being interviewed and to their interviews being audiotaped. This aspect is discussed in the section on ethics at the end of this chapter.

So in this research, the sample consisted of 11 pairs of supervisors and their matching Masters or doctoral students. (See Table 4 below).

Table 4: Pairs of Supervisors and their students

Supervisor	Supervision Experience	Participant in new co- supervision model	Gender	Student	Degree	Gender
Supervisor A	11 years	No	М	No student		
Supervisor B	15 years	No	F	Student B9	Masters	F
Supervisor C	15 years	Yes	М	Student C8	Masters	F
Supervisor D	> 20 years	Yes	М	Student D7	Masters	F
Supervisor E	5 years	Yes	F	Students E4 & E10	Both Masters	M&F
Supervisor F	12 years	Yes	F	Student F3	Masters	М
Supervisor G	15 years	No	М	Student G5	Masters	F
Supervisor H	> 20 years	No	М	Student H11	PhD	F
Supervisor J	16 years	Yes	М	Student J6	PhD	F
Supervisor K	12 years	No	М	Student K1	Masters	М
Supervisor L	> 20 years	No	F	Student L2	PhD	F

3.2.4 Data Sources

'Qualitative researchers collect data by interacting with selected persons in their settings (field research) and by obtaining relevant documents' (McMillan and Schumacher, 1993, 372). I utilised a variety of data sources including semi-structured open-ended interviews with both supervisors and postgraduate students, written student reflections (particularly with regard to their views on the Writing-

centred Co-supervision Model), drafts of student writing and written feedback from supervisors, emails between the researcher, supervisors and postgraduate students, and field notes and reflections captured by myself as the study progressed. Table 5 below shows these sources of data.

Table 5: Sources of research data

	Research Questions	Data utilised to answer the question
1.	 What is the nature of postgraduate writing supervision? What writing issues are perceived by supervisors and their postgraduate students with regard to the students' writing? What writing strategies are used by supervisors and their students? 	Documents:
2.	What is the nature of written feedback given to postgraduate students by their supervisors? What feedback issues are raised by supervisors and their students?	Documents ➤ Drafts of students' research writing ➤ Supervisor comments on student drafts Interviews ➤ Interviews with supervisors ➤ Interviews with students ➤ Fieldnotes and researcher reflections
3.	What is the nature of the new writing-centred co-supervision model? What are the implications of this model for the development of postgraduate writing and supervision?	Documents: Case study: analysis of student drafts and comments from writing and research supervisors in the writing-centred cosupervision model Emails to/from co-supervisors Internal & External Examiners comments Field notes and researcher reflections Interviews Interviews with writing-centred cosupervisors and with students

3.2.5 Interviews

Interview techniques

The aim of interviews as a research tool is usually to uncover knowledge and practices located in particular contexts and not to generalise to a population (Secor, Interviews can provide access to the authentic feelings of participants and may allow flexible interaction with the participants and exploration of their experiences (Yin, 1989; Valentine, 1997; Secor, 2010). Interviews may be selected as a research tool when the participants are viewed as 'experts' with regard to specific knowledge, experiences and practices (Secor, 2010). Both supervisors and postgraduate students were regarded as such for the purpose of this study. All the supervisors had more than 5 years of supervision experience while all the students had prior experience of research writing in their Honours degree, while three of the students had research experience in a Masters degree. Open-ended semistructured questions and probes were chosen for the interviews with supervisors and students since this flexibility allowed the respondents to answer more fully in their own words and the possibility thus existed that the reasoning behind their answers would be revealed. Often the answers to open-ended questions uncover a new unanticipated aspect (Kitchin and Tate, 2000).

Open-ended semi-structured Interviews were conducted separately with supervisors, and with their research students to investigate issues raised in the interview questions. The interviews with supervisors were conducted in their own offices and the students decided where they would be comfortable to be interviewed. In this interview situation, the researcher may and should make decisions regarding the ordering of questions as some questions may be answered unintentionally (Flick, 1998). So there is a tension in trying to stick to the interview guide whilst being open to responses which are relevant to the research question. The interviews were intended to be a dialogue and often the questions were asked differently depending on the discussion. An advantage of this approach is that the participants are free to introduce unanticipated issues (Valentine, 1997). The downside was that not all interviews covered exactly the same ground. In an attempt to work with this, in a few instances, I met with participants twice in 2009: the first time individually with all eleven supervisors to interview them to ascertain responses to the research

questions, and a second time if needed to clarify and extend any ideas that emerged from the initial interview or from the interviews of other participants. In the second meeting so-called 'red flags' were probed. 'Red flags' are phrases such as 'never', 'always', 'everyone knows that is the way it is done', and which signal that closer investigation is needed by questioning the assumptions that are being made (McMillan and Schumacher,1993). The interview question guide is to be found in Appendix A. The interviews were audio-taped, and transcribed using line numbering. Table 6 below indicates the dates on which the interviews were completed.

Table 6: Participants and interview dates

Supervisor	Date of	Student	Date of interview
	Interview		
Α	9 June 2009	No student	
В	3 June 2009	B9	5 June 2009
С	23 Jan 2009	C8	5 March 2009
D	30 Jan 2009	D7	2 March 2009
E	21 May 2009	E4	No interview (student disappeared
			from institution)
		E10	8 June 2009
F	8 May 2009	F3	16 March 2009
G	19 Feb 2009	G5	19 March
Н	15 April 2009	H11	26 May 2009
J	6 Feb 2009	J6	14 April 2009
K	15 June 2009	K1	28 May
L	23 Feb 2009	L2	11 March 2009

Limitations to be considered when interviewing range from issues of trust, social distance and interviewer control to avoidance tactics on the part of the interviewee if questioning is regarded as 'too deep'. There may also be genuine miscommunication between the researcher and the interviewee (Cicourel, 1964). I responded to this possible limitation by attempting to ensure that the participants (Supervisors and postgraduate students) were given transcripts of their interviews for comment and verification. Participants may come up with ideas/ responses that they perceive the interviewer may wish to hear and there needs to be sensitivity to possible power relations between interviewer and interviewee (Kitchin and Tate, 2000). This aspect was particularly pertinent with regard to the postgraduate participants as there may be inherent and underlying power issues which may prove difficult for the

participants to foreground. There is also the danger as mentioned earlier of using the interview guide too rigidly, moving to the next question and thereby interrupting the interviewee involved in deepening the topic (Flick, 1998). When setting up the interviews I stressed that they were conversations and that although there was an interview guide, the participants were encouraged to open up areas they considered to be important and of relevance. Finally there is always the pressure of time for the interviewee which may cut short the intention of the researcher to probe interesting ideas. I negotiated careful timeframes in order to be respectful of the participants' agreement to participate in my study. In addition my role as practitioner researcher, (and co-supervisor in some cases) called for a critical look at the possibility that power issues between myself and the postgraduate participants may impact on the nature and presentation of my findings.

Appendix A lists the open-ended interview protocols used when interviewing supervisors and students respectively. It was decided to add a further question for those supervisors who form part of the sample for the Writing-centred Cosupervision Model: "Has working in the co-supervision model changed your practice when working as a traditional supervisor outside of this model?" This further question was emailed to the relevant supervisors.

3.2.6 Documents and student drafts

Drafts of three texts (at varying stages) of postgraduate student writing with accompanying written feedback from their supervisors were elicited from three different postgraduate students with the consent of their supervisors. Initially I asked supervisors to supply these documents, however it soon became apparent that very few supervisors kept copies of their written feedback to students (either in hard copy or electronically using track changes) and so the students were approached to supply me with drafts of their work containing supervisor feedback. In addition I kept a record of email interactions between co- supervisors and myself (the writing co-supervisor) in connection with our work in the Writing-centred Co-supervision Model. I also kept postgraduate student reflections with regard to this model. The postgraduate students who were co-supervised in the Writing-Centred Co-supervision Model were requested to reflect on their experience of having a second

supervisor who concentrated on their writing development. No particular format was required and the students were free to respond in any way. However critique was encouraged so that this model could be improved. Field notes and reflections kept by the researcher (myself) were also recorded. A list of the documents used in relation to each research question for supervisors and/or students is given above in Table 5 above.

3.3 Analysis of Data

"Qualitative analysis is a systematic process of selecting, categorising, comparing, synthesizing and interpreting to provide explanations of the phenomenon of interest" (McMillan and Schumacher,1993, 480). The analysis design chosen for this research is inductive. Inductive analysis is exploratory and content driven and allows categories to come to light without the influence of predetermined ideas on the part of the researcher (Guest et al., 2012). The results and analysis in this research are structured according to the three research questions listed earlier in this chapter. So in this research the themes were generated empirically from the raw data and not from theory. This form of analysis is used when considering the writing issues raised by staff and postgraduate students in Chapter 4.

Three sets of data are analysed in this research: the transcripts of the interviews with supervisors and students; the written feedback given to students on drafts of their research writing; my reflective fieldnotes, and emails received and sent by students supervisors and myself as the researcher and a co-supervisor in the new Writing-centred Co-supervision Model in which my conceptions of the new Co-supervision Model were communicated at the time. The interview findings are analysed and interpreted using thematic content analysis, and the feedback on drafts is analysed using a new simplified theoretical framework consisting of a continuum of feedback practice. Consequently following from this methodological chapter, there are three analysis chapters, each dealing with one of the research questions.

3.3.1 Thematic Content Analysis: analysing the interview data

Thematic content analysis was utilised to evaluate the interview data. Thematic content analysis describes the specific and recurring qualities, characteristics, or concerns expressed in the data. Thematic content analysis allows the identification of themes by individual cases, and allows themes across cases to be synthesized. This type of data analysis can be used to anticipate what may take place in similar settings (McMillan and Schumacher, 1993). Thematic content analysis requires the data to be coded in order to identify themes. Coding is "an active thoughtful process that generates themes and elicits meanings, thereby enabling the researcher to produce representations of the data that are lively, valid and suggestive of some broader connections to the scholarly literature" (Clifford and Valentine, 2003, 457). The aim of coding is to make sense of and unpack the text. This coding allows for 'themes' or patterns to be established. Themes may emerge by direct observation in the data (obvious) or they may be hidden (Boyatzis, 1998). So this form of analysis involves a process of sorting the data into themes or categories (which are inductive and not pre-determined and which represent the meaning of similar topics), and identifying patterns emerging from the data as well as the links between them. Preliminary categories are flexible and not rigid in nature. The goal in this research is to identify similarities and distinctions between categories in order to identify emerging topics and recurring patterns in the data (McMillan and Schumacher, 1993; Guest et al., 2012).

There are a number of steps to be followed when using thematic analysis (adapted from Boyatzis, 1998, 44). :

- Establish sample and design
- Reduce the raw data
- Identify themes and codes within the sample
- Compare themes consistently across samples
- Check for reliability and validity
- Interpret results in the context of a theory or conceptual framework

Each transcript was read several times, and categories emerged which were then coded. Coloured markers were used to distinguish between the part of the transcript allocated to a particular code. The coded transcript data was then collected together and arranged into themes. I made an effort to offset any researcher bias and subjectivity when making sense of the data from the interviews in that I took care to ensure that ideas were not taken out of context and meaning lost by cutting out parts of phrases. I then re-evaluated the transcripts a number of times for validity to ensure that quotations actually fitted the themes and to refine the themes. Participants were asked whether they wished to read or add to the transcripts of the interviews. Two supervisors asked to read their transcript but no changes were requested.

The last step mentioned by Boyatzis (1998) above requires a conceptual framework. My theoretical framework has been outlined in the introduction to Chapter 2 (Literature Review). The theoretical framework used in this research sees research writing as a contextualized social practice (Lillis, 2001) and research supervision is considered to be a diverse and contextualised process (Wisker and Sutcliffe, 1999).

One advantage of thematic analysis is that it allows for useful communication between 'different fields, orientation or traditions of inquiry' (Boyatzis, 1998, 6). Limitations to be aware of when using this approach include the possibility of the researcher's positionality becoming an issue, the lack of multiple perspectives when designing the sample; and the mood and style of the researcher when coding (Boyatzis, 1998). I attempt to address the issue of positionality by acknowledging this issue both in the interviews, and in my analysis- particularly in Chapter 6 which addresses the new model of writing-centred co-supervision where I am the writing co-supervisor and the researcher. The decision to use purposeful sampling allowed some perspectives but I was constrained in my choice of postgraduate participants in that I had limited choice depending on the level of registration and availability of the postgraduate student linked to the supervisor. With regard to the possible coding limitation mentioned above, I did review my coding and made appropriate adjustments where deemed necessary. One drawback of open-ended questions is that when using thematic content analysis, coding may be problematic since the answers may be in the form of narrative (Mc Burney, 1998).

In writing up the data, the following list of questions taken from Jackson (2000, 248-250) were considered to be useful:

- What does the reader need to know about the research context in order to make sense of the data?
- How should individual quotations be attributed?
- To what extent should data be 'cleaned up'?
- How would the sense of these extracts change if the researcher's questions/prompts were omitted?
- (How) would the sense be affected by using longer (or shorter) extracts?
- Is it acceptable to re-arrange the extracts?
- Should you return your analysis to your respondents?

Bearing these ideas in mind I was careful not to shorten the quotations as some of the intention and value may be lost in this process. In some instances where participants repeated ideas touched on earlier in the interview/s, these were linked in the analysis. The language of the participants was not changed in any way so as to reflect the authenticity of the voice of the participants.

3.3.2 A New Analytic Framework for Analysing the Feedback Data

A new framework for the analysis of written feedback from supervisors to students was devised. The analytic framework conceptualised for supervisor feedback is shown in Figure 5 below. It presents the various elements of feedback practice. I had been requested to run several workshops by the Centre for Teaching and Learning Development in my institution for supervisors on their written feedback. The work of Brown (1994) proved to be useful for colleagues in analysing their written feedback to their postgraduate students and this sparked the development of the feedback framework. The components of the framework are covered in the feedback section of the literature review in Chapter 2.

The components of the analytical model shown in Figure 5 below are explained in the section that follows. The nature of written supervisor feedback on student drafts has been categorised as a continuum ranging from *Big Picture Feedback* to *Surface-level Feedback* with a *Mixed/combination Feedback* response found between the two feedback extremes (*Big Picture* and *Surface-level Feedback*). These aspects are contained in either in-text margin comments (predominantly surface-level feedback) or overall comments (predominantly big picture feedback).

At one end of the feedback continuum shown in Figure 5 below, *Big Picture Feedback* is characterized as focusing on the structure, cohesion, coherence and clarity of the research writing (Brown 1994; Bean 2001). Emphasis is also placed on argument (Kamler and Thomson, 2006). Six approaches or strategies for providing big picture feedback are shown in Figure 5: viz. text-specific feedback (Ferris, 1997); feedback on structure, cohesion and coherence (Bean, 2001; Brown, 1994); feedback on areas of competence and 'uncompetence' (Race, 1998); feedback on chunks of writing (Kamler and Thomson, 2006b); feedback on the moves contained in the argument (Kamler and Thomson, 2006b); and feedback focusing on concepts, critique and analysis (Wisker, 2005).

By contrast, *Surface-level Feedback* lies at the other end of the feedback continuum. This type of feedback is characterised by a focus on smaller more superficial issues such as grammar, cohesion, spelling, layout and common errors at the sentence level (Bates et al, 1993; Brown 1994). Since supervisors often focus on this type of feedback including the numerous errors students make, as a result, feedback regarding ideas and overall structure is scanty (Bean 2001).

Between the two feedback extremes lies *Mixed Feedback* which combines aspects of *Big Picture Feedback* and more *Surface-level Feedback*. So with this form of feedback, attention is paid to coherence and linkages and also to paragraphs and sentence structure. There may also be some editing.

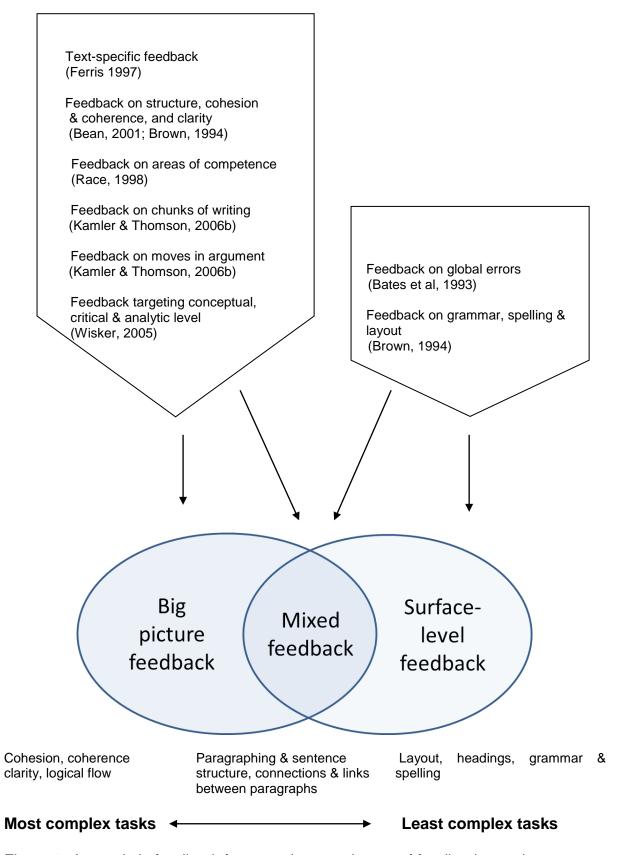


Figure 5: An analytic feedback framework: a continuum of feedback practice

3.3.3 Analysing the Co-supervision Data

In order to evaluate the new Writing-Centred Co-supervision Model in which the researcher is the writing co-supervisor, multiple data sources were utilised. Cosupervisors and postgraduate students who had requested to become part of the model were interviewed. The interview data was subjected to thematic content analysis as explained above in order to distinguish themes emerging from the interviews. In addition several postgraduate students offered their own unstructured reflections on their experience of the model and the efficacy (or not!) of the new cosupervision model. Emails between me (as the researcher in the writing cosupervision role) and content co-supervisors were also recorded, as well as field notes and observations on the challenges/successes pertaining to the co-supervision model. The researcher is considered to be what McMillan and Schumacher (1993) term a 'participant-observer' in that I already had a role in the study site i.e. that of the writing co-supervisor. A discussion of concerns relating to the researcher's position is raised later in this chapter when discussing the researcher's subjectivity. Issues of power surfaced when reflecting on the working of the Writing-Centred Supervision Model. Clifford et al., (2009, 242) take the Foucauldian view that power is diffuse and "that it is reproduced in indirect and often erratic ways through multiple mediatory networks". These issues are taken up further in Section 3.5 below where researcher subjectivity is discussed and later in Chapter 6.

3.4 Reliability and Validity

It was important in this research to consider constraints on qualitative reliability. In qualitative research, reliability refers to the consistency of the researcher's interactive style, data recording, data analysis and interpretation of participant meaning from the data (McMillan and Schumacher, 1993). Ensuring reliability is thus immensely difficult. Reliability in research design may be limited by the fact that the researcher is a participant in the processes and interactions under analysis. Thus I made a conscious attempt to identify researcher bias in making sense of the data obtained from interviews. Reliability is addressed by a combination of the following strategies: verbatim accounts of conversations, transcripts and direct quotes from documents, taped data, participant records, participant review and the

use of negative cases (data that are an exception to patterns found in the data). Conversations with supervisor and student participants were recorded as field notes. I transcribed the taped interviews and checked their accuracy several times each. Photocopies of the student drafts containing written feedback from supervisors were made and the originals were returned to the students. Prevalence or data salience has been addressed in some instances, as suggested by Guest et al., (2012), by indicating frequency either as percentages or 'general descriptors' (e.g. all, a few).

Research is considered to be valid if it accords with the actual state of the world (Mc Burney, 1998). This aspect of research is also considered to be a challenge. One type of research validity is construct validity. In this research 'multiple sources of evidence' were employed in that analysis of interviews with participants (supervisors and their students), documents (drafts of postgraduate student writing, student reflections, emails and field notes) were undertaken. In addition participants were, in certain instances when clarity was needed, asked to review the transcript of their interview. Face validity is addressed by the use of quotes to assist with the formulation of important and dominant themes and ideas.

One of the possible threats to external validity or more specifically ecological external validity is the Hawthorne Effect. The Hawthorne Effect is the tendency for people to act differently because they realise they are subjects in a research study (McMillan and Schumacher, 1993). Ecological external validity, in contrast to population external validity, refers to "the conditions of the research and the extent to which generalising the results is limited to similar conditions" (McMillan and Schumacher, 1993, 179). The research design incorporates open-ended interviews with the participants. Personal interviews have the advantage that rapport can be established between the interviewer and the person being interviewed; however respondents may tell interviewers what they think they want to hear. These changes in participants' behaviour are called subject effects, and they may be initiated by the participants themselves in response to the study (McBurney, 1998). Thus the potential for interviewer/subject effects is there and care has been taken in this research to identify if such effects occurred. The validity of the interview process was checked by offering the respondents the opportunity to read through the written transcripts of their interviews.

3.5 Researcher Subjectivity

The interactions of the researcher with those being studied are components of the research process. "Researchers reflections on their actions and observations in the field, their impressions, irritations, feelings and so on, become data in their own right, forming part of the interpretation" (Flick,1998,6). In this research the researcher took on the role of what is termed 'observer as participant'. In this instance the researcher is "a known, overt observer from the beginning, who has a limited or formal contact" with the participants (Neuman, 1994, 346). The last analysis chapter (Chapter 6) deals with the Writing–centred Co-supervision Model in which the researcher is a participant.

My position as a reflective and participant researcher, as one who as a co-supervisor is part of the practice to be investigated, requires me to consider whether my findings could be prejudiced by this position. One of the important factors that decides one's research methodology is 'where the researcher is coming from' (Opie 2004, 18). This relates to both ontological and epistemological assumptions. These assumptions and the philosophical positions that researchers have, result in choices related to their research practice (Opie 2004). I hold a social constructivist view in that my research data is made up of how my participants and I (particularly as participant researcher in the case of the Writing-centred Co-supervision Model) perceive postgraduate supervision and postgraduate writing issues. Consequently I went to some lengths to ensure that interview drafts and my subsequent findings were conveyed to the participants for comment. In one instance a supervisor asked for a comment to be deleted from the transcript as he had changed his mind. I was able to compare what supervisors and students said about feedback practices with what actually took place by analysing written comments on students' drafts. From an epistemological point of view I have focused on the responses of the participants as being honest and reflecting their experiences at the time. I consider Cousin's (2005) last strategy - that of taking a postmodern stance and claiming the report to be my story- to be somewhat of a stretch as the data attempts to reflect the voices of the participants and only the analysis can be claimed as my own.

A further issue to be considered in my methodology is that of the construction of power. Opie (2004) points out the relationship between agency and social power in that this relationship may be influenced by the social setting of the research participants. In the context of this research, there are power differentials in two of the relationships which are under consideration: the relationship between supervisors and their postgraduate research student; and the relationship between content supervisors and myself as writing co-supervisor. These are discussed in Chapter 6 and acknowledged as possibly limiting the conclusions drawn from the research

It was also important to receive critique, comment and feedback on my research, three conference papers have been presented at three Stellenbosch International Postgraduate Supervision Conferences held in 2010, 2011 and 2013. These three presentations reflected my interest in the three research questions outlined at the beginning of this chapter. The first paper in 2010 was entitled 'Helping Postgraduate Students Write in a Disciplinary Context: a South African Co-supervision Model'. This paper reflects some of the finding of my research question which investigates the nature of the writing-centred co-supervision model and its implications for supervision. The second conference paper in 2011 'The Challenge of Postgraduate writing: Difficulties perceived by Supervisors and Postgraduate Students' links to a second research question - the nature of writing supervision for postgraduate students including the writing issues raised by supervisors and postgraduate students and the strategies used by supervisors and students to enhance research writing. The third conference presentation in 2013 'Giving Effective Feedback to Postgraduate students: Perspectives and Challenges' investigated the third research question i.e. the nature of written feedback given to postgraduate students by their supervisors and issues raised in relation to the feedback. In addition several presentations were made to weekend research symposia (organised by the Faculty and attended by staff and postgraduate students) where feedback and discussion on my work was offered. Additional feedback was received from colleagues on a university writing retreat at which the focus fell on my discussion chapter on feedback and also later from a colleague in my discipline. As a result of this feedback, structural changes were made to the feedback chapter.

3.6 Ethical Considerations and Consent

Students and staff are involved in a supervision process where both parties can be considered vulnerable. Efforts have been made to safeguard the privacy of the supervision process so that personal issues remained anonymous and the wishes of the participants are respected. All names have been coded and thus omitted from the research discussion. In view of this, ethical considerations have constrained explicit discussion regarding power disjunctures in the discussion chapters. All participants were invited to participate and to review their contributions. Changes were made where requested. Participants were able to leave the research process at any time. It was indicated from the outset that negative personal issues would not be taken up by the researcher and students were asked to use existing and alternative channels to communicate these if needed. Letters of permission are to be found in Appendix B. Consent for the research to be undertaken was granted in the first instance by the Head of Department. Ethics clearance has been awarded by the Wits School of Education: Protocol No 2008ECE12.

3.7 Conclusion

This chapter has outlined the research design and the nature of the analytic frameworks used to process the data. The next three chapters focus on analysing the data and addressing the research questions. Chapter 4 examines the writing issues and writing strategies raised by supervisors and students to enhance postgraduate research writing. Chapter 5 focuses on the nature of written feedback given to postgraduate students by their supervisors. Chapter 6 explores the nature of a new co-supervision model – the Writing-centred Co-supervision Model and its implications for the development of postgraduate writing.

Chapter 4: Writing Issues and Strategies to enhance

Research Writing used by Supervisors and Students

4.1 Introduction

That is what makes what you are trying to do incredibly difficult – assessing what each student's needs are! They are going to be completely different and they might also be different at different stages of the project. From the proposal onwards, those needs are going to shift all the time (Supervisor F).

The quote above reflects the dynamic nature of supervision practice. I argue that students have different needs which may change as the research endeavor moves forward. Students' writing is situated within a context. This context is tempered and moderated in many ways, by the situation within which the student finds himself/herself e.g. the discipline within which the student researches, the particular writing conventions of the discipline and the relationship between the supervisor and the student. Thus the acquisition of a (writing) identity consists of changes over time and context and depends on similarities between institutional practices and the individual's multiple identities.

There is increasing recognition that research writing remains significantly undertheorised within research degree programmes in universities (Aitchison and Lee, 2006). Although **globally** there has recently been research focused on the dynamics of research writing and supervision (Caffarella and Barnett, 2000; Kumar and Stracke, 2007; Aitchison and Lee, 2010; Starke-Meyerring, 2011; Paré et al., 2011; McCallin and Nayar, 2012; Maher et al., 2014; Lee and Murray, 2015, **locally** there has been very little attention to this aspect. I see writing as mediated not only by the context of the research writer but also "by the social, cultural and political climate within which the thesis is produced" (Clark and Ivanic, 1997, 11). This concurs with the idea held by Lee (1998, 127) who sees writers located in communities within which "they must construct and position themselves as legitimate

knowers and text producers". Thus in this case study the writing issues and research writing strategies of a particular set of supervisors and their postgraduate students shed light on the challenges in this area of academic work.

This chapter investigates the perceptions of supervisors and students with regard to the difficulties and issues of academic writing and the strategies used by supervisors and their students to address these writing issues. The data for this chapter is derived from open-ended interviews conducted with eleven supervisors and eleven of their Masters and doctoral students. The interview data was organised into themes established from content analysis.

It is internationally recognised that supervisors find problems in getting their students to write well, and raise questions relating to argument, simplicity of prose and logic (Kamler and Thomson, 2006b). In this study **both supervisors and students** indicated a number of **issues** that they see as problematic in postgraduate research writing:

- the research writing process;
- positioning (argument/voice/audience);
- paragraphing, grammar and referencing;
- reliance on the supervisor and feedback;
- writing style;
- coherence and the relationship between thinking and writing;
- time management.

These findings concur largely with those of a study of Asian Masters students where writing difficulties such as plagiarism, the nature of academic writing, synthesising ideas, voice, coherence, and the relationship of theory to practice were identified by students (Phakiti and Li, 2011).

Supervisors suggested a number of **strategies** to assist their students with their writing:

- assisting with ideas and key readings;
- supplying models of academic writing;

- writing immediately;
- suggestions for positioning -structure, voice and style;
- creating time plans;
- seeking outside assistance (writing workshops, using a writing centre, and reading how-to guides);
- using a research notebook.

However **students' strategies** for writing were less focused on the macro issues of structure and positioning and showed a wider range of smaller but useful possibilities:

- using a community of practice;
- using blogging;
- writing repeated drafts;
- working on small sections;
- using mind-maps to plan sections;
- working in spaces not usually used (e.g. library);
- working on other writing.

There were some **shared strategies** suggested by **both postgraduate students and supervisor**s in promoting their writing:

- taking advice on ideas;
- finding key readings and models of research writing;
- writing as soon as possible;
- creating deadlines
- seeking outside assistance (how-to guides, and editors);
- the use of a research notebook.

Despite the fact that supervisors identify particular writing issues and strategies, their students do not always reflect similar concerns and strategies. Probing interviews with supervisors reveal that they do have concerns regarding their students writing and they do have strategies to address some of their concerns. However, it is clear that the strategies to address these are not always made explicit when supervisors

work with students. The perceptions of these writing issues and the strategies to assist the development of research writing are the focus of the next section.

4.2 Writing Issues and Strategies to enhance Research Writing

This section discusses the writing issues identified by supervisors and students and the strategies they perceive to be useful in addressing these writing issues. The analysis and discussion will revolve around six main issues identified by supervisors and students: the relationship between writing and thinking; the research writing process; positioning; paragraphing, grammar and referencing; and writing style. The issues relating to feedback will be discussed later in Chapter 5. In Table 7 below the numbers of supervisors and their students raising issues and suggesting strategies to resolve these issues are listed.

Table 7: Comparison of supervisor and student academic writing issues and strategies

Writing Issues	Number of supervisors raising issue	Number of PG students raising issue	Number of supervisors providing strategies	Number of students providing strategies
The relationship between writing and thinking	5	2	2	3
Research writing process	8	9	8	8
Positioning(argument/voice/audience)	7	7	6	3
Paragraphing, grammar, and referencing	7	2	4	0
Writing style	5	1	3	0
Reliance on supervisor and feedback	5	5	1	6
Time management	2	2	1	2

4.2.1 The relationship between thinking and writing

The first problem raised by both supervisors and students is the inability of postgraduate research writers to convert thoughts to words and ultimately to text. There are a number of different viewpoints with regard to the relationship between thinking and writing. The first of these is what Torrance et al., (1994) call *think then write* in that thinking takes place *before* writing. Badenhorst (2007) points out that the first stage of writing (pre-writing, noting and collecting information, reading etc.) includes pre-thinking. She argues that there are three stages in the writing process: pre-writing (playing with ideas), writing freely (first draft) and revising (reworking drafts). However thinking is never 'done' despite the best attempts of writers to plan and map out what they intend to say in their writing.

The second position is that of *thinking while you write* (Torrance et al., 1994) where writing enables thinking. "We write to work out what we think. It's not that we do the research and then we know. It's that we write our way to understanding through analysis. We put words on the page, try them out, see how they look and sound, and in the writing we see things we had no idea were there before we started writing" (Kamler and Thomson, 2006b, 4). Kamler and Thomson (2006b) fail to acknowledge overtly that there needs to be some pre-thinking even before writing 'to work out what we think' but nevertheless do point out that there are a number of actions such as reading, journalling, summarising and making notes that are part of researching and writing. These actions, I would argue, add to the thinking process. Badenhorst (2007, 86) suggests that "we write not because we know but to see what we know". This view of thinking and writing can best be shown by Figure 6 below.

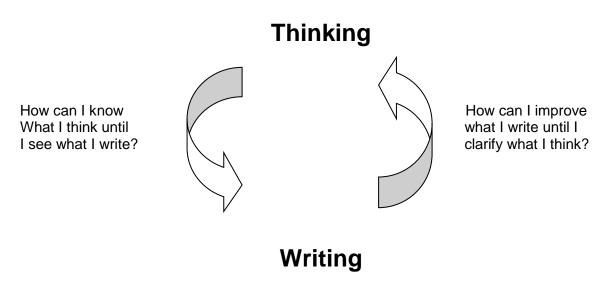


Figure 6: The reciprocal relationship of writing and thinking (After Huff, 1999, 7)

A third position combines the first two viewpoints on the connection between thinking and writing. Some thinking may take place before writing commences but this thinking continues and changes as writing takes place. *Meaning in written texts is always meaning in the making* (Lillis, 2001, 170). This process can be described as *thinking-writing-thinking*.

Writing cannot be considered to be a linear process. In the research process there is always continual movement with multiple drafts, revising and feedback. The relationship between writing and thinking is interdependent and reciprocal. My position is that there is a reflexive relationship between thinking and writing and that whilst some thinking is needed prior to even the first write, ideas really only develop once writing begins. So I view writing as a process which generates thinking.

The majority of supervisors and students make insufficient or little mention of the tricky but important relationship between thinking and writing. Only four of the eleven supervisors indicate this to be of concern and only two students commented on thinking as important for writing. Two of the supervisors (Supervisors L and J)

recognise that there is a link between thinking and writing clarity and had the following to say:

I would say that's not necessarily the writing per se. It's more cognitive thinking around the writing (Supervisor L).

So Supervisor L and Supervisor J both indicate that they see a link between thinking and writing.

The biggest problem I think is just clarity of thinking and the logic of one idea following another - a coherent structure - some kind of logical structure. A lot of students have a problem with this I find even the students that write well very often don't seem to think well and have trouble translating their thoughts into words. It's mainly that they don't think clearly so the writing is not clear because the thinking is not clear. This leads to difficulties in their writing and this is what we need to unpack (Supervisor J).

It is more a question of organising, putting their ideas into the right place or even helping them clarify their ideas. Very often you can see right away that they don't get it and you need to help them to think in the right direction (Supervisor J).

It's not the writing itself, it's the thinking about what to write. There is a lot of intellectual laziness among the students, even up to PhD where they don't want to think about the issues (Supervisor J).

One of the issues raised is the connectivity within a piece of research writing relating to how thinking influences writing.

There some students that write really well and there I just have to ask them to be crisper and cleaner in a way. But the general majority of the students struggle. Most students I don't believe get the connection between what a methodology is, what a literature review is, what a set of results is and how that all gets wrapped up into a thesis. I would say in most of my students they see things in boxes. It's like in silos and then at the end usually the examiners

pick up the same tension. They say "Your methodology is weak, It doesn't show what you are trying to do with your methods. Where did you, a) first of all, get your ideas from, and how did you then use that to actually go out there in the field "So I would say that's not necessarily the writing per se. It's more cognitive thinking around the writing (Supervisor L).

Supervisor J spells out what he perceives to be the problem students have in writing coherently. He believes that coherence is related to logic and structure and hence to argument. ("one idea following another...some kind of logical structure"). He goes on to suggest that this inability to write clearly is "intellectual laziness" and a reluctance to engage with the thinking part of research writing. He indicates that the role of the supervisor in this instance is to "help them clarify their ideas". Neither of these two supervisors comment on the thinking-writing positions mentioned earlier.

A third supervisor, Supervisor F, agrees that for some students the root of the writing problem lies in the difficulty of transferring thinking into academic writing. She believes that thinking should connect to the formulation of an argument. Her solution to this is to encourage a strategy of early writing as opposed to the notion of 'writing up' on the completion of the data collection. So for this supervisor the process of gaining clarity is one of 'thinking while you write'. This resonates with the findings of Torrance et al. (1994) as one strategy perceived as useful by postgraduate writers. For Kamler and Thomson (2006b, 4), however, the writing-thinking process is a little more nuanced: "We write **to work out** what we think".

It's an inability to transfer the thinking into a piece of writing that is easily communicated. Obviously throughout the process they have got to be writing - I get them to write immediately. And I say to them that I don't want them to come to me with their early ideas about how they are going to research the they must write it down in an email or in a document. Even if it's one paragraph, I get them to write immediately because it's almost by virtue of writing it that it forces them to think through the issue clearly in their own head. By putting it down on paper they are committing themselves to an idea (Supervisor F).

Supervisor F also comments on the locus of control as being important for the postgraduate writer so students are encouraged, through their writing, to take on the responsibility for the research writing process. Supervisor F indicates clearly in the quotes above that she sees writing is thinking when she ensures that her research students write down their thoughts from the outset. A further strategy that this supervisor suggests is useful, is for students to write down their thoughts **before** meeting with their supervisor in order to communicate their ideas and to gain clarity in their thinking. She uses a table as an initial strategy to initiate student thinking and organisation of ideas.

An example of such a table is:

Research	Data that	will	Method of
question	answer	the	data collection
	question		

She says:

The table has been a real breakthrough for me because if the student can clearly say to me in the table what it is they are wanting to do in terms of their questions, their data, their methods etc. Then if later on in the proposal I get poor weak writing I can then see that this is a writing problem not a conceptual one, but one of expression (Supervisor F).

This table also functions to allow the student to see the links within the research methodology i.e. between the research questions, the data that will emerge and how it will be collected. However the table fails to include the method of data analysis - a logical progression from the thinking around the method of data collection and that which links back to the research question.

In one of the few matches of strategy between supervisors and students, a slightly different planning/thinking tool is used namely a mind map. The use of mind maps is suggested by Supervisor G as a way of getting into the writing and this has been taken on by his student (Student G5). A mind map is a graphical diagram used to represent ideas and concepts. It is a visual non-linear thinking tool that allows ideas to be generated, visualised, structured and classified. A mind map is likely to structure information in a similar way to how the brain actually works. "It engages the

brain in much richer way, helping in all its cognitive functions" а (http://litemind.com/what-ismind-mapping/). So mind maps encourage brainstorming approach to planning and organising thinking and hence writing. However since mindmaps are organizational tools, they fail to assist with the structuring of arguments.

My supervisor suggested mind mapping, just to put everything out in front of you, to create like a visual picture of your pathway, what you wanted to write about. I like mind mapping, just putting all my ideas on paper and then from there I can sort of get a sense of what I want to do first and then how I'm going to proceed to achieve the various things I want to write. So its like a big road map basically. When I was writing chapters I would do my map for every chapter and that would form part of the bigger mind map, like the whole thesis or the whole picture (Student G5).

A fourth supervisor, Supervisor D, sees the recursive nature of the research writing process as thinking followed by writing which, at the same time, creates more thinking. The thinking-writing-thinking process of this supervisor concurs with the third position of *thinking-writing-thinking*. The use of outlines - a list or plan of the writing - as a way into thinking and writing is used as a strategy by this supervisor.

Well you know writing follows so much from clarity in your mind, and when they are not actually so clear then they throw in everything and some of this detail is totally irrelevant. This is why I want them to do an outline, so there can be a point outline that gets everything (but they don't usually...) because you do create when you write. We all find that and you see connections that you haven't seen before. Writing is thinking also, I mean you think before, but it also brings in ideas (Supervisor D).

Moving from thinking to writing was mentioned by one student as difficult, however this was not an issue raised by the majority of the students.

I've realised from my writing that if you don't think about writing, then usually the things that you come up with usually don't make that much sense. When you actually have them on paper, and you haven't thought about what you have written and you kind of try to match and flow your ideas, sometimes they don't make much sense (Student L2).

However if students are unable to think clearly then the writing is disjointed and lacks coherence, as all parts of an idea need to contribute to the main idea. Dunlap (1990) suggests that thinking structures and patterns are of greater importance than correct grammar and points out that writing gains clarity as students are able to work with their ideas. So the notion that writing is a recursive process is fundamental. The more drafts students write the clearer their thinking (and writing) becomes.

4.2.2 Issues concerning the research writing process

The second issue raised by **both students and supervisors** is the research writing process. This section engages with seven areas in the research writing process which were raised by supervisors and/or their students:

- setting up the research,
- reading and identifying key texts,
- models/exemplars of good writing,
- assistance with the literature review,
- the proposal stage and research questions,
- regular writing and 'writing up',
- outside assistance with writing.

Problems of writing are seen either as "individualized deficit and trauma (the problem) or of clinical technical intervention (the solution)" (Aitchison and Lee, 2006, 266). The literature about supervision alludes to the difficulties supervisors have in assisting students with language (Delamont et al., 1997). The clinical technical intervention view held by some academics of the basic research skills and competencies for beginning researchers flies in the face of my view of writing as social practice. Writing is **not** a set of skills to be absorbed by the student research writer, rather writing is about creating meaning and ideas in a particular milieu.

The research writing process is at the core of good research. Understandably, in view of their role, supervisors see advice on how to structure students' writing as critical. Consequently there should be a focus on strategies for improving the nature of their students' research writing.

Setting up the research: discussion with students

Some supervisors believe that before the writing actually begins, supervisors should talk students through the research process. The first step in a discussion with the student may centre on how the structure of the research can be set out. The second discussion focuses not only on the structure of the research (usually starting with a discussion of the proposal) but moves into more detail regarding the nature and process of their research.

Talk to them. Talk it through. Say to them this is a flow. This is what chapter one will be, this is an introduction so you just write it at the end. Chapter two's the big one: the literature review. This is where you set the context, the scene for the whole thing. Do you understand that this is the field you are making a contribution in? And then we move from there (Supervisor H).

Other things are more academic: like are they are on the right track, have they shaped their proposal correctly, do they know what their research question is, the hypothesis, how they are going to go about their methodological research. In other words are they doing too much for a PhD or Masters, too little? So for the first steps I would say it's getting them on the right track or the right road. Then the most important thing is just to keep their enthusiasm going and they have that open relationship with me and come as often as possible (Supervisor L).

Supervisor F agrees that many students need assistance with arriving at a doable topic with an appropriate scope. The supervisors in this study are able to decide whether they wish to follow the traditional Humanities approach of requiring students

to come up with their own research topics or whether the student is offered a piece of an ongoing group research endeavor. This supervisor follows the first option:

I think firstly even just thinking about a topic is something that students really struggle with. And then it's getting the project doable in size. These are the most critical things, - once you've got these down pat, then it's much easier. I am of the school of thought that I don't package projects and give them to students. I think, having a rationale for why you want, that is part of the task of being a researcher - of thinking up your problem - of having a rationale for why you want to look at that particular issue, and you being passionate about it as the researcher (Supervisor F).

Reading and identifying key texts

Reading is an important part of the research process. Key readings have relevance for thesis writing: firstly key readings supply models of good writing and referencing for postgraduate students; and secondly, the texts form part of what is required for the students' literature review chapter. Whilst there may be a number of ways to incorporate reading into the writing process suggested in the literature, these strategies are not made explicit by supervisors, nor are the students advised to track these in the many how-to texts currently available. A useful example of an approach to reading suggested by Badenhorst, (2008,159) is a 'slow and steady approach' which begins with a key article or book and tracks further relevant readings from each text and the 'blitz approach' where a set time is put aside to search databases for a global take of what is available, followed by skim reading and sorting. In interviews with the participants, reading strategies such as the ones mentioned above, are not mentioned by either supervisors or their students. Figure 7 below shows a number of reading strategies taken from Badenhorst (2008) which could be encouraged by supervisors to assist students.



Figure 7: Reading strategies (after Badenhorst, 2008, 158)

Only three supervisors commented on the importance of getting the reading right by finding key texts. These supervisors reflect that they see it as their role to advise students on critical readings, the one supervisor even going so far as to supply them. However it appears that the majority of supervisors in this study do *not* consider this to be an important strategy and by implication do not advise on or supply readings to their postgraduate students. This flies in the face of the assumption made by Kamler and Thomson (2006b, 28) when discussing the boundaries of relevant literature-"Supervisors, of course, make these issues clear in the preliminary readings they give to students".

Supervisors K and A comment on the importance of identifying key texts and the incorporation of these into the thesis. The issue that is raised here is whether this responsibility lies with the supervisor or the student, or whether it is a joint one. Supervisor K considers this to be a joint supervisor – student responsibility while the

second supervisor (A) indicates that it is actually something that he, as supervisor, is prepared to offer the student.

One of the major things in a thesis is that people miss key text. I do think it's the job of the supervisor to advise on this. If a thesis gets handed in and it is missing reference to key text, I think the student is to blame but I think the supervisor is also. I think the supervisor needs to be on top of that field so if the examiner comes back and says you've missed the writings of da..da, and they're fundamental to this thesis, I think that reflects on the quality of the supervision. So I think it's a very important thing to comment on (Supervisor K).

First of all guidance on what to go and read, particularly if a student starts coming up with ideas about some particular aspect of their research, then you tell them 'Have you read this, have you read that? Maybe you should go and look at this particular theoretician's work as it might be of assistance to you' (Supervisor A).

Some evidence suggests that supervisors frequently base their supervisory practice on their own, often unscrutinised, experiences as postgraduates (Trivett et al., 2001). Supervisor G reflects on this commonly-held practice of 'supervising as I was supervised' and has adjusted his role accordingly, offering key readings to his students.

My initial strategy is what I was taught: "go and do the reading, and when you have done that, come back to me". That can take months. So it is useful to have as many of the key readings available to them so that they know what they are looking for (Supervisor G).

Despite no comments to this effect from his supervisor, Student 5 confirms another useful aspect of identifying key readings - ones that showcase good academic writing.

My supervisor always recommended good things for me to read, showed me good practice. Papers that were particularly well written or topical to my research project. We would talk about why they worked (Student G5).

Despite the comments by the two supervisors as to the importance of finding the key readings, they make no suggestions as to how these readings could be utilised in research writing. Some of the strategies for effective reading noted in the literature which could be useful are noted in the list below (adapted from Burke, 2001, 131):

- Identify problems, gaps, ambiguities, conflicts, and /or disparate points of view in the text
- Analyse the text to pose explanations that bridge gaps, clarify ambiguity and resolve textual problems
- Use the content to connect analytical explanations to a 'bigger picture'
- Cite examples, quotes and events to connect to analysis
- Raise questions
- Challenge ideas of authors by noticing bias, distortion or lack of coherence
- Recognise points of view and perspectives

Models/exemplars of good writing for students

Many of the strategies adopted by supervisors revolve around using good research writing as model exemplars for students. These strategies, indicated below, range from looking at previous research, examples of good work completed by the supervisor's previous students - such as model Masters proposals, larger-scale completed theses showing structure and presentation, and the supervisors own research work. Students also mentioned useful articles, considered to be well-written, which are available on the Internet.

I think just giving them examples of cases that work well. So if I have had a student who has come through the system and they have actually done their methodology well, and the examiner has commended them on that, then I normally give that, obviously without the student's name. That's an example of how you should write, or I take an article. So by getting students to see

other documentation.... Also by making them read – not very easy (Supervisor L).

I give people model Masters proposals when they start, and I give people good examples of completed theses at the level at which they are working. So they can 'see' what a Masters/PhD looks like. How it is structured, how it is presented. How it is laid out. Those sorts of things and hopefully that's a learning thing (Supervisor H).

I think my supervisor played a big mentoring role, because initially when I didn't know how to write a chapter, she gave me an example of hers from her PhD to read. So that sort of set me in the right direction (Student G5).

I picked up a lot from material from the internet especially from Science Direct journal articles (Student H11).

One of the strategies used to open up reading in the research process is made explicit by Supervisor F who has examined models of different writing styles. She assists students in unpacking and critiquing journal articles and links this to the tricky question of finding one's voice in research writing. By so doing she is setting up models for good research writing with her students.

I concentrate quite a lot on this in my Honours course, also in supervision, in each week we have a set of readings and one of the things we do is we also discuss the writing style of the readings. Which writing style would you like to emulate? Who has expressed their problem statement really well, research questions, and methodology? Which ones have been well-structured? Where have you got a clear argument? Which one is more messy? So we actually critique the writing of the article and I find that this is quite a useful way of teaching them how to go about writing. And I say "The ones that work for you, those are the ones you should emulate and copy the style. If it is a pleasure to read, that is the one you have got to hang on to and say OK this is what I am going to try and do! Use some of the techniques that this person has used". Then we try and identify what those techniques were. So we do

that and try to pick out better writing. Also in choosing my readings I also try and get a range of different styles from different sorts of journals – from stiff journals to much more loose journals and the range in between (Supervisor F).

This strategy is considered to be useful and is commented on by Supervisor F's postgraduate student. This is one of the few instances where there is a match of writing strategy between supervisor and student.

I think reading other people's theses, sort of looking at what was expected...I was just looking at the same sort of themes and ideas of the work I was interested in at the Cullen Library - looking at different writing. It gave a sense of structure, how you would...what each chapter would represent, your literature review, your methodology, your discussion, your conclusion, all different aspects of what you had to write about or what to constitute your writing. And also in terms of style and how people wrote, just see the differences (Student G5).

Assistance with the literature review

Mapping out the perspectives and debates put forward by key individuals is one strategy for novice researchers to undertake when setting up a literature review. These strategies may take the form of visual maps. These maps of the field of knowledge may be: feature maps which show relationships between studies; tree constructions which show topics and sub-themes; or content maps showing hierarchies (Hart ,1998 & 2001 in Kamler and Thomson, 2006b). These mapping tools are different from process maps which are sometimes suggested by supervisors as mentioned earlier in this chapter. However no work of this nature is undertaken by any of the supervisors or their students.

In addition to some attention given to strategies for reading and key texts by supervisors, issues around a good literature review are singled out for attention by both supervisors and students.

Most students in the last three years have a distinct lack of understanding of what a literature survey is. I see this in all levels, Honours, masters and PhD. My understanding was that you effectively engage with as much of the literature as you possibly can, in the time that has been given to you. Currently the students' view is that you engage with 3 or 4 journal articles, 17 or 18 unpublished web pages and then you conclude that you have a 2-3 page literature review which is sufficient (Supervisor G).

I always give them outlines of what is expected in a literature review- how to structure it. I often give the analogy of it being a funnel where it needs to funnel down from the greater to the smaller focus (Supervisor E)

The literature review is usually the start of the research journey for an individual embarking on postgraduate research. At this stage in the process the new research writer is still unsure of his/her position in the field of knowledge, yet the writer is required to assert a position in relation to the literature. So there are challenges of power and identity at this stage of the research journey. In addition, literature work is often construed (especially by the novice) as a once-off piece of writing, completed prior to the research process.

Student L2 sees the literature review as on-going, in line with the notion that the literature review needs to be revised and added to.

My literature review was difficult. I worked on it for a long time. Since the proposal, I think I have made a lot more changes on the literature review than the introduction part of my dissertation. I worked a lot on it (Student L2).

Supervisor K is in agreement that the literature review is a good starting point for the research process but he indicates that he leaves students to draft the literature chapter without much guidance. Given the tenuous identity position of the new writer this lack of engagement is unusual.

What I generally ask is to do a literature review pretty much on their own for their topic before they start working on their project. I think that's useful. (Supervisor K).

There is, however, no indication from any students and their supervisors (with one exception - Supervisor B) of how the literature might be used in the discussion/analysis sections of their research. Relating to this, concern was expressed by this one supervisor (Supervisor B) with regard to the embedding of a theoretical framework in the research, and the links between this and the literature review.

It's a lot of insecurity about how to approach the research. The biggest problem seems to be around getting a theoretical bit into their work, for some reason they seem to struggle with that the most. They happily go out they do the research, they do the background stuff, they provide lots of information but then it's the structure and teasing out what is the theoretical approach. (Supervisor B).

A further omission in the range of issues and strategies suggested by supervisors and their students is the notion of critical thinking in relation to the literature review. This may be particularly difficult for students with English as an additional language as it may not be part of their previous educational experience or possibly their culture (Paltridge and Starfield, 2007). Some supervisors have difficulty when faced with the writing of students with English as an additional language, particularly if the problem is cast as one of student deficit. The pressure to 'process' postgraduate students means that "the language of the thesis presents a very real dilemma both practically and ethically" (Strauss et al. 2003, 4). Strauss et al. (2003) point out that many language issues are shared by first-language speakers of English and students with English as an additional language.

My biggest challenge is with students for whom English is not their home language and their English is very poor. They just struggle tremendously with their English. In that case you see the first draft and just every sentence doesn't make sense. You literally have to rework every single sentence (Supervisor C).

Proposal stage & Research questions

The majority of supervisors in this study believe that research writing actually begins at the proposal stage. If the research design is good- if the research questions, data and data analysis are aligned at the outset (each with distinct chapters allocated to them) then thesis writing is much easier. Cadman, (2002, 101) describes the proposal as a gatekeeping tool, and a contested site of "struggle between knowledge and power". Several supervisors perceive there to be issues around formulating research questions and structuring the research proposal. The issue of constructing a good literature review is also raised.

Overall I would say the main issue or assistance that a student requires is help with structuring their research questions and structuring their research proposal primarily the literature review. In terms of the overall proposal I usually advise them to read a couple of books, I ask them to produce an outline of the proposal and then fill it in so it forces them to have their various headings and sub-headings pre-aligned with the structure (Supervisor E).

Supervisor K places emphasis on the research questions and the research proposal.

When they first arrive they will need a lot of help in formulating their research question. Once that research question is formulated I think the proposal is reasonably easy (Supervisor K)

Supervisor K considers that the research proposal is where students may have difficulties in the research process.

The process of writing the research proposal - I always spent a lot of time on that phase so I think it's the most important phase. If you get the proposal right and the research questions right...? The proposal is where they nail down the method. So the questions are the key, because if the questions are wrong nothing will go right (Supervisor K).

One supervisor (Supervisor F) has developed an interesting and unique methodology for developing research questions with her students. This focus takes cognisance of the reflexive nature of research and the need for writing to take place continuously throughout the research process.

The way in which I try and encourage my students to formulate their research questions is that the first research question has a level that is more descriptive. Then in the second question I prefer that to be a higher order question where it is about looking at the relationship between x and y and the consequences for z. So that is more difficult. So even whilst they are doing the fieldwork they can start addressing question no 1 and writing about it. So do you see what I mean? I also like the questions to increase in complexity. So for the third question, particularly when you get to Masters and PhD level, you are wanting them to engage with what this means in terms of theory and areas of knowledge. So that's a more abstract type of question. It's a framework for the questions. So when they are writing, when they are doing fieldwork, they can address Q 1 early on in the process. Often what happens in Q1 can have implication for Q 2 and 3. (Supervisor F).

Although on the surface this supervisor is reflecting on her modus operandi for developing research questions, she is actually hinting at a deeper insight into the very nature of the research project. The increasing complexity of the second question- 'the relationship between x and y and the consequences for z" and the focus of the third question on the theoretical aspect of the research is pivotal. This approach appears to be unique; however it may have its disadvantages. Students may engage early on with their fieldwork and since they have not engaged with the third conceptual question more fully, may find the lack of theoretical engagement to be a limitation later in the research journey. Whilst she does not raise this aspect, the supervisor does comment on the reflexive influence of the questions on the others.

The same supervisor believes strongly in the use of research process tables as a tool for unpacking the research process with students. This supervisor again

highlights the issue of whether the student has conceptual clarity or whether there are writing issues to be addressed.

Once we have got the questions then we move on to a table that we have been working with to say what data, what methods, what literature? I find that that table is absolutely critical for throughout the research process. The table has got a set of 2-3 research questions, then we have what data you need to answer those questions, method you need to address those questions, and then the literature that is important and pertains to those questions. There is a lot of confusion between what data is and what methods are, no matter how many times you explain. And that is why that table is so important. It gets the students to differentiate between them! It is part of the planning stage and what is important at the planning stage is to try to get them to be as specific as possible (Supervisor F).

By doing the table first before getting into the hardcore writing of a proper proposal helps one to differentiate between whether or not the student is struggling conceptually or in terms of writing. Because there is not a lot of sentence writing and paragraph construction in the table (Supervisor F).

Here the supervisor is concerned to distinguish between a student who may need writing development or whether the student hasn't 'got it' in terms of the content. This approach may shed some light on this issue but writing about a thought/idea often leads to greater understanding and hence clarity. So it may prove to be a little early to make this judgment. Supervisor F continues and explains that there is a hierarchy in the research process

Initially it is about getting the big idea for the research and then from there we keep on working at downscaling and getting tighter and tighter writing. But I work with students who have virtually no writing skills and students who have exceptional writing skills. I have to say that I do tend to focus a lot on the writing when a student doesn't have that skill and perhaps it takes away a bit from my supervision of the overall project and the objectives because you are spending so much time on the literature review and getting that right, so much

time on phrasing the research questions that it does delay the process and each one has to be a redraft in a written format. Once we have got the questions then we move on to that table that we have been working with to say what data, what methods, what literature? I find that that table is absolutely critical for throughout the research process (Supervisor F).

There are a number of useful research writing practices that deserve greater attention from both supervisors and their postgraduate writers. It is apparent that very little writing related work (other than the thesis itself) is undertaken by supervisors with their postgraduate students. By this I mean 'other' forms of writing which might inform the research, for example, mapping debates for the literature or short pieces on the contribution to knowledge – what are termed 'pedagogical text work strategies (Kamler and Thomson, 2006b, 58). This reinforces the notion that research writing is seen as a lesser part of the research process where the emphasis is laid on data collection and content.

It is often assumed that postgraduate students know how to write. Some supervisors in this study make the assumptions that students who have completed their earlier degrees within the institution **have** the required writing skills. This assumption is worrisome and needs to be challenged as it may preclude supervisors from addressing gaps in the writing repertoire of some of their postgraduate students.

Then with the write-up, again if it's our own students they've usually got the skills to write-up, the know-how to reference, they know how to structure a chapter from their undergraduate degree and their Honours (Supervisor K).

When Supervisor F is reflecting on her attention to writing she focuses solely on the actual research text. No other form of writing is suggested as a means to develop her students' writing.

Writing is a big thing for me mainly because I get really irritated by bad writing. I have to say I do tend to focus a lot on the writing when a student doesn't have that skill, and perhaps it takes away a bit from my supervision of the overall project and the objectives, because you are

spending so much time on the literature review and getting that right- so much time on phrasing the research questions- that it does delay the process of the research (Supervisor F).

Regular writing and writing up

Regular writing facilitates understanding and is an essential means of conceptual clarification. Whilst in the process of gathering data, this research shows that students seldom write down their insights and these moments of clarity relating to their findings often appear to 'get lost' in later writing. There is a tendency in some disciplines to delay any form of writing until the data collection is completed. Supervisors do not all follow a research writing process where chapters are seen individually at first (perhaps even reading much smaller pieces of writing- what Kamler and Thomson (2006b) refer to as 'chunking'). One student comments on this aspect and finds that concentration on small sections of work at a time was a useful research writing process.

I think the advantage is that there is not a lot of work to do if you concentrate on one small portion, then you do it better than if you concentrating on everything. You feel like you are in control of the situation. You're doing it step by step and I think it's better than doing it all at once (Student F3).

The notion of 'writing it up' suggests that writing is a linear process and that after fieldwork, comes the textual description phase (McAlpine and Amundsen, 2012). Despite research to the contrary, the notion of 'writing up' is still prevalent in the minds of both supervisors and students.

As for writing up I'm reasonably confident to let them write their draft chapters without a lot of guidance from me based on their field research (Supervisor K).

Commenting on the 'writing up' perception, Paltridge and Starfield (2007, 45) suggest that "this idea leads to students putting off writing until the research is perceived to be *done*". When asked what 'writing up 'meant, one student replied that:

Writing up is taking your data and making it into something that is put into words. I didn't write throughout the Masters. I wrote the proposal, and put the literature together. Then I worked with the data for a couple of months. I had the results **then I started writing**. I didn't really record anything because it was pretty much in my head (Student J6).

Although still subscribing to the notion of 'writing-up', one supervisor recommended the use of a research notebook as a tool for ongoing recoding of thoughts and ideas.

I'm big on notebooks, data notebooks, so every time they do something not only have they got to describe what they are doing but I say to them "Look create a column in which you justify why you did it because later that will help with the writing up" (Supervisor B).

Only one student (unconnected to Supervisor B above) utilized a research notebook for recording ideas and mapping progress in the research.

I didn't really record anything because it was pretty much in my head. Before I met with my supervisor I would write all my questions. I have a little notebook. In the back is what I need to ask and what I need to find out. I also used the notebook in conferences and workshops where people would give me feedback (Student J6).

Interestingly, there were few suggestions for strategies relating to the actual writing process. Gardiner and Kearns (2011) distinguish two forms of writing: 'snack writing' and 'binge writing'. Snack writing involves short, regular writing sessions while binge writing is writing under time pressure in large chunks until the work is done. Student F3 is a 'binge writer' as she indicates that she writes 'under pressure'. Repeated drafting of work assists the research process for her and the repetition allows her to begin to self-edit.

Maybe if I wrote stuff more often then that would help but I don't write much - I only write what I need to write under pressure. I can now sometimes I pick out my own mistakes before you even point them out to me, so I think the repeated drafts are working, they're quite helpful (Student F3).

One student used a creative writing book as a guide to the processes she needed for writing her thesis and shows evidence of 'binge writing'. This student found it very difficult to write and comments that she received little assistance on this from her supervisor.

I always resisted the idea of actually at some point starting to write because it is such a traumatic process, particularly when you have been through the type of critique that you get here at this university with seminars. ... So just getting to a point of starting to write- just saying "OK today i am going to write this chapter". I used ideas from an artist's therapy book. She tells you just to write and not to self-critique because I often do that. I write two paragraphs, rip them to shreds, burst into tears, give up and stop. So I found it very useful not going back over it – just writing. The last chapter I wrote about 20 pages without looking back, so it was very disjointed. And then a friend said to me to just write (rubbish) and then edit it. So not judging your own writing a lot. I write in patches. I do all the reading, write all the notes out, then create a plan of where I think they hang and what themes I want to explore. Then I write for four days, or all evening if I have to be at work. Ja, write, print, edit and write some more. I didn't get any help from my supervisor with this aspect and you get overwhelmed (Student E10).

An important issue, related to research writing, raised by both supervisors and students, is that of time management. Badenhorst (2007, 144) suggests that the problem lies in the way we view time and concludes that time should be spent 'mindfully and not mindlessly'. Supervisor E reflects on the difficulty of managing time and the constraints around managing time.

Trying to work out time. I think this is a big issue. Students not being able to understand the time constraints that they will have in producing work whether they are going out and producing fieldwork or whether it's some more investigative on-campus type study. Regardless they don't ever seem to grasp the timeframes that they require (Supervisor E).

Most supervisors and some students refer to tight deadlines as a useful way of getting the research task done. Student G5 and Supervisor (F) both commented on time management and the efficacy of deadlines. The student, currently completing a doctorate, is aware of the change in status from her Masters research time. She talks about writing 'for herself' which indicates that she is now in control of the time management of her research writing.

I think writing for myself is more difficult because it depends on how disciplined you are to get the output, whereas for Masters I had deadlines and I had to try and meet those deadlines. So there was structure and discipline - self-discipline (Student G5).

The strategy I used with my PhD I impose on my students because it worked for me. Maybe it doesn't work for them. No I think it does work for them, I say "I am giving you 3 weeks in order to write this literature review and I want it back by then regardless of whether it is finished or not. If you are not finished then I want some bullet points". In three weeks' time we need to move on to the next task, so having time constraints actually forces them to write. We work out a time schedule for chapters etc. I say that even if it is not sentences and paragraphs and it is just bullet points, I need to see the flow of argument and thought. We can revisit that later on. The value of that is that it gets them going. They have a deadline (Supervisor F).

Supervisor F is confident that deadlines are important for all her students. She indicates that different forms of writing are useful to keep the momentum going, for example 'just bullet points'. Her thinking ties in with the idea that writing is ongoing and reflexive. She also alludes indirectly to the conventional wisdom that moving from one piece of writing to another often assists the writing process, particularly when writers feel blocked. One solution to this block, suggested by Badenhorst (2007), is to move to some form of creative right-brain activity, such as drawing or doodling.

Outside assistance with writing

The assumptions relating to the ability of a student to write academically are rarely made explicit and are only raised when there is a problem with research writing (Brown, 1994; Strauss et al., 2003). Writing skills are then often not addressed by the supervisor and attempts are made to find assistance elsewhere, for example at a writing centre or a writing co-supervisor is approached. Most supervisors focus on what **they** can do to assist with the research writing process but sometimes do comment on the strategies students might engage with that do not involve supervisors, for example utilising some form of outside assistance. One of these strategies involving outside assistance are the workshops run by the Faculty of Humanities relating to the research process. These workshops are open to all postgraduate students

I have really encouraged students to go to the writing workshops at Faculty level, organized for PG students. They run a few every block. I would like my students, sometime before they start writing up, to attend one of these (Supervisor C).

I think when I started my friend advised me to go to Humanities - they have seminars sometimes - workshops which are provided by the School of Humanities (Student 9).

Two further areas of outside assistance which are mentioned are the Writing Centre and a research writing course. One supervisor recommended the former whilst one student enthusiastically recommended the latter.

I always tell students, both postgrads and undergrads, to please go and seek help at the Writing Centre. Some of them come back and say that they went but that it wasn't very helpful and some come back and they are totally transformed. So I don't know what goes on there whether there is inconsistent assistance? Maybe one person who is fantastic works on Mondays... and someone who doesn't really care works on Thursdays (Supervisor E).

If I had to advise someone now who is getting into a PhD I would tell them to go and do several writing courses (Student D7).

4.2.3 Positioning

The third issue raised by **both supervisors and students** is that of positioning. Linked to the emergence of the postgraduate student's scholarly identity, is the ability to position his/her work locally and on a more international scale. Thomson and Kamler (2013, 20) touch on this when they say that "this capacity to imagine oneself as an authoritative scholar engaged in an ongoing conversation with others, and the text as the means of connecting with others and saying something that matters, is central to the publication process". A number of issues linked to positioning are perceived to be problematic by **either** supervisors or students:

- structure, flow and argument
- · coherent writing
- finding voice in writing
- writing for an audience.

Primarily for Masters and PhD you usually expect the students to come with their own ideas. So what they are really looking for is guidance in how to structure their ideas, how to make the arguments and how to put it in writing. (Supervisor A)

These issues resonate to a certain extent with some of the key problems that external examiners identified when reporting on theses, namely coherence, lack of argument and structure, and lack of voice or authority (Wisker, 2004).

Structure, flow and argument

Structure is a way of providing a logic for the reader in the selection and ordering of ideas, and links to the argument put forward in the writing. Without a coherent structure with good linkages the argument may be difficult for the reader to follow. The information which is chosen and the clear order in which it develops informs the

argument. In many instances, reverse may be true: the argument may determine the logic and ordering of a piece of writing. Few supervisors even attempt to provide concrete strategies around different ways of structuring ideas.

In general when they actually produce the thesis or drafts of it, organisation is the first big problem. Even though they've been instructed and done essays, they don't really understand that one point has got to be exhausted before you move to the next point, and it's got to lead from that point and then that's got to be exhausted before you go to the next point (Supervisor D).

Supervisor A has a clear notion of the general hierarchy of the research writing process and ordering of strategies to assist students.

It's basically ideas, structure then content. Later on it is more guidance about structure, argumentation and the integrity of writing (Supervisor A).

Another supervisor (Supervisor E) explains that that the structure of research writing, the level of English, and the ability to write are connected. This supervisor advises students to use the Writing Centre but implies that the ability to reflect on one's writing is intuitive and that structure is difficult to teach.

The one problem is if you have a student who really just cannot write, whose English is so poor that even if they have a nice structure, they can't even get their thoughts across. That is one end of the spectrum. This is really frustrating and some students can often never quite get even after you have worked with them and said "Please go to the Writing Centre- please go to the Writing Centre" They don't. Up to the report you are still seeing this and this is really difficult. If they are not willing to put in the effort to learn how to write! Someone can be a brilliant writer but they are just not getting the structure and they are not telling a story. Ultimately your thesis is a story and they tend to lose it especially with the literature review which tends to be all over the place and often repetitive. So that is really difficult to handle with students because it's not an easy thing to teach – structure that is. I mean you can get them to put their outlines together and circle everything they have repeated

but it's almost an intuitive thing- being able to take a step back from your own writing and seeing how it is coming across to the reader. Either you try and do that or you don't, some students just never do that (Supervisor E).

A further strategy to assist with the thorny issue of structure is to focus on the purpose of the structure and to see the research from the viewpoint of the external examiner.

On writing if it's deeper, if it's conceptual and they can't express, then obviously it takes a lot more time. And I will sit and go through it sentence by sentence with them. Structure and argument tend to be later. I'll go through all the guides and we discuss the structure. We talk about the purpose of what they are trying to do, because often they don't realise it, so we'll talk about the purpose of that particular structure. I try to explain what it is that the examiner is going to be looking for, so that they've got a good feel for that and also when we get into the committee that assesses them, they are not suddenly struck with this 'Oh dear why didn't anybody warn me' (Supervisor B).

Supervisor H has a structure strategy clearly worked out and has a simple template which students use to structure their writing.

I think most important section of any chapter is the beginning, because in the beginning it says what is the aim? And what is the structure and the flow of this chapter? And if you have a look at anything I have ever supervised, it's probably almost writing from a template. I force everybody to write a chapter, tell me in two paragraphs: what is the aim of this thing? How does it unfold in terms of three sections or four sections and don't give me seventeen sections, just three or four? And that's it. And then that's how it is set out. And at the end we have a conclusion which says basically this chapter set out to do this (which is what the aim is, and it did this through these various things). The next chapter will be picking up from these themes and doing the next thing. We then turn to the next chapter. The next chapter begins again: this is the aim, this is the structure and then we go through the three or four sections. And that is it! It's always a template that I work from. That's how I write a

paper. I force people to write that way and it's all structured. Yup! It's all structured. That's why stuff I am supervising is all very structured. That's why everybody says, "It's very clear, whatever" (Supervisor H).

Several students list useful ways of addressing structure, flow and argument in their work. Student C8 uses the analogy of tables and chairs to describe her strategy.

I think the flow the most important for me because I would be talking about one thing and then I would remember that - okay if I'm talking about a table, that a table sits with a chair, then I put a sentence about the chair and then go back to the table before I go to talk about chairs. I was always mixing things. Now I have learned to ...I write a paragraph and each sentence I ask myself "Does it relate to the table? Does it relate to the chair?" Now I put all the table issues together, all the chair issues together (Student C8).

The notion of flow on a larger scale is picked up by Supervisor L who suggests that writing a summary at the end of every chapter is useful in ensuring flow and coherence. He comments that this strategy does not find favour with all external examiners.

Basically at the end of each chapter you write a summation of what you had in the chapter. So that it threads together. It's interesting that some examiners don't like that. They find it very repetitive and they find it is not useful at all. I find it very useful because I find it threads the story together and it helps the student assess what the chapter is doing. It actually helps you to connect forward (Supervisor L).

Argument and voice are often mentioned together as an issue, as suggested by Supervisor F below:

Often weaker students and poor sentence construction and grammar go together. Often! Not always. And of course the questions around voice and argument are still critical but that is the first level we have got to get through before we get to those other issues. Stronger students- it's the other end of

the spectrum: it's the argument and voice issues that they need much more support around. So everybody needs assistance but at different levels (Supervisor F).

Coherent writing

When students are muddled or unclear in their thinking, their writing reflects these characteristics. Muddled thinking impacts on text coherence. Coherence refers to the relationships between large chunks of text, and impacts on the logic and flow of the writing which enables an argument to be made (Fahnestock, 1983 in Buffler et al., 1997). Recognisable writing patterns (both in and between paragraphs) are a hallmark of coherence and enable clarity between ideas. The notion of cohesion is also of importance as it is linked to coherence in text readability. Cohesion refers to "the linking of sentences and paragraphs through the use of devices - particular words and phrases - that show the relationship between one group of words and another" (English and van Tonder, 2009, 55). Cohesion can be signaled in text by reference; ellipsis and substitution; conjunction; and lexical organization (Halliday,1985).

Supervisor B also indicates that she has issues with incoherent writing. However in concentrating on the writing, she misses the link between thinking. This creates a problem in that the supervisor then finds difficulty in assisting the student.

It varies greatly; some students have no problem with writing - they seem to be able to capture things very nicely with no problem. Ah, and then others seriously, seriously struggle. Inevitably you end up paying a lot of attention to it - more so than to actually whether they've grasped the concept, which is problematic because you are actually trying to tease out what they are saying. So you just try and get them to put it down in a coherent fashion and then you'll have to evaluate whether they are actually saying what they wanted to say (Supervisor B).

So interview evidence from this study suggests that whilst supervisors **are** able to identify incoherent text, they lack the particular linguistic knowledge and discourse necessary to assist students in writing coherently. Except for outlines and mind

maps, precise strategies were seldom offered by either supervisors or students to address text coherence or cohesion. I argue that because the linked notion of cohesion and its devices are not identified or utilised by these supervisors in their text work with students, students are often unable to improve their writing. This supports the findings in the literature that "students are frequently told that their writing is incoherent but have to find out for themselves how to make it coherent" (English and van Tonder, 2009, 24). Consequently it appears that while supervisors are able to comment on whether a text is coherent or not, they seem to have given little thought as to how to actually work with research students to develop this component of good research writing.

So there is a clear link between thinking, writing and text coherence. If supervisors and students are equipped with greater knowledge of the notions of coherence and cohesion as writing tools, they will be better able to formulate strategies to address the issue of incoherent research writing. However in some ways it seems to be problematic to talk about coherence divorced from the notion of argument, since argument provides the logic and the coherence for good writing.

One of the devices to assist with general coherence is signposting. Signposts tell the reader what will be done in the text to follow. They link paragraphs and sections of the writing. Pilus (1996) suggests that a form of signposting, conjunctions, often give trouble in establishing coherent text. Aside from Supervisor J, no supervisors or students mention a lack of signposting as an issue affecting coherence.

The big things that repeatedly need to be emphasised are bridging, linking sentences and ideas (Supervisor J).

Finding voice in writing

Finding voice in their writing is often a tall order for many students. Research writing which contains voice is unique, vibrant and authoritative (Badenhorst, 2010). Voice is related to writer agency. Paxton (2014, 151) defines voice (or voices) as a "set of discourses that the writer brings to the act of writing, they are part of his or her social and historical formation and a writer's voice can be considered as his or her unique combination of these discoursal resources". It is interesting to note that only one

supervisor sees voice as an issue in research writing. This may be because supervisors are constrained in their approach to the prevailing disciplinary genre of what constitutes research writing. Thesen (2014) advocates for the notion of *risk-taking* in research writing and identity work and sees this as opening avenues of communication and hence voice. Students in this study offer several insights into their struggle to acquire voice. An example of this identity struggle comes through in Student 11's reflection on her attempt to become her own self in her writing.

Reading other people's work and trying to come up with your own is difficult but its exciting at the same time because I'm learning and I'm developing. You know I need to have my style, my...I don't know what to call it but it has to be mine, it has to own. It shouldn't be like somebody else's (Student H11).

Comments made by students relate to this struggle to find themselves in their writing. For some of these students the notion of voice may be at odds with their non-western cultural idea of voice in writing (Badenhorst, 2010). Student H11 (quoted above) and Student C8 (quoted below) are students whose home language is not English. They hint at the tension of creating 'my style' and a 'new academic' voice.

I struggled with constructing the literature review chapter - that's where there was a lot of material and I had to come up with my own voice, a new academic voice! (Student C8).

One student mentions using readings to model structure and argument. This student, when faced with diverse writing styles, became daunted and confused, losing her sense of voice in the process.

I would read the best papers. I found the arguments interesting because they challenged me the most and I could relate to them. I used to think I should grapple with the others but now I think that if I really don't understand them and they are in very hectic language I should just ignore them. But initially because I thought I ought to write like that- of course. There is this guy who

has a phenomenal writing style- just his arguments and his way of putting things and I think absolutely I should be able to write like that. The problem with my research was that the sources ranged very widely and I thought I should be able to write like a combination of them all (Student E10).

Two mature students share their pleasure at finding voice and identity through their writing.

You kind of get yourself thinking and say this is how I want to sound, this is how I want to come through and you look at your work and say yes, this is me! (Student L2).

I can say I own my writing. It's not the same as Honours or undergraduate writing. I'm still trying to find myself in writing, trying to see what is my writing style and yeah, I can say I own it now (Student F3).

Only one supervisor mentions the difficulties of putting the idea of voice into practice. She relates voice to argument and strategises around initially getting a student's voice into the literature review by utilising the spoken word.

The issue of voice and argument. I find very few students who can do that. The problem with the unclear comments is that it's the voice issue. They have depended too much on someone else's writing and they haven't worked out in their own mind, and reinterpreted that for their project. I say "Tell me in your own words" and it comes out completely differently. What I do often is make comments like "You are relying too much on the literature. Where is your voice?" That is a writing strategy issue in that it's not about weak or poor writing but it's about developing an argument. So the issue of voice comes out a lot in the comments I make. You may have a wonderful literature review but I don't know what your position is? You can even have a student with 80%, a really strong student, who does not have a voice. So that is a big issue, not about weak or strong but it is a writing strategy issue (Supervisor F).

Two strategies for finding voice are suggested by a doctoral student who initially had serious difficulty with her research writing. She suggests going to a research writing course and blogging.

If I had to advise someone now who is getting into a PhD I would tell them to go and do several writing courses. It is all about writing. It is all about finding your voice. I hadn't found my thesis voice until that point. Part of what helped, and it's amazing how you pick things up along the way and finally it comes to a head. Finally you can do it! (Student D7).

Blogging is new to academia and in this context consists mainly of online writing (blogs) and comments. Badenhorst and Mather (2014) found that blogging enabled students to clarify their own ideas and also to engage with those of others. "Increasingly students began to write as 'knowers' and less as 'receivers' of knowledge, indicating a shift in positioning" (Badenhorst and Mather 2014, 11). This student found that blogging assisted with her writing, particularly in finding her voice in an academic context as blogging has an authentic 'real' audience. This is what the student said:

It depends on what I am writing but I find it easier to write if there is something pushing me. So basically I blog and that has helped me a lot. I find it easy to blog but there was always some mystery shrouding the whole thesis thing. It took a while how to learn to channel the blogging into the writing. It didn't help until I took the course last year on research writing. Up until then I had a problem with writing because I always thought you had to have a formal voice when you write. It had to be a voice which just gives dry statistics focused on what you found. Part of the issue was that I was coming from a Science where you have done your experiment and now you are providing your results in the most succinct way possible. So bringing that style into the thesis hadn't been very successful. It was only when I sat in the Research Writing class that I realised that you can make your thesis as interesting as possible. Supervisors actually love it when you make it a good read. So the two came together. So I realised why my supervisor was complaining so much (Student D7).

Writing for an audience

Linked to the notion of voice is that of audience. Badenhorst (2007) suggests that writing for the audience may lead to the writer becoming over-critical and she suggests that a better way of framing audience is to talk of writing for a reader. This idea resonates with the following comment by Student H11.

Being able to come with my own...being creative, coming up with this work that will appeal to the reader or whoever will be reading it That's what I'm still struggling with (Student 11).

A thesis is often written with either the supervisor or the external examiner in mind. Student D7 has thought deeply about this and has moved from writing for an informed audience (e.g. her supervisor) to writing for an audience which is less knowledgeable about the research topic. This is interesting as it conflicts with the idea put forward by Paltridge and Starfield (2007, 5) who suggest that "writers of thesis and dissertations are typically novices writing for experts". The stance taken by this student also reflects an important change in her writer identity - she has become 'the knower' and has moved away from seeing herself as a 'novice' in the writing context.

I write with my supervisor in mind, knowing he has given all this feedback before. I know when I read the draft what he will comment on, so let's change it. Let's make it reflect the comment before he makes it. My initial assumption was that if you were in the field of, then you would know what I was writing about. So when he queried a lot of those things, I decided we could not keep having these discussions, so I assume that he has no clue! So I lay it out fully. My audience is still vested in the same person but my assumptions about his knowledge for my writing are different. My initial assumptions were that he knows all this stuff so why write it because he will fill in the gaps, but now he declines to fill in the gaps. It makes perfect sense because it is not just going to be he who reads it. So now when I think of him as an audience I think of him as someone who doesn't know, who needs it spelled out from the beginning (Student D7).

4.2.4 Surface issues of paragraph construction, grammar, referencing and plagiarism

The fourth issue raised by **both supervisors and students** encompasses paragraph construction, grammar, referencing and plagiarism. Kamler and Thomson (2006b, 5-6) argue that "problems with writing are most often seen in skill-deficit terms....and the advice given to solve writing problems often focuses on the surface features of writing. Spelling, grammar or simplified models of text structure or citation are offered to students because these are the more tangible aspects of academic writing". This view of supervision informs many of the supervisors in this study in that their immediate reaction when faced with student writing is to carefully edit the first draft. There is often a focus on surface features e.g. grammar. This practice does not allow for more important and deeper discussion about the logic and flow of the text. (This aspect is further discussed in the chapter on feedback - Chapter 5).

However some supervisors do recognise that supervisors should not spend undue time on correcting first drafts as evidenced by Supervisor J who sees surface errors as unimportant when he says:

I spend less time with spelling errors and things like that in the first draft (Supervisor J).

Supervisor F indicates that there is deeper learning to be facilitated when assisting students with their research writing.

There are issues around grammar and that..., but for me those things are less of a concern because it's easy for someone to help a student with that. But they have got to do it in a developmental way where it's not just correcting the grammar. It's about understanding why and getting that right (Supervisor F).

Very few students indicated grammar to be an issue, however one student talked of her difficulty with grammar.

I keep on making grammatical errors, typographical errors time and again, so it's not easy at all for me (Student H11).

The argument that poor writing is often a reflection of unclear understanding of the conceptual material put forward by Dunlap (1990) is useful in this context. Dunlap (1990, 78) suggests that supervisors should treat grammar as a "symptom not a problem" and advises that muddled or poor grammar should be seen as unfinished or incomplete thinking. Clarity may take time to evolve. An example of the supervisor's focus on grammar in early drafts is apparent in the approach taken by Supervisor J:

If the writing skills are very poor, there needs to be discussion about simply how to write or spell or punctuate and things like that (Supervisor J).

Whilst concern was raised by supervisors about the quality of student writing generally, they also raise specific issues regarding poor sentence construction, paragraphing and referencing.

I think its general stuff. Some students are really weak. We don't have subject, verb, object. We don't have sentences (Supervisor L).

Packing too many ideas into one sentence and then it becomes nonsensical (Supervisor F).

Supervisor G attempts to engage with the issue of poor paragraphing in relation to data analysis by offering a model paragraph. By modeling a paragraph as an example, Supervisor G may not be addressing the development of the student's writing as there appears to be little effort to engage with the fundamentals of good paragraph construction (from either Supervisor G or Supervisor E below).

The other strategy is to give them an example of what I expect from them. So actually write out an example. Now I am not really good at that... ja...! I was taught by old school where you just did it yourself. Then they must go and try to apply that to the rest of the document. It doesn't always work! I will give them an example of a paragraph that I would write. So especially in the data analysis I will write a short example of what they have written and what I think and how I would have interpreted that data. I won't necessarily do that for the whole document. I will just do it for a section (Supervisor G).

Paragraph structure is important. Just trying to explain to them how you need to finish a thought and that your paragraph has to have some continuity. You can't just ramble on to a new topic. They need to recognise this. So really it's just when I have examples on a need-to-know basis. I have never really sat down and said "This is how you structure a paragraph (Supervisor E).

Surprisingly the issue of plagiarism in the context of the research writing process was only raised by one supervisor. This issue has currently become a pervading one across universities in the region and the institution has a formal plagiarism policy which has special reference to postgraduate students. None of the students hinted that plagiarism could be an issue.

I do a lot of work on plagiarism- what is and what is not plagiarism. I grab a book off my shelf and ask them how they would rephrase something- so this is wrong- this is not... Really to make subtle plagiarism mistakes and then to see if they pick it up. Again this is not with all students- it depends. I have had several postgrad students who have come to me with proposals that are plagiarised. (Supervisor E).

4.2.5 Writing style

The fifth issue raised by **both students and supervisors** is writing style. Although this was perceived as an important issue by a few supervisors, it is interesting to

note that only one student perceived this to be an issue. She raises the challenge of 'conforming' to a writing style

It's not easy at all, it's difficult, you know there is a style of writing that you have to conform to and I find myself struggling (Student H11).

In an attempt to pinpoint what is needed in academic writing (or in some cases factual scientific writing), various forms of writing are listed as problematic by supervisors viz. journalistic emotive writing, technical report writing, and descriptive writing. These comments emanate from supervisors whose research methodologies tend towards the quantitative. Any form of self which is evident in the writing is eschewed by these supervisors.

The other thing is that you often get very journalistic writing – then I mark in the margin "Journalistic! Journalistic! Journalistic!". It has got to change to a more academic style. It's something like the student will say umm... It's just not rigorous...it's quite sensational writing- very emotive writing rather than more factual and academic (Supervisor F).

Supervisor F is emphatic in his condemnation of what he terms an emotive journalistic style. His students are required to write factually and 'scientifically'.

In one of the few studies on postgraduate writing in science, some senior American academics in the survey listed a lack of both elaboration and clarity as issues in their students' thesis writing. Science graduates in the same study reported that supervisors were helpful in addressing ways of expressing ideas, improving organisation and coherence, presenting data, and **correcting style** and format (Ren Dong, 1998).

The issue of report writing style, and that of the preferred academic writing style, is pointed out by Supervisor H who often works with students who regularly write reports in the context of their fulltime jobs. He acknowledges that these students know how to write and that it is just a question of explicitly adapting their writing style to include the writing conventions of academic and disciplinary discourse. The

assumption is that they will be able to discern and pick up the disciplinary patterns, methods and conventions required for this genre of writing.

I have the situation that many students I deal with are at work. So they are doing report writing for work and that sort of thing. It probably impacts negatively because the way they write as those things are completely different from the way they are going to do their academic writing. Many of my students can write but they just have to adjust their writing and learn the academic way (Supervisor H).

Supervisor G on the other hand, sees students as being unable to write and further complains of the use of headings that are not 'thematic'.

A lot of the students don't write grammatically, so as the stuff comes to them they write it. They will have headings that are not thematic- I don't like that form of writing – its report writing! It's technical not academic (Supervisor G).

Supervisor G continues to explain the issue of scientific writing. The issue for him is moving students from description to analysis in handling data. The intention of descriptive writing is to supply the reader with factual information. Analytical writing includes description and may be expository in that it also re-organises ideas, and seeks categories and/or relationships. Leading from this is the notion of persuasive writing. This includes the first two types of academic writing and presents claims, and the interpretation of findings arguments research (http://sydney.edu.au/stuserv/learning_centre). So the issue is probably the lack of knowledge regarding what genre of writing is needed, rather than an inability on the part of the students to write well. An understanding of the difference between descriptive, analytical and persuasive writing would enhance the student's ability to write 'scientifically'.

So that brings up the next problem which is that students are not able to engage with their subject matter scientifically. They just basically provide you with an overview or a description of their data rather than a scientific analysis of their data. For me that's the biggest problem. They are providing a technical report rather than an academic document. If they had done the

reading they would have a fair idea of how they should be handling the data. If you are reading real science, the other scientists will show you what they have done with their data. They haven't just described that there was a peak on the 14 January. Nobody cares! So they should have realized that this is the first phase of their process but the next stage is to interpret that. So when you tell them that, they decide on a reason for everything, so x being the sole reason for any change in y. So they don't actually engage with the problem at all (Supervisor G).

Supervisor C concurs with Supervisor G in his viewpoint that scientific writing is required and that students need to move away from description. He also points out that this style is necessary due to the scientific audience and that all students, even those who write well, simply need to adjust to writing in a different way. He sees scientific writing more narrowly as reflecting quantitative research methodologies – he mentions 'analysis, results and potential implications' and does not see the social sciences as 'science'. His solution to the perceived issue is to supply students with a document containing suggestions for what he considers to be 'scientific writing'.

I think that they have been taught to write in a certain way from school. The problem is that we as scientists expect them to write in a scientific style. So all students, even those who write well quite often write in a certain way-more like an essay. Quite a descriptive style. I have a document from a previous Professor that I have tweaked, basically highlighting common errors and problems around scientific writing. It also highlights how to write in a scientific manner. It is important to write in a scientific way for a scientific document. I don't know what word to use to describe ... in high school where they write essays? It's a totally different style to what we expect. In Humanities it may not apply as much. I have heard it said that a lot of academics from Humanities' disciplines who have read some of our work, find our work incredibly dry and structured. It is a different style of writing. It is not necessarily creative. It's OK to be dry because the message we are trying to get across is one of scientific principles. This is the analysis, results and this is the interpretation and the potential implications. A lot of our students don't

come with this background and they write quite well, but the style has to change to suit the scientific audience (Supervisor C).

The comment above that scientific writing 'is not necessarily creative', can be challenged. Badenhorst (2007, 50) argues that "all writing is creative. Even research writing". Badenhorst (2008) suggests there are four stages of creativity which apply to all academic writing: preparation, incubation, illumination/inspiration and verification/implementation. The first stage is where we 'master' the topic by doing initial work such as thinking, searching and opening the mind to suggestion. Incubation is the time when these ideas are allowed to cook in our subconscious. The third stage, illumination, occurs when we gain insight and new ideas come to us, either suddenly or after considerable application. The final stage of creativity is when our ideas are 'put out there' for critical assessment by others. Commenting on Badenhorst's work, Janks (2012, 2), says that, in the academy, "we have been led to believe that research writing is different: it requires one to gather and assess information, to produce local arguments in relation to evidence, and to use disciplinary norms for structuring ideas". So creativity and the construction of new scientific knowledge can work together in the research writing process. Creativity and logical scientific writing are not mutually exclusive.

Secondly the comment above that "it's OK to be dry because the message we are trying to get across is one of scientific principles" is also of interest. Scientific writing may be difficult to understand. Gopen and Swan (1990, 1) suggest that "most people assume that its difficulties are born out of necessity, out of extreme complexity of scientific concepts, data and analysis". However they argue that this need not be so – "complexity of thought need not lead to impenetrability of expression". The purpose of scientific writing (in fact any meaningful discourse) is to communicate what the writer wishes the audience to know.

One supervisor goes against the movement towards scientific writing and puts forward an argument against the use of the passive tense by 'so-called science people'. The idea of the passive tense is that it is supposed to promote a sense of objectivity and has historically been used as a scientific writing device.

Oh another issue is the passive; I try and make them avoid the passive. Now I don't know about so-called science people but it is a mistake to write in the passive. It is stupid! It is engineering-speak and we're not engineers. You can write in the passive and make some amazing grammatical problems because of that (Supervisor D).

This section has revealed a number of writing issues and strategies considered to be pertinent by supervisors and their students. These include the interesting relationship between thinking and writing and a number of issues and strategies concerning the research writing process: discussions with students to set up the research, the importance of key texts, assistance with the literature review, the proposal and the research questions, regular writing, positioning the writing using argument and voice, using outside writing assistance, language issues, and finally writing style.

4.3 Conclusion

Kamler and Thomson (2001, 6) suggested that there is "little systematic instruction in high-level writing for postgraduate students" and that "supervision practices rarely make explicit the complex rhetorical and scholarly devices used by different disciplinary communities". An analysis of the issues and strategies put forward by supervisors point to the fact that there appears to be little pre-thinking in this community of supervisors about the process of assisting postgraduate students to write. This analysis concurs with the ideas of Kamler and Thomson (2001) who indicated that there was very little research relating to PhD writing practices and that this may be because writing is seen as of lesser importance compared with the 'real' work of research. This appears to be still the case in this community of supervisors.

Although supervisors have a range of issues they perceive to be important and problematic and have some strategies they suggest would assist students with their research writing, these are not always linked to the issues perceived by their students. In addition these strategies appear to be randomly suggested. There is also little match between the strategies suggested by supervisors and those

supported by their students. Students made use of several creative strategies such as blogging, however supervisors made no mention of texts aside from the thesis itself. There is a dearth of advice from supervisors on reading strategies which would enable postgraduate students to come to grips with the relevant literature. The use of outside editors is only mentioned by one supervisor. In addition, no mention is made by supervisors of the usefulness of communities of practice in supporting student writing. In addition, since writing is seen a recursive process, the current notion of 'writing up' held by the participants in this study needs to be critically engaged with by supervisors and their students.

This chapter has provided important insights into the supervision practices of this community of supervisors and to the perceptions and struggle of their postgraduate students to engage with their research writing identities. It has also highlighted several gaps in supervision practice, for example the lack of attention to reading skills and the absence of 'other' forms of writing which would assist postgraduate students.

Chapter 5: Written Feedback to Postgraduate Students

5.1 Introduction

Whilst increasing attention is being placed on the pedagogy of postgraduate supervision and on research writing, less attention has been directed to the nature of the *written* feedback offered to postgraduate students on drafts of their research. An important function of feedback on research writing is that it enables the student to begin to participate in academia, thus enabling independence in research (Cafferella and Barnett, 2000; Stracke and Kumar, 2010). It is internationally recognised that supervisors frequently indicate that they need assistance in giving constructive and useful feedback to students, whilst students lament the lack of positive assistance in the feedback they receive (Kamler & Thomson, 2006b).

As explained in the methodology chapter, supervisors and their students were interviewed separately to find out the nature of the written feedback offered to the postgraduate students by their supervisors. Altogether eleven supervisors and the same number of postgraduate students were interviewed. The information gained from interviews with supervisors and their students on their feedback led to the creation of a newly conceptualised analytical feedback framework. In addition, three drafts at particular stages of the research writing process were analysed using the feedback taxonomy created by Kumar and Stracke (2007) in order to illustrate three different instances of supervisory feedback practices.

This chapter responds to the third research question which focuses on the nature of written feedback given to postgraduate students. The chapter begins with a reminder of the conceptual framework devised in the methodology chapter for analysing the nature of written feedback to postgraduate students. The framework shown in Figure 7 below, illustrates a continuum of feedback practices: ranging from big picture feedback to superficial surface-level feedback. This framework was devised primarily to assist those staff members who struggle with the vocabulary used in many of the taxonomies discussed in this research, e.g. Kumar and Stracke (2007). An explanation of this framework and its application to supervisors' feedback

practice is followed by a discussion of issues regarding feedback raised by supervisors and students and the chapter concludes with a summary and recommendations for effective feedback practice.

5.2 The Nature of Written Feedback given by Supervisors

5.2.1 An Analytic Framework for Supervisor Feedback

The analytic framework conceptualised in Chapter 3 (Research Design and Analysis) is repeated here in Figure 8 below. It presents the various elements of feedback practice as explained earlier.

5.2.2 The Feedback Continuum

The nature of written supervisor feedback on student drafts is categorised as a continuum ranging from Big Picture Feedback to Superficial Surface-level Feedback with a Mixed/combination Feedback response found between the two feedback extremes. At one end of the feedback continuum (first mentioned in the methodology chapter) as shown in Figure 8 below (Figure 8 is a repeat of Figure 5), Big Picture Feedback is characterized as focusing on the structure, cohesion, coherence and clarity of the research writing (Brown 1994; Bean 2001). Emphasis is also placed on argument (Kamler and Thomson, 2006b). By contrast, Superficial Surface-level Feedback lies at the other end of the feedback continuum. This type of feedback is characterized by a focus on smaller more superficial issues such as grammar, spelling, layout and common errors at the sentence level (Bates et al.., 1993; Brown 1994). Supervisors often focus on the numerous errors students make, and as a result, feedback regarding ideas and overall structure is scanty (Bean 2001). Between the two feedback extremes lies Mixed Feedback which combines aspects of big picture feedback and more superficial feedback. So there is attention to coherence and linkages and, also to paragraphs and sentence structure. There may also be some editing.

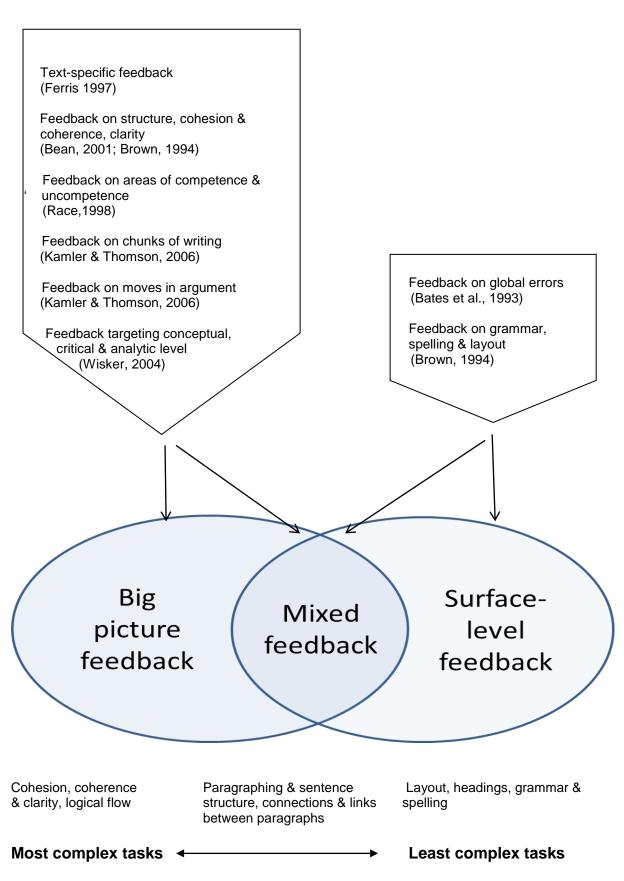


Figure 8: An analytic feedback framework: a continuum of feedback practice

5.2.3. The Nature of Feedback offered by Supervisors

It is suggested that feedback should be tailored to the needs of individual students and that it varies in nature. It is argued that feedback needs to be appropriate for the stage of writing. In the beginning stage of postgraduate research writing 'big picture feedback' is crucial, as attention to conceptual clarity, argument and flow are important at this stage. This said, it may also be useful, as suggested by Bates et al. (1993), for supervisors to draw attention to global errors at this stage. In the later stages of the research writing process, feedback on paragraphing, sentence structure and linkages is appropriate.

Whilst supervisors may have an idea of their feedback practices they have seldom been asked to describe these. For many of the supervisors who were interviewed, this was often the first time they had an opportunity to think and talk about their feedback practices. Only a few of the supervisors who were interviewed indicated that they had a clear sense of the nature of their written feedback. Most struggled to articulate what they did, and the majority could not say whether their feedback changed as the writing of drafts progressed. This concurs with the findings of Paré (2010, 113) who notes that a supervisor "might not make explicit reference to the rules of rhetorical engagement in the discipline, and might not even be able to articulate those rules".

Based on the interview information provided by supervisors on their feedback practices and the comments made by their students, the feedback continuum in Figure 8 (above) is used as a framework to understand the nature of the written feedback given to their students by the supervisors. 'Mixed feedback' appears to be the starting point for all eleven supervisors, although the nature of this 'mixed' feedback is itself variable. Hence the idea of 'mixed feedback' should be seen as a continuum ranging from 'big picture' feedback to 'superficial surface-level' feedback. So feedback from supervisors may be seen to lie somewhere along the feedback continuum and may be a blend of feedback on complex big picture and less complex superficial feedback.

Superficial feedback: Editing as starting point for supervisor feedback

Two of the supervisors (Supervisors C and E) indicate that although they pay some attention to overall suggestions and comments, superficial surface feedback is the starting point for written feedback from these two supervisors. The feedback practice espoused by Supervisors E and C contradicts the suggestion that, at least initially, supervisors should concentrate on more complex aspects such as coherence, cohesion and clarity (Brown, 1994).

The first of these supervisors, Supervisor C, indicates an extensive and early focus on surface writing features. He uses this approach as it was the one used by his own supervisor. In his interview, he focuses on his feedback to students from the proposal stage onwards, and he explains that in order to edit the student's work, he specifies text changes in detail page by page.

My own supervisor took me through a rigorous programme of assisting me to write better. It is pretty much what I do now with draft proposals or chapters. From the proposal stage I will look at written work and I will make general comments on the theoretical and practical aspects of the work and its feasibility. I will spend a lot of time starting to work with student page by page and sentence by sentence, showing the student common errors.

I correct common errors in the text in pencil on the hard copy. I don't use track changes because I can put in arrows and things between sentences and demonstrate things that track changes can't do. For instance I will demonstrate how in one sentence certain words were used and in the following sentence the same words were used and then I will put arrows across the page. So towards the end of this transcript I will say these are some of the common problems here. I will call the student in and sit with the student and personally highlight some of the common problems. The smaller problems like missing commas I put in pencil but I don't discuss it that much (Supervisor C).

So Supervisor C acknowledges that he uses in-text comments and concludes with overall comments i.e. what he terms 'common problems'. These can be termed 'global errors' (Bates et al., 1993). He also exhibits unhappiness and concern at having to work with these 'common problems' with students and addresses this by offering feedback in the form of an intensive rewrite of the initial page. He goes on to say this about his feedback to one of his students:

I took the first page and then I highlighted in great detail as far as the English was concerned. I said that I could not go through 10 or 15 pages like this. So we looked at the common problems on the first page and I went into great detail on how to focus on various aspects. Then I said 'Take this first page that I have virtually rewritten for you, and learn from it. Apply what you learn to all the other pages, then bring me another draft'. That helped a little bit but I really struggled (Supervisor C).

Supervisor C's student (Student C8) commented that she felt 'unsure' of how to transfer this advice to her work as it had been rewritten for her. She indicated she would have preferred some comments as to 'how' she might address flaws in her writing.

The second of the two supervisors who concentrate on superficial aspects of feedback, Supervisor E, indicates that she may occasionally offer some observations on content issues as overall comments. However she focuses on careful editing from the very beginning. It is not surprising then, that she also comments on the tiring and 'exhausting' nature of her feedback practice.

I edit from the very start and it is exhausting because with the students who don't write well there is the temptation to give up after page 3 where every single sentence has a grammatical error. My feedback is pretty editorial. I tend to not only just edit grammar and spelling as if you were editing for a journal, but I will also give a summary at the end that gives some of the overall comments or observations I have made about the piece. So there will be a lot of red- this and that in the text. Then I will give them an overall summary of the main things they need to work at from the content

(Supervisor E).

Student E10 comments on the feedback she received from Supervisor E and confirms the attention given to more superficial aspects of her writing in the feedback she received.

I give her a draft and she looks at grammar, arrangement, construction of sentences and advises me. "You should do that. Maybe you should read it aloud so that it makes sense to you". She is very helpful and supportive (Student E10).

Mixed feedback

Of the eleven supervisors who were part of this research, the majority (nine) of the supervisors favour a mixed feedback approach. In the interviews they expressed a number of ideas as to how they respond to student writing. Four aspects stand out: that for supervisors editing is a window into student writing and thus into their students' thinking; that big picture feedback, especially on structure is important; that different feedback is appropriate in different places in the students' drafts; and that the nature of feedback changes with successive drafts.

Editing as a window into student thinking/writing

Supervisors B and D are able to articulate what they prioritise in written feedback to their students. Supervisor B finds that, initially, the way forward is to edit, however the rationale for this is interesting. At first glance it would appear that she favours the superficial end of the feedback continuum, however she touches on an important point when she highlights that conceptual clarity and writing are inter-related. This accords with the notion that poor writing may result from 'unfinished thinking' (Dunlap, 1990). For this supervisor it is important to ascertain whether poor writing is masking the student's understanding of the concepts involved. To do this she uses written questions as a strategy to work with the student's thinking. This may be followed by face-to-face questioning as a feedback device to enable the student to unpack her ideas, and for the supervisor to gain an understanding of the student's conceptual and writing issues.

At the beginning of the process I generally edit because at that stage it's a case that the concept as well as the writing skill are closely linked. So if it's a particularly poor writer, very often it is not clear if conceptually they have got it. So I will actually go through it very, very carefully- 'Do you mean this?' It's quite a painstaking process (Supervisor B).

Despite this supervisor realising that poor writing and incomplete thinking are related she nevertheless indicates a 'sentence by sentence' approach (See quote below). Assisting students at the sentence level may be an inefficient feedback strategy at this stage. However if the feedback is a face-to-face-discussion and **not** a text edit, then the approach may be useful.

If the problem is conceptual, then I will sit and go through it sentence by sentence. Structure and argument tend to come later. When it's a little bit further on, then you start talking and dealing with structure (Supervisor B).

A second supervisor who is able to state his feedback priorities, Supervisor D, focuses initially on what he terms 'organisation and order' when giving written feedback. He indicates that his close attention to the grammatical component of the writing allows a window into the nature of the student's writing. This suggests that for this supervisor, (as for the previous supervisor- Supervisor B) this form of mixed feedback is useful at the beginning stage of research writing. Supervisor D also meets face-to-face with the student to discuss the feedback as he considers this to be an important and necessary component which complements his written feedback.

Organisation is the first big problem. They don't really understand that one point has got to be exhausted before you move to the next point. Often I ask them for an outline first (Supervisor D).

I find that talking to people about the work helps me to clarify it in my mind. So I would like students to do that more with me. Usually after a session they say they have a clear idea and they understand it better. We sit down and go through what my comments are. Some of it is grammatical; some of it is getting it in the right order. Then I let them redo the order and I won't do any

editing or that kind of grammatical stuff until the draft is in the right order. But I still like to have some section that I have edited for grammar so that they can see where the problems are, then try and anticipate it and get it fixed up for the second round (Supervisor D).

It appears that the Supervisor D is requesting an outline indicating structure and sequence. He comments that the draft must be 'in the right order'. He is not asking for an outline of the arguments at this stage. Supervisor D's student, Student D7, when asked how she responded to this feedback, replied that she found that this feedback helpful as it "needed me to think about my organisation – my structure".

So it may be that for some supervisors (Supervisors B and D), placing a spotlight on the language aspect allows a supervisor to gain better insight into the thought processes of the student. Once the ideas are clarified, feedback on structure and argument can take place.

Big picture and structure as feedback priorities

The second idea emerging from an analysis of the interviews with supervisors is the realisation by some supervisors that there is a clear order in the type of feedback needed by students. Three supervisors (Supervisors A, H and J) indicate what they prioritise in their written feedback.

Supervisor A highlights the need to work initially on ideas and structure. As seen in the quote below, Supervisor A has a clear sense of the order of feedback needed by research students and where his role lies in the process of giving written supervision. He indicates that for him the priorities are ideas, then structure (the 'bulk' of his work) and argument, and lastly grammar. He acknowledges that he may correct 'obvious typos'. This supervisor recognises that reading plays an important part in the formulation of ideas for the student. He also uses discussion with the student to enable the student to express his own ideas verbally. This process, he suggests, often resolves issues of clarity.

The first thing they've got to have ...its ideas. Sometimes there is half an idea there but it not quite articulated. That comes out through discussion and

reading. The second order of things is the structure – which ideas come logically in the argument. The bulk of the supervisor's work is structure. The last thing is the actual grammar syntax - that sort of thing. When I read a draft any obvious typos and things like that I start correcting- but what I'm mostly reading for are ideas and structure..... So what the students are really looking for is guidance on how to structure their ideas, how to make their arguments and how to put it in writing (Supervisor A).

A supervisor who clearly prioritises the nature of his feedback is Supervisor H. Supervisor H, a supervisor with more than twenty years of experience, acknowledges that an early focus on the 'big picture' and 'logical flow' overrides the urgency to give 'surface-level feedback' from the outset. Supervisor H explains that besides a grasp of the 'big context', there needs to be an understanding of the structure of the work, to enable the writing to flow logically.

I think the big picture thing and having a sense of why I (the student) am doing what I am doing in the big context is absolutely vital.....To see the big picture is the most important thing. They have to locate this in the broader framework of something that unfolds. How everything slots together. They need to get a logical flow. This is a crucial step. From the beginning of the writing they can see why certain things are being written so that they can get a logical flow. Otherwise they are writing stuff and they can't see how it all hangs together (Supervisor H).

Despite the early focus on the broader picture, Supervisor H accepts the usefulness of addressing smaller scale issues such as paragraphing at some point. Grammar and errors are also addressed but are seen as of lesser importance.

I tell them where there are problems with structuring the text and basically try and cover all the issues. Not necessarily immediately. But I do deal with things like you shouldn't have a one-sentence paragraph. I deal with these little things as well. If I am given something that is not good, then there is no point in editing as it is not even at the starting gate. So if what I get is

something reasonable then I will put in a lot of effort even on the first draft, because in some instances the first draft could be the last draft (Supervisor H).

The secondary focus on paragraphing suggested by Supervisor H above concurs with the idea put forward by Race (1994) that attention to sentence structure and paragraphing are of lesser importance than overall coherence and clarity. For this supervisor the starting point when offering feedback is to concentrate on the structure of the text.

Interestingly, Student H11 is one of the few students who comments, without being prompted, on the feedback she receives from her supervisor. Reflecting on the feedback she received from Supervisor H, her perception of the feedback expresses a slightly different focus compared with the espoused practice of her supervisor. The dissonance between student and supervisors' experiences and perceptions is an important finding in this research This tendency is also noted by Bitchener et al., (2011) who identified a 'mismatch' between what supervisors 'believed or practised' compared with what analysis of the feedback actually revealed.. Whilst she makes reference to her supervisor offering suggestion regarding flow (a component of big picture feedback) e.g. 'use these words to connect sentences', the student does not convey the sense that she sees the feedback as concentrating on the big picture and/or structure in particular. She indicates that for him, the feedback consisted of a much lower order of feedback and consisted mainly of directives relating to editing e.g. 'use this word'.

He writes in the margins. A lot of it is just "Use this word instead of that" or comments on references. He will give a general overview of the flow and say if there is something missing. He will edit on the copy if it is a train smash! So for example "Use this word, not that word. Why are you comparing these two things? Move the comma. Put nevertheless instead of Use these words to connect sentences". He does that kind of thing. He will do it all the way to the end in each chapter (Student H11).

Coherence and flow, essential elements of good research writing are emphasised by a third supervisor, Supervisor J, although he is fairly tentative about his feedback strategies. He highlights the notion of 'scientific writing' which he describes as being 'clear and concise'.

The big things that repeatedly need to be emphasised are bridging, linking sentences and ideas. In general I just try to encourage them to be clear and concise and not to use too many words - make it scientific writing (Supervisor J).

The spatial component of feedback: Feedback at different places in the draft

The third idea emerging from the analysis of the interviews with supervisors is that that different feedback is appropriate in different places in the students' drafts. Only one supervisor, Supervisor F, offers an indication of the nature of her feedback linked to where her feedback is located in the text. In order to describe her feedback practice she has developed her own meta-language. She describes three positions in the text where feedback is offered: in the margin, at the end of sections and in overall general comments at the end of the writing. She repeats this approach for each chapter.

What I do is write in the margins. I make comments and then after each section I will write a few general comments for that section. Then there will be a set of general pointers and things that they absolutely must address at the end (whether it's the whole proposal or the chapter). So there are three sets of comments: margin, end of section and general comments. Margin comments highlight things like whether it's journalistic, whether there are references missing, whether the idea doesn't make sense, the sentence is too long or that I can't follow the argument (Supervisor F).

Supervisor F offers an explanation of the difference between her in-text margin feedback and overall feedback. She details the nature of these comments in relation to their position in the text e.g. margin comments are likely to include feedback such

as 'missing references, unclear' etc. whereas general comments appear at the end of sections or the work as a whole. She avoids editing herself but points to where editing is needed e.g. 'unclear, rethink, rewrite' and leaves this for the student to deal with. The idea that students need to articulate their own voice in their writing plays an important role in this supervisor's feedback practice

What I often do is make comments like "You are relying too much on the literature", or "Where is your voice?" That is a writing strategy issue in that it's not about weak or poor writing, but about developing an argument. (Supervisor F).

Student F3 commented on the feedback from Supervisor F confirming the frequent use of questions as a useful feedback device which allowed him to develop a sense of his own voice:

There would always be verbal as well as written feedback. So during the meeting she would discuss and check that I understood what she said I should change and how I should change things. Editing was about 20% of the time whereas the rest were open-ended comments and questions that she asked me to think about (Student F3).

Student F3 confirms the feedback practice espoused by Supervisor F. There is a sense of ownership of the writing by the student, despite the 'ideas and thoughts' of the supervisor. The use of questions as a feedback device reinforces the notion of ownership and choice clearly felt by the student - as evidenced by his statement - 'I would look at it read it and think about it and decide whether I agreed with it or not'. The one-on-one verbal discussion between this supervisor and her student assists the student with clarity of expression and supplements written feedback. Supervisor F considers that there is often too little opportunity for students to voice out loud their thoughts and conceptual understandings, particularly if students do not have a community of practice or 'buddy group' to enable them to unpack ideas.

The problem with unclear writing is that it is actually a voice issue. They have depended too much on someone else's writing and they haven't worked out in

their own mind and reinterpreted that for themselves. I say 'Tell me in your own words' and it comes out completely differently. We sit down side by side. "So here I don't know what you are talking about, can you explain this to me?'. Then I say "Fantastic, you **do** know what this means! I want you to write it down like that!" (Supervisor F).

The temporal component: The nature of feedback changes with successive drafts

The fourth idea emerging from the analysis of the interviews is that some supervisors acknowledge that the nature of their feedback needs to change as the writing process unfolds with successive drafts. Two supervisors (Supervisors J and L) indicate this is an important aspect of their feedback practice.

Supervisor J's feedback is mixed. Although he comments broadly, (his feedback ranges from comments on grammar to structure and argument), but his starting point is 'writing errors', particularly in the first chapter.

If I see a draft that is wrong I will help with structure and with errors in their writing. I like to do it chapter by chapter as it makes the comments more coherent. On the first chapter I go through it very carefully, tidy it up look at the use of grammar and I comment. I comment on all levels- it will be on the basic use of language, how to structure your writing, how to create a strong argument, factual details in the text (Supervisor J).

In later feedback on whole chapters, Supervisor J's focus shifts away from superficial aspects (e.g. spelling) to more conceptual matters.

In chapter by chapter feedback, I make sure that they have covered their bases and that they are on track for a first draft conceptually. I spend less time with spelling errors and things like that. As for stylistic issues, I might do the first few pages and then suggest they do the rest themselves (Supervisor J).

In contrast, Supervisor L reverses the process. She claims to start with 'big-picture chunks' and in later drafts shifts her feedback to editing- what she terms 'nit-picky stuff'.

In the beginning, if it's the first draft, I would say "Suggestion-tighten this, fix this, this is in the wrong place". So big picture chunks. But as it gets closer and closer to the end, then you start to edit. You are actually doing nit-picky stuff! (Supervisor L).

A third supervisor, Supervisor G, indicates in the quote below that he is clear about what he won't do as a supervisor with regard to feedback on the first draft. He is, however, prepared to edit grammar from the outset. He places emphasis on style and makes suggestions regarding the analysis.

In the first draft I won't rewrite sections for them and I won't give them examples. I will give them comments as to why/what I think is wrong e.g. "the analysis you have done is superficial, you need to be able to justify every conclusion you make from the data, you have completely lost the plot". Then I will try and edit grammatical things. I am quite pernickety about style, so I will tell them what I don't like about what they are doing (Supervisor G).

It is interesting to note that many of the supervisors were unable to articulate the general nature of their feedback practices clearly. Some admitted to not having given them much thought.

I don't have a clear idea of what I do when I give feedback- I just do it. I depends..... (Supervisor D).

Certainly the majority of the supervisors struggle to explain whether their feedback changes with successive drafts and more importantly **how** it changed (if at all). Thus it is important to note that space and time play a role in written feedback to students.

5.2.4. Analysis of Three Examples of Written Feedback Based on Kumar & Stracke (2007)

So in order to highlight three different instances of feedback practice, three examples of written feedback from three supervisors are classified using a feedback taxonomy based on Kumar and Stracke (2007). Each of the three examples of written feedback discussed here are drawn from different but critical stages of postgraduate students' research available at the time. Thus the number of these examples is limited. The first example considers feedback on a **Master's proposal**, the second example investigates feedback on the **first full draft of a student's Master's thesis**, and the third example concerns feedback on the **final draft of a PhD before hand-in**. These three examples show that feedback **may** vary according to the stage in the research writing process. The examples also indicate that some feedback may be less appropriate at a particular stage of writing. Each feedback statement made by the three supervisors was coded using the Kumar & Stracke (2007) taxonomy (explained below) to investigate the nature of the feedback. The intention of this aspect of the research is to illustrate three different instances of supervisory practice at three different points in the postgraduate writing journey.

Feedback on a Masters proposal

The first of the three examples is that of feedback on a **Masters proposal**. Supervisor C's feedback to Student C8 on her MSc proposal (analysed using the Kumar & Stracke (2007) taxonomy to discern the nature of the feedback). In this taxonomy feedback is divided into three functions: referential feedback (information messages), directive feedback (action-oriented feedback), and expressive feedback (indicating the supervisor's feelings).

Each of the three functions is again subdivided into a further three categories – giving a total of nine sub-categories as follows:

- Referential feedback
- Editorial
- Organizational
- Content

- Directive feedback
- Suggestions
- Questions
- Instructions

- Expressive feedback
- Praise
- Criticism
- Opinion

Kumar and Stracke (2007) also classified the feedback according to its position in the writing as either in-text (margin) feedback or overall feedback. These positions are then combined to give an idea of the landscape of the total feedback according to the three functions listed above. The classification of Supervisor C's comments on the **Masters proposal** is indicated in Table 8 below.

Table 8: Supervisor C - Feedback on an MSc Proposal

Function	In-text/margin feedback n=179	Overall Feedback n=39	Total Feedback n=218
	No and %		
Referential	139 78 %	2 5%	141 65%
Directive	29 16%	33 85%	62 28%
Expressive	11 6%	4 10%	15 7%

When Supervisor C's comments on the MSc proposal are classified, it is interesting to note that in-text referential feedback consisted of 78% (139/179 comments) of all in-text comments made. This feedback consists mostly of editing of sentences and replacement of words (126/179 comments). Very little feedback is offered with regard to the two other referential components - organisation and content. The directive and expressive feedback functions account for only 22% of all in-text comments compared with the 78% referential comments referred to above.

As previously highlighted, poor grammar may improve with clarity of thought (Dunlap, 1990), thus the predominance of straight editing on the proposal is of concern. If supervisors edit first drafts to this extent for surface-level errors, they run the risk of wasting their own time and that of the writer. Big picture feedback (feedback on structure and clarity) is considered by Brown (1994) and Bean (2001) to be more useful in the initial stage of the writing process (See Figure 10 on page 144). In addition, too much feedback on superficial aspects such as poor grammar can be overwhelming for a student, particularly at early stages of the research journey.

Of the overall feedback comments, directive feedback (consisting mostly of instructions) is by far the most prominent (85%). Wang and Li (2011) indicate that if students are given repeated directive feedback to act on, over time the development of their writing in terms of 'critical thinking and advanced academic skills' may be impeded. It is clear from the analysis of feedback on this Masters proposal that Supervisor C concentrates on superficial surface-level feedback. This analysis is consistent with the views expressed by Supervisor C in the interviews and which have been referred to earlier in the chapter.

In the quote below, Supervisor C alludes to his use of overall comments, his use of expressive comments ('I start with a positive') and that he concludes with in-text comment 'page by page'. He is aware of the impact of his feedback on the student and consciously encourages the student. Given the detailed nature of his feedback, this is an important aspect of his feedback as students often feel overwhelmed when faced with copious feedback.

I normally start with the overall picture of what is being presented and I start with words of encouragement, no matter how bad it is. I like to make the student feel there is something of value because it is awful sometimes when they receive their first draft back and it literally looks like it has been torn to shreds. I also end off on a positive note. So I start with a positive and then say my general concerns are in these particular areas e.g. our writing style is too vague or too long-winded or too repetitive. I often come back to these

with particular examples as we work through the document. Then I work through the document page by page (Supervisor C).

If this view is contrasted with the analysis of feedback comments given to Student C8 in Table 9, the enacted practice in this particular case is not dissimilar to the surface-level feedback practice espoused by Supervisor C in that expressive feedback makes up 7% of the total number of feedback comments while the majority of comments are referential (65%).

Feedback on the first full draft of a Masters thesis

Analysis of feedback from a second supervisor (Supervisor F), also shows some interesting trends when feedback on the **first full draft** of a student's Masters thesis (Student F3) is analysed using the Kumar and Stracke taxonomy- see Table 9 below.

Table 9: Supervisor F - Feedback on the first full draft of a Masters Dissertation

Feedback	Intext/margin	Overall Feedback	Total Feedback
Function	feedback n=192	n=14	n=206
	No and %		
Referential	88 46%	0 0%	88 43%
Directive	73 38%	9 64%	82 40%
Expressive	31 16%	5 36%	36 17%

Analysis of in-text feedback from Supervisor F shows 46% of the feedback to be referential and 38% directive. In-text expressive feedback trails referential and directive feedback at 16%. Overall feedback shows an increase in directive feedback from 38% to 64% with many comments phrased as questions by the supervisor. As to be expected referential feedback drops substantially from 46% in the intext/margin feedback to 0% as an overall comment. Expressive feedback rises from 16% (in-text/margin comments) to 36% (overall comments).

So when total feedback is considered, referential feedback (43%) is closely followed by directive feedback (40%) with a much smaller 17% of feedback classified as expressive. Given that Kumar & Stracke (2007) found expressive feedback to be most useful to the PhD student in their study, the low percentage of expressive

feedback may seem low. However given the context (first full draft of a Masters thesis), it is not surprising that referential and directive feedback remain the focus at this stage of the student's research writing journey.

Feedback on the final draft of a PhD thesis

The changing nature of feedback at different stages of the research journey is further considered in a third example - that of comments on the **final draft** of student L2 By Supervisor L before hand-in of a PhD. When the Kumar and Stracke taxonomy (2007) is applied to these comments, it is clear that this supervisor offers successively less feedback on each chapter of the final draft. At the beginning of each chapter there are several in-text comments, however comments tail off in all chapters (after a few pages) to almost nothing. In addition the feedback is often superficial, mechanical and repetitive (e.g. comments on use of space, and ticks indicating praise). This diminishing feedback tendency is evidenced in Table 11 below.

Table 10: Supervisor L – Feedback on a final draft of a PhD

Function	Intext/margin	Overall Feedback	Total Feedback
	feedback n=63	n=7	n=70
	No and %		
Referential	32 51 %	0 0%	32 46%
Directive	12 19%	5 71%	17 24%
Expressive	19 30%	2 29%	21 30%

This supervisor makes comparatively few in-text comments (63) and even fewer overall comments (7). The majority of the total feedback on the final draft is referential (46%) followed by expressive (30%) and then directive (24%). The finding that referential feedback takes precedence is in accord with the finding that of Kumar and Stracke (2007) in their study of a single PhD, where referential feedback, followed by a joint percentage of expressive and directive feedback took place. In this case study, expressive feedback takes second place. Stracke and Kumar

(2010) point out that expressive feedback is of paramount importance in selfregulated doctoral learning.

Although it might be assumed that by the time a final draft of a PhD is submitted, very little feedback is required. The paucity of comments, particularly at this crucial stage of the writing process, is noted. The comment by Student 2 quoted below clearly indicates that this student has experienced this type of feedback throughout the PhD writing process and has noticed a fall-off in the number of comments offered by the supervisor over the course of the PhD:

"My supervisor tended to give a few comments and then it rapidly decreased. It was just a language edit and comments saying I dwell too much on the negative. Mostly my supervisor only looked at each of my chapters once until the final draft. Sometimes I waited a long time and got no feedback unless I asked for it (Student L2).

On reflection, an analysis of supervisor feedback using the Kumar and Stracke (2007) taxonomy gives a good indication of the nature of the feedback offered by these three supervisors at different stages of their students' writing journey. A clear picture of the patterns of feedback particular to a supervisor may enable useful reflection by the supervisor, leading to improved and more appropriate feedback. One of these supervisors (Supervisor C), when offered this analysis, expresses appreciation for this research and concern at the nature of his feedback, and is keen to engage in further discussion regarding his feedback practices. In an email to the writing co-supervisor he writes:

Thanks for your input on my feedback. I didn't realise exactly that I was doing this. I would like to chat sometime regarding these issues (Supervisor C)

These three examples of the feedback analysis paint a snapshot of how three different supervisors approached their feedback at different stages of their postgraduate students' writing journey.

5.3 Feedback Issues raised by Supervisors and Students

In the course of interviews with supervisors and students, several concerns are expressed with regard to feedback. Issues raised by both parties include editing and the use of outside editors. While supervisors raise the issue of reliance on the supervisor and failure of students to heed feedback, students are concerned about overwhelming feedback, feedback that is difficult to understand, and feedback disparities between co-supervisors.

5.3.1 An Issue raised by both Supervisors and Students: The Editing Debate

Many supervisors express concern as to whether editing should be considered part of the supervisory role. The University Standing Orders on Higher Degrees (A 12.3) do not offer clear guidelines as to whether editing is required of supervisors. "Supervision entails both oral advice on the candidate's research and constructive written comments on drafts of the proposal and on draft chapters". The Statement of Principles for Postgraduate Supervision (S2007/476B) which is a contract between supervisor and student states that "detailed correction of drafts and instruction in aspects of language and style are not the responsibility of the supervisor". In fact the majority of supervisors do edit their student's work at some stage, usually towards the end of the writing process. This reflects the feedback practices uncovered earlier in this chapter in that the majority of the supervisors do not see editing as important in their feedback practice, except for a few supervisors who do initial editing as 'a way in' to offering feedback to their students. Supervisors are cognisant of the fact that the quality of the thesis reflects to a certain extent on the input from the supervisor. This idea ties in with the findings of Aitchison et al. (2012) who found that supervisors felt responsible for the calibre of the students' writing.

Supervisors who concentrate on surface-level feedback (such as Supervisor C below) are the ones who edit more comprehensively and see editing as part of their supervisory responsibility.

I like to have a perfect document. So before the student submits I normally am the one that does all the nitty-gritty editing. I know it is not my role. I

know that as supervisors we are not required to do this, but as supervisors we have to ensure that a sound document goes through. So then you might have to ensure that the student gets some outside help. It is often a problem with finances for the student. When the student has submitted their first full draft, there are often structural changes and they re-submit. Then in the last draft I fine tune (Supervisor C).

Supervisor H claims to focus on the 'big picture' and 'logical flow'. Nevertheless, he also sees editing as part of his 'job'.

My role is to kind-of polish in a way that I can do relatively easily. I am not going to sit down and write this thing for them, but I will polish sentences, put little link phrases in, cross things out and move things around. As far as I am concerned it is still their work. I am doing it as my job. Most of the time I actually change text. Sometimes I put a question mark because I do not know what this means and I can't offer any suggestions (Supervisor H).

Another view is that if an outside editor is unable to work on flow and coherence effectively, initial superficial editing becomes the responsibility of the supervisor. It is unclear whether Supervisor B (see quote below) sees the editing responsibility to rest with the supervisor or the student.

I don't correct it unless it's a spelling mistake or something speedy. There is editing where there is actually the connection of coherence between the conceptual and the expression. That is where it requires work. I don't think you can send a piece of work like that straight off to the editor, because they won't be able to do it (Supervisor B).

The understanding of the link between thinking and writing also plays a part in the supervisor's decision of not to edit:

The reason I don't edit is that I am unsure whether they actually don't understand it, whether it's a conceptual versus a writing problem. I hesitate

because I am not sure for students where the appropriate place is for editing. It depends on the student (Supervisor F).

Supervisor K has a firm sense that copy-editing is not something he is prepared to do throughout the thesis. He is prepared to edit the initial chapter comprehensively to provide a model for the student. However he suggests that it is not the role of the supervisor to be responsible for more in-depth editing, such as that relating to structure. Although he recommends that students should be responsible for their own writing, he concedes that a student may have the right to make use of a copyeditor once the final draft is written.

I edit the first chapter very carefully so that they get the benefit of seeing the kind of changes I would like. My aim is to do it once and they will get it right from there. Not always the case, but what happens is that the chapters get progressively better and I have to edit less. Where it is the use of English then I will usually actually correct it myself but where the problem is structure (which is very common) often it's a question of paragraphs needing to be shifted around or sections to be moved. Obviously I will not do it myself but I will explain what I want. My feeling is that generally outsourcing stuff doesn't work. I can't imagine asking someone to edit a student thesis. I have seen that there are people advertising that the student can pay them to copy-edit their thesis. I wouldn't have an issue with a student doing that in the final draft. The supervisor's job is not to copy-edit but to show them how it should be done. If I get one of those riddled with typographic errors then I send it back and tell them to get it right themselves or get someone else to advise or to work with another student (Supervisor K).

Some supervisors edit grudgingly. The majority of supervisors view editing as a task to be undertaken by the writer, and failing that –an outside editor.

My supervisor didn't edit for me. He would say the section sounded terrible and I would have to fix it. Sometimes he would put in a comma or something (Student G5).

I don't do copy or micro-copy editing. I don't correct every mistake. I say "Check these -they are wrong all the way through". Ideally the student should be able to do it, but I find there are cases where the student has reached her limit and can't do any better or is incapable or has no time or has disappeared. Going through copy-editing from beginning to end. Hmmm...I try not to do it. I keep pushing the student to do it themselves. Ethically editing is a problem-you know it should be the student and the supervisor is not the editor. If they need an editor they should go and hire one. There are people out there who do that sort of thing. I don't think that's an ethical problem, but it shouldn't be the supervisor who does it for them because it's spoiling them in a way. We don't have time and secondly it sends the wrong message - that it is OK to hand over to someone else (Supervisor E).

Some supervisors take a firm stance on editing and do not see editing as part of the supervisor's responsibility but **do** recommend outside editing as useful. Supervisor A compares thesis writing with journal writing and suggests that when publishing, editing is a taken-for granted process and that this process is also applicable to thesis writing.

When I read a draft any obvious typos and things like that I start correcting but I'm mostly reading for ideas and structure. I am not a copy editor. I really think students need good copy editors. I think if they had someone fulltime doing that..... In some cases it's the difference between getting a second and a distinction. It's the polish on the thing. If you have the money! I don't find it an ethical issue to have a copy-editor. When a student becomes an academic and they start publishing books, they almost inevitably have copy editors. The copy editor is not there to produce the ideas and the structure. This is for the student (Supervisor A).

Supervisors with funds to spare may decide to engage outside editors. Two such supervisors (Supervisors G and L) consistently use outside editors and are prepared to pay for the students' work to be edited.

I don't do endpoint editing myself. We get someone else in to do that. I pay for editing. This edit is nothing to do with the science but is basically a tidy-up. ... If a sentence is more than two lines long I want it changed. It must be changed because then you are not thinking about what you are writing- you are basically waffling! The editor also checks to see that the paragraphs follow on logically from one another which is something I am supposed to check as well, but sometimes I miss stuff. If she thinks there are problems scientifically with the way things are structured, she will call me and we will work through that. Sometimes if it is draft no 9 she will sit with the student and work with them on a one-on-one basis with a particular section. Sometimes it can be shockingly expensive. It can be very, very time-consuming (Supervisor G).

I have paid for a proofreader out of my grants. That's an editing function. I found that quite useful because they are coming completely from the outside so they are not so connected to the context issues. As academics we tend to get very fuzzy and complicated. It is also good for the student to see another person found the same problems (Supervisor L).

Very few students expressed views with regard to editing. Student L2 expressed doubts as to whether editing was the responsibility of the supervisor. Student L2 claimed that her supervisor (Supervisor L quoted above) did not offer very much feedback (See Table 11 and comments on page 161), consequently, this mature student sought the services of an outside editor herself.

I didn't get very much actual support for my writing and I was forced to make use of an editor. I don't know whether this should be supervisor input? (Student L2).

The use of outside editors remains a controversial issue for a number of supervisors. The reasons for their stance on outside editors range from a decision never to use an outside editor, allowing but not encouraging outside copy-editing, to a firm argument against the use of editors as evidenced below:

I haven't ever suggested an outside editor at the end of the process. (Supervisor D).

My feeling is that generally outsourcing stuff doesn't work. I can't imagine asking someone to edit a student thesis. There are people advertising that students can pay them to copy-edit. I wouldn't have an issue with a student doing that for the final draft (Supervisor K).

There are problems with using outside editors at the end of the process, because sometimes the outsider doesn't understand the subject. They create problems in that respect. I think there are also problems in terms of...did they understand the referencing system and all that? I do not encourage people to do that (Supervisor H).

5.3.2. Feedback Issues raised by Supervisors

The main feedback issue raised by supervisors relates to the poor response of students to written feedback and the apparent reliance of students on supervisors to 'fix' their writing. The latter is a concern raised by a few of the supervisors. Supervisor D below comments that:

I want them the next time not just to rely on me . They must learn that these are the issues (Supervisor D).

Supervisors may have different expectations of the response of the student to feedback. If students are not appraised by their supervisors as to how they are expected to respond to feedback, issues may arise. The expectations of two supervisors (Supervisors E and L) with regard to the students' response to their feedback are detailed below.

But I try to be consistent and I change every single thing and point it out. Then I sit with them and go through it. If they come back to me and make exactly the changes I have suggested I tell them "No, you are meant to rewrite this". So they usually end up having to go to the Writing Centre (Supervisor E).

Supervisor E (above) indicates frustration when the student makes every small change exactly as suggested. The supervisor's suggestions in the written feedback could be confusing for the student as it is usually a given that suggestions made by supervisors are expected to be followed. However, at no stage is this aspect raised by the student and she appears unaware of the apparent frustration of the supervisor. The student appears totally unaware that she was expected to revise the draft in her own way and was not to follow the changes verbatim. This supervisor indicates that the Writing Centre appears to be the last resort for students in order to get feedback on their writing. Supervisor L (below) experiences a similar frustration when the student incorporates the suggestions made by the supervisor exactly as suggested.

Some students are really weak. We don't have subject, verb and object. We don't have sentences. I end up saying "why don't you try writing the sentence like this?" So you recraft the sentence. So what does the student do? They just go and write the sentence as you wrote it! It's not really a learning exercise. I don't know how to get round that basic grammar stuff (Supervisor L).

One issue that crops up repeatedly is that students do not heed the advice offered by supervisors in their written feedback to students. There is a frustration voiced by nearly all supervisors who become irritated when students repeatedly make the same mistakes. Supervisor A comments that:

The biggest irritation is correcting something on someone's work and explaining the problem to them, and then they come back and they are still making the same mistake! That's because they haven't bothered to read what you have actually said or listened to what you said about the writing. So you get someone making the same mistake again and again. Then it just gets irritating for the supervisor (Supervisor A).

Linked to the reliance of the student on the supervisor, is the idea expressed by supervisors that some students perceive supervisor feedback to be comprehensive and final, and that no further thinking/revision by the student is required

Usually the weaker students will take your handwritten comments and they will make changes to every single handwritten comment in the document, without engaging with the rest of the document. So unless you have flagged every single thing it will come up in later chapters, despite being told what I expect of them. They come back and say "There are changes in the new draft and I did all the changes you wanted in the last draft" (Supervisor G).

Supervisor J describes his frustration and that of the student in finding a way through the research writing process. He suggests that students look to the supervisor when really it is necessary for them to '*grapple*' with their research. He also raises the question of the ownership of the research:

I think they are too worried.... They think that there is a model – a perfect thesis out there that I am not telling them how to do and they need to sort of wheedle it out of me. They don't seem to understand that it's their work and they have to somehow grapple with it and come up with something that fits. It's not as if I have their thesis in my mind and they have to do x, y and z and I'll be happy. It's the conceptual problems – it's a bit like high school- there must be answers. So what is it – a model answer? They go away often very frustrated from my comments because they go away more confused sometimes (Supervisor J).

He goes on to comment that the student may be attempting to pass the buck to the supervisor for direction:

The first thing that comes to mind is not very complimentary at all, but I often get the feeling that the student is trying to find a way to get me to write the piece for them. They are sitting there thinking "Now how can I approach this so that he will tell me exactly what I have to do". Sometimes they succeed! (Supervisor J).

There is a feeling that there may also be unwillingness on the part of the student or even a lack of ability to work on the required conceptual level.

You give them the benefit of the doubt, you give them the tools, you work with them initially. If they then don't pick up and run, you can't change that and it's the end of the proposal in my opinion. Not only is the writing skill poor, but conceptually they haven't evolved. They are still unable to express what they are trying to say or they are just unwilling to. They just don't want to do that extra work (Supervisor B).

Supervisors indicate that there is a developmental process that is needed and that the reliance on the feedback may stem from a lack of initiative on the side of the student. Supervisor E suggests that it is not necessarily the weaker students who need constant reassurance and input from supervisors.

One thing I have not figured out how to deal with is how to make the high maintenance dudes more independent. I think a huge part of doing research is becoming an independent researcher and work around a problem without anyone telling you how to do it. It really is a crucial part of the learning process. Some students don't want to do that and you have to push them out of the nest. They constantly ask you to solve the problem. It's hard to know how to sever the tie. They want constant approval (Supervisor E).

Conversely Supervisor F suggests that she has had instances where more engaged students (not necessarily stronger students) will tell you what feedback they would like and they indicate specifically what they are struggling with in their writing. Supervisor F's approach mirrors that of Race (1998) who suggests that it might be far more useful to focus on what he terms the area of 'unconscious uncompetence' in order to arrive at 'conscious competence'.

I say "This is your opportunity to raise issues". So my feedback is to ensure they understand the question properly and then they go and write it up. I say that they have got to know what their strengths and weaknesses are, so that they can seek assistance. So few students are able to take up that challenge. Very few can identify what their strengths and weaknesses are (Supervisor F)

The apparent reliance on the supervisor may be linked to the students' anxiety about writing, and a lack of confidence in their writing ability.

I find I have a huge confidence issue when I sit down to write something. I'm like - Good Lord how did you ever get here?' How do I start? (Student E10).

You know what, usually when I have..., when I have started its easier for me to, its, the anxiety, I guess, I have this anxiety to begin writing but when I have started writing I kind of go on and I'm gonna tell myself that from here I just have to go over it over and over and over again so that it kind of makes a bit of sense to me, and try to work around it and it becomes easier that way (Student C8).

5.3.3 Feedback Issues raised by Students

Generally, with a few exceptions, the students indicate that they are happy with their written feedback. Three feedback issues are highlighted as problematic by some students: their fear of feedback, the quantity of feedback, and disparities in feedback where there is traditional co-supervision.

Students' fear of feedback

Students indicate that almost without exception they are nervous when the time comes to receive feedback.

One of the problems with this whole process is how petrified I am of who says it's good and it's not! So even when it comes back from the editor, I still go through it. I suppose it's a trust issue. The feedback that I trust the most is

from my supervisor. I am still quite nervous about my ability to write for my thesis (Student H11).

Students report that part of this concern is that often when offering feedback, supervisors omit to praise their writing when drafts reflect sound thinking and good writing. The issue of confidence is an important one here. Hyland and Hyland (2001, 207) in their study of summary comments found that praise may mitigate "the full force of criticisms and suggestions". They suggest that positive comments should be text-specific as a lack of confidence can hinder the progress of a student.

The quantity of feedback

A second problem raised by students regarding feedback is that the feedback may be intermittent and that it might be either overwhelming or scanty in volume. Some students disclose the feeling of being deluged with feedback comments. Bates et al., (1993) concede that a student may be crushed by extensive feedback. The finding that too much feedback is offered contrasts with that of Wadesango and Machingambi (2011) who reported that 40% of the postgraduate students interviewed in their research complained of too little feedback.

One mature student indicates that she only received feedback intermittently. This resulted in a feeling of being swamped by the sheer volume of the feedback when it did happen. This appears to result when supervisors prefer to see lengthy pieces of writing rather than shorter pieces more frequently. The comment below encapsulates the feeling of students on the receiving end of overwhelming amounts of feedback. Note also the reference to the fact that the feedback was in red!

My supervisor doesn't like to see drafts. So I got feedback on months and months of work. Tons and tons of red writing. It wasn't unhelpful but it was just overwhelming. 100 pages and there is just red everywhere (Student G5).

Sometimes students write too much and struggle to identify the pertinent issues in their writing. Student L2 comments below on her difficulty in dealing with the size of her research.

My primary research just grew completely out of control in terms of its size and I wanted some input in terms of how to narrow it down and how to process this information. I didn't find that I got this help. I had to deal with this myself. No help! (Student L2).

Feedback difficult for students to understand

Good feedback can be described as understandable, offered at the appropriate time and taken on by students (Gibbs and Simpson, 2004). Student H11 below indicates her frustration and her 'aha' moment.

I never understood what my supervisor was talking about because on the surface it would all make sense. I would read it and come back and use the same style. The penny dropped when I took a research writing course. It's all about voice and I hadn't found my thesis voice. When I went back to the drafts I could completely see where I wasn't connecting a thought. Very disconnected with no flow of ideas – nothing (Student H11).

For this student the feedback message remained unclear, possibly since the supervisor may have found it difficult to convey his ideas regarding flow and voice in an accessible manner. It was only after a writing course that the student realised that her work lacked coherence.

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Feedback disparities between co- supervisors in the traditional model

The age-old issue of disagreement between co-supervisors operating in the traditional continues. Conflicting feedback from co-supervisors in the traditional co-supervision model remains a perennial problem for students. The problem is exacerbated when the co-supervisors do not meet at the same time with the student. One student reported on the unhappy relationship which may arise between supervisors and which impacts on the response of students to feedback.

There were problems with the two supervisors so I went with the primary supervisor. He would say "This sentence is a load of rubbish. Where did you get this from"? I would say "From the other supervisor". He would say "What does she know...?" (Student G5).

The problem of disagreement and tension between supervisors as well as the issue of students' having to 'manage' relationships between their co-supervisors concurs with the findings of Wadesango and Machingambi (2011) at some South African universities.

5.4 Conclusion and Recommendations for Feedback Practice

It is clear that there are a range of feedback practices used by supervisors. It is important to ensure that the nature of the feedback is both appropriate to the stage of the research process and to the needs of the individual student. One size 'does not fit all '- for either students or supervisors. Each has their own individual way of communicating and responding to writing. The majority of the supervisors recognise that in addition to written feedback, one-on-one discussion with their research student supplements and clarifies written feedback. Given that feedback practice is diverse, it is still possible to detect three patterns of feedback: big picture feedback; superficial surface-level feedback; and a combination of the two – mixed feedback. The majority of the supervisors interviewed in this research claimed to use mixed feedback as their modus operandi.

Big picture feedback is extremely useful, particularly in the beginning stages of the research, but also throughout the feedback process. Feedback on coherence is also vital. These aspects should not be overtaken by the inevitable urge for supervisors at all stages of the students' writing to engage in surface-level feedback such as grammar and spelling. An indication of global errors is useful but should not become a repetitive function. Editing remains a controversial issue for both students and supervisors. Although editing is used as a 'way in' to giving feedback for a couple of supervisors, the question of whether editing is part of a supervisory role remains open to question. The decision to use outside editors is also problematic for many supervisors and their students. There is no consensus around engaging outside copy-editors. In addition, there is also a financial aspect to this decision as

not all supervisors who use outside editors are prepared to pay for this service for all or some of their students.

It is nevertheless of interest that only one supervisor commented on the importance of argument in giving feedback. Argument is considered to be an integral part of research writing. In doing this, the writer constructs a position and endeavors to convince the reader to accept the stated viewpoint. Supervisor K says:

I comment on the basic use of language, how to structure your writing, how to create a strong argument, and factual details in the text (Supervisor K).

Kamler and Thomson (2006) suggest that one way of assisting students to develop argumentation skills, is to practise abstract writing. These are termed 'tiny texts' by Kamler and Thomson (2006, 85), who argue that abstracts condense argument into a 'small textual space' and that abstracts have extensive pedagogical importance. A further feedback strategy stressed by Kamler and Thomson (2006) is to concentrate on the moves contained in the research argument. A good strategy is "to map the moves of the argument; to see how it is set up, staged and substantiated to allowing convincing claims to be made" (Kamler and Thomson, 2006, 91).

Good feedback is focused, appropriate, tactful, constructive, and does not overwhelm. In practice, less feedback is preferable. This enables students to focus and to move on with the development of their writing. This research highlights that there may be dissonance between the feedback experiences of supervisors and their students. Supervisors have some idea of their feedback practices but many cannot articulate their practice clearly. One possible solution is to open up a shared metalanguage around feedback between supervisors and also between supervisors and students. The use of a shared metalanguage around feedback using the new feedback framework suggested in this study, or a taxonomy such as that of Kumar and Stracke (2007), will allow supervisors to reflect on the nature of their own feedback and to discuss their feedback with their students and with colleagues, thus opening a space for improved and more useful dialogue.

Chapter 6: The Writing-centred Co-supervision Model

6.1 Introduction

Given the findings in the previous two chapters regarding postgraduate writing and written feedback, this chapter investigates the implications of a new writing-centred co-supervision model for the development of postgraduate writing. This chapter thus addresses the third research question.

This new writing-centred co-supervision model is a model of co-supervision with a research supervisor and a supervisor who is a writing specialist *both located within* the discipline with a joint and equal responsibility to supervise the student. This model is different from other versions of writing supervision models which have a writing specialist located outside the discipline (and who may lack specialist disciplinary knowledge) and a content specialist inside the discipline (Cadman 2005; Aitchison and Lee, 2006; Chanock, 2007). In this new model of co-supervision the 'research' supervisor concentrates on content issues while the 'writing' supervisor assists with the development of the student's research writing. I am the writing supervisor and also the researcher reflecting on my practice in this writing-centred co-supervision model.

Data was collected in the form of interviews from the research participants who consisted of five content co-supervisors and six of their postgraduate students together with the writing co-supervisor (the researcher). Five of the students were working on their Masters while the sixth student was registered for a PhD (See Table 11 below). In addition several email interactions between co-supervisors added to the data from both supervisors and students as well as fieldnotes and researcher reflections.

Table 11: Content Supervisors, the Writing Supervisor and their Students

Content Supervisor	Writing Supervisor	Student	Degree
Supervisor C	Researcher	Student C8	Masters
Supervisor D	Researcher	Student D7	Masters
Supervisor E	Researcher	Students E4 &	Masters
		E10	
Supervisor F	Researcher	Student F3	Masters
Supervisor J	Researcher	Student J6	PhD

6.2 Background to my involvement as a writing specialist

In the writing-centred co-supervision model I am the writing specialist/writing cosupervisor. For many years I have been involved in academic development and in academic literacy - initially at the foundation level in two year-long discipline-based foundation courses one based in the Humanities and one in Science. Later my interest in academic writing led to the development of my work at the postgraduate level. My original interest in academic writing began when I was appointed as an academic development tutor tasked with the initiation of an Academic Development Programme for first year students in a discipline based in the Science Faculty. This quickly led to the development of the first foundation course offered in the university to students from disadvantaged backgrounds. My decision to take up this appointment was based on my strong determination to assist in redressing the detrimental effects of apartheid education. My appointment was a contract position sponsored by the Dutch government's anti-apartheid fund and later by the Kellogg Foundation. After three years my position became a tenured one in faculty. The experience I gained in setting up two writing-rich foundation courses in both the humanities and science faculties led to my interest in working with the development of research writing in a new community - that of postgraduate students. I realised that the academic writing concerns evident in the early stages of an undergraduate student's writing development have some similarities to those experienced at postgraduate level, albeit at a different level.

The idea of a non-traditional writing-centred co-supervision model came about when two supervisors in a traditional co-supervision model were frustrated in their attempts to work with the writing of an MSc student. This student had English as an additional language and his writing was seen as poor and largely incoherent by his supervisors. Both supervisors were undecided about the research future of this student who was

halfway through writing his chapters. At this point, in an attempt to resolve their dilemma, they decided to call me in as a third supervisor because of my experience in developing students' writing. This initial collaboration resulted in the formal establishment of this new non-traditional form of co-supervision. This particular student's writing improved and he went on to graduate with an excellent report from the external examiner.

6.3 <u>The Writing-centred Co-supervision model: Context and</u> Rationale

The Writing-centred Co-supervision Model is characterised by three parameters:

- co-supervision
- · a focus on writing
- both supervisors located within the discipline

Co-supervision is increasingly advocated for a variety of reasons: enriched knowledge and critical input, diversity of opinion, and flexibility for leave for supervisors (Charlesworth et al., 2007). Co-supervision can be considered when specialist advice is needed - in this case advice on the development of the student's writing. Cummins' (1996) notion that language and content can be successfully acquired by scaffolding in the form of textual and linguistic support is of importance in this context. Aitchison and Lee (2006, 267) suggest that writing is deliberately or otherwise assumed to be "separate from the work of knowledge production and hence the practices of research, and understood in terms of individualised skills or deficits......Writing remains, by default and neglect, always subordinate to the main work of thinking and of knowledge production". The writing-centred co-supervision model is an attempt to restore research writing to its central place in the academic development of post-graduate students. The critique of outsider models of writing assistance - writing assistance from **outside** a discipline (Cadman, 2005; Hutchings, 2005) mentioned earlier in the literature (Chapter 2) informed my decision to embed the writing assistance offered within this insider approach. The new writing-centred co-supervision model was encouraged and supported by the head of the two allied disciplines which form the context for this work.

In this model of co-supervision the content and writing co-supervisors have a joint responsibility to supervise the student. The agreement that the supervision responsibility is an equal one was negotiated from the outset in an attempt to ensure that some of the power issues inherent in traditional co-supervision models are resolved. This was an important move as it was possible that the role of the writing co-supervisor could be downplayed and seen as 'band-aid' for struggling postgraduate researchers with no university credit given to the writing co-supervisor. Thus the distinct possibility was raised at the time that power issues between the content and writing co-supervisors might emerge. (Power differentials will be discussed later in this chapter). So it was agreed that the co-supervisors both have a 50% responsibility in the supervision of the student. However the roles of the cosupervisors differ: the research supervisor concentrates on content issues, while my role as the writing supervisor is to develop the student's research writing. opportunity to become involved in the writing-centred co-supervision model may initially be requested by the student or by the supervisor, however the student and both supervisors have to agree that it is the preferred supervisory option.

In this innovative non-traditional model the co-supervisors meet independently with the student. However the writing supervisor always meets with the student to develop the drafts of research writing **ahead** of the interaction of the student with the content supervisor. The writing supervisor defers to the content supervisor on matters of methodology and content. Given that the writing supervisor is within the discipline itself or closely allied to it, this enables her to raise a red flag with the student and suggest content or methodological changes to the student if needed. This allows the student the power to raise these issues with the content supervisor. This model differs from many of the writing development models at work in other universities, particularly those in Australian universities, where writing development may take place with support from outside the discipline itself.

Not all academic staff in the two disciplines decided to take part in the writing-centred co-supervision model, although there was uptake from several supervisors across the two disciplines. As the writing co-supervisor, I send out a yearly reminder of the offer to co-supervise and this results in discussion, interest and eventual co-supervision from colleagues. Once supervisors have experienced this co-supervision model, there are repeated requests from these supervisors for this form

of co-supervision. In several instances requests from postgraduate students also resulted in collaboration and their integration into the new model of co-supervision. Interestingly, on reflection, I became aware that new academic staff seldom took the opportunity to embrace this co-supervision model. I surmised that this was because they felt the need to establish their own supervision practices. At the other end of the spectrum, two of the content co-supervisors (both professors) each had more than thirty years of supervision experience. Being a partner in the writing-centred co-supervision model does entail that one's feedback practices are opened up to scrutiny by the co-supervisor and vice versa. This openness may have led some supervisors to decide not to participate in the model. In this respect Delamont et al., (2000, 134) comment on "a continuing lack of observational data on the actual conduct of the most private supervisory relationships". Goode (2010) suggests that recently the practice of supervision is opening up, with the emergence of a few observational studies of student-supervisor meetings, for example the work of Li and Seale (2007).

From the outset, this model of co-supervision was made available to all postgraduate students, including Honours students. However it takes time to develop postgraduate research writing, and for this reason, a decision was made once the model was put into operation, to offer this form of co-supervision only to Masters and PhD students and not to Honours students. Honours students have only one year to complete their research report and consequently the timeframe available to an Honours student for the movement of successive drafts between two supervisors and the student was too short to allow for meaningful writing progress. This accords with Turner (2004) who suggests that language is often seen as secondary to content in the academic endeavour and that the time it takes to 'come to grips' with language is often underestimated. To address the withdrawal of the writing-centred cosupervision model from Honours supervision, a week-long writing retreat for Honours students at proposal stage has been introduced. I lead this as the writing specialist and it is attended by staff members keen to become part of the move to develop postgraduate student writing.

Student E4 was one of the original Honours students who initially participated in the writing-centred co-supervision model. Her reflective comments, written at the end of

her Honours year, support the decision not to continue with the model at Honours level.

The negative aspect of the experience was the pressure to complete drafts earlier. My main supervisor needed a week to read my draft and make comments so I had to give my draft to the writing supervisor a week earlier than that so that she would have enough time. The added time constraint increased the pressure on me in my Hons year and I was unable to give the writing supervisor any drafts of my final research that included my results. I imagine this pressure will not be as great for my MSc (Student E4).

It is important that the writing-centred co-supervision model should NOT be seen as a remedial model for students with English as an additional language as there is a danger that this might lead to the retention of existing inequalities related to educational background and home language. I have had to be careful in this regard because some academics start supervising students and when they find that their writing does not meet supervisor expectations, they send the students to me. I insist on being involved from the outset, (and certainly from proposal stage) with any student who feels that writing-centred co-supervision would be advantageous to his/her writing development.

Structure and Coherence

From the outset, as the writing co-supervisor, I reflected on some of the key points of my practice and what I considered to be important in terms of the model. I consider clarity and structure to be critical elements of this. It was also valuable to evaluate the role of editing and how I would deal with student expectations of this aspect.

What I am doing is looking first and foremost at clarity. I have the time to say to the student "This is vague and unclear and non-specific. What do you really mean here? Then we talk about it and the student redrafts there and then. I am looking at conventions of writing - patterns of writing that make it easier for the reader to follow the logic. I show students how these work in the readings they do and then how to mirror these patterns in their writing. Simple patterns- such as moving from the general to the specific in a

paragraph are important for students to identify. I start at the meta-level. Grammar is the last thing although I will pick out recurring errors. I try very hard not to start with these. I do not wish to edit! The literature tells us that when there is no logic, coherence or flow, it is because the student does not yet have conceptual clarity (Dunlap, 1990). The student is not yet able to articulate clearly what that understanding is. The confusion creates a kind of grammatical mess...so starting with the grammar is a waste of time. It's the conceptual issues that are important (Field notes, Writing co-supervisor).

The writing process

The writing process in the writing-centred co-supervision model starts with the student working with the writing supervisor on the draft proposal. The student then redrafts based on the feedback from this supervisor. The content supervisor is kept in the loop by the writing supervisor who communicates issues of concern identified and raised with the student by emailing or meeting with the content supervisor. The student does not receive these emails as they may (very seldom) include sensitive discussion between supervisors.

It is useful quite early on in the process, once we have had samples of the writing, for the content and writing supervisors to meet separately from the student to have a discussion about the student and any issues (Supervisor F).

The student then submits a revised draft to the content supervisor and, after again redrafting based on content feedback from the content supervisor, returns to consult with the writing supervisor. See Figure 9 below.

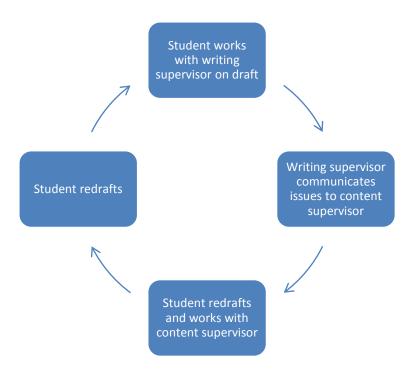


Figure 9: The cyclic writing process in the writing-centred co-supervision model

Thus there is a formal academic space allocated to the revision of student drafts with an acknowledgement that the timing of the redrafting process is an important component of the writing-centred co-supervision model.

This writing process is described by Student C8:

I see my writing co-supervisor first. We go over the comments she makes and obviously I do the corrections and whatever it is that I have spoken with her. She will communicate with my content supervisor and he will tell me "I talked with your writing supervisor and I know what you need to do". So he knows what I have talked about with the writing supervisor. After meeting with the content supervisor it goes back again to the writing supervisor. So it's a cycle (Student C8).

6.4 Responses to the model from supervisors and their students

For the majority of the co-supervisors the notion of equal supervisory responsibility is clear from the outset. They also see the advantages of the co-supervisor being within the discipline. Supervisor C implies that he sees mutual benefit emerging for the writing supervisor, the content supervisor and the student.

I see the advantage of the writing supervisor being in the discipline. If you are giving some content input you might pick up something that I as content supervisor have missed. I can learn from you as you show the student how to do something differently. I may also see language issues that you don't see. We gain and the student benefits. I am delighted if you pick up content issues! I think you are looking at language issues in terms of how to write coherently and bring a message across. You help the student with sentence construction and what constitutes a good paragraph (Supervisor C).

There is a sense from this supervisor that the roles of the two supervisors may become blurred despite the intention to separate them. This may well be seen as a positive spinoff in that it might lead to the content supervisor starting to take more of an informed role in addressing writing issues with research students. Nevertheless, the majority of supervisors taking part in this model (and those in the traditional supervision model) do not necessarily see addressing writing issues as part of the supervisory role.

In fact, the university statement of agreed principles for postgraduate supervision contains the following:

The supervisor will provide advice that can help the student to improve his/her writing. This may include **referrals** for language training and academic writing. The supervisor will provide **guidance on technical aspects** of writing such as referencing as well as on **discipline specific requirements**. Detailed correction of drafts and instruction in aspects of language and style are **not** the responsibility of the supervisor (Statement of Principles for Postgraduate Supervision, Point 5 for Supervisors).

It is disappointing that there appears to be little room in the principles quoted above to include the **development** of a student's writing as part of the remit of supervisory work. Given the statement above, there is also an institutional silence as to who might assist postgraduate students with the challenges of research writing.

The possibility of overlapping and discordant feedback may be possible when two supervisors in the traditional co-supervision model offer comments simultaneously to

the student. Due to the rotational process of giving and receiving drafts this possibility is vastly diminished in this non-traditional writing-centred co-supervision model, particularly if the roles of the two co-supervisors are seen as distinctly different. In the quote below Supervisor J indicates this as well as an understanding of the developmental nature of the work of the writing supervisor.

Contradiction seldom happens in the writing co-supervision because the student sees the writing co-supervisor first. This allows space for the content supervisor because the development of the writing is an ongoing thing and one doesn't cover all the gaps in one go. (Supervisor J).

Efficiency and more frequent writing

Despite the observation that in total more time is spent supervising a student in the writing-centred co-supervision model, one of the advantages of the writing-centred co-supervision model, perceived by both students and supervisors, is that there is **constant** attention given to writing. The student now writes more frequently and receives far more feedback than in a traditional co-supervision model (See the quote below from Supervisor C in this regard). In the traditional co-supervision model supervisors very often see good practice as meeting together with the student and offering joint feedback. This is not the practice in the writing-centred co-supervision model where there is a clear process of drafting and separate submission to the two supervisors.

Supervisor C perceives the co-supervision model as efficient in several ways. Students manage their time more efficiently; they write more often and more consistently; and they receive more focused feedback from each of the two supervisors. In the quote below, Supervisor C comments positively on the efficiency of the supervision model and also alludes to the vast improvement in the student's writing since the student agreed to working with a writing supervisor in her Masters degree.

Co-supervision may be more labour-intensive for the student. If we added up our hours then we are spending more time with the student. Because the outcomes are much greater, I think this is an efficient model. The student has

to manage her time better because they have to have a process of drafting for one supervisor, then re-drafting for the other. So they tend to be writing more often and more consistently. They are getting more input. The disadvantage is that we have to be quite careful to track where we are in the process between two supervisors. Student 8's work has improved beyond belief as you have co-supervised her in her Masters. When I think how I struggled with her Honours writing. I wondered how I was ever going to get through to this student (Supervisor C).

Supervisor C believes that the co-supervision model saves **him** time personally despite the fact that he suggests that '**we** are spending more time with the student'. He suggests further (see below) that the model is also efficient in view of its enhanced outcomes. It is clear that Supervisor C considers that the model allows him more time to spend on 'the more academic and structural things' that he now has time to engage with. Nevertheless there remains a niggling sense that he may consider language issues to be less 'academic' than content issues....

I feel there are tremendous advantages having a writing co-supervisor. I am not having to deal with a lot of the English language issues. I won't ignore them if I see them, but these problems are big and of major concern to us. I can now spend more time dealing with the more academic and structural things as I can do these better now that you are freeing up time for me to engage with these issues. If I didn't have you as a co-supervisor I would end up spending a lot more time dealing with the things you are handling - with the consequence that I could overlook some of the other issues (Supervisor C).

Supervisor F agrees that having a writing co-supervisor 'lessens the load' for the content supervisor. (This advantage is also corroborated by Student D7).

The huge advantage for me was that I didn't have to think about the writing. I knew it was being seen to somewhere else and I didn't have to engage with that. I could just say 'problem' or whatever, and I knew that you as the writing supervisor would pick up and address it. It definitely lessens the load in terms of supervision. Then I can just get on with questions of content (Supervisor F).

So this model of co-supervision is efficient in that it allows the two co-supervisors to concentrate on two distinct aspects of the research process. The comment also made the point that more time might be spent on a single student when the input of both supervisors is considered, but that the overall end result of improved writing ability outweighed the disadvantages and justified the extra time allocated to the student.

There are advantages for the content co-supervisor, for now he does not have to look at writing style or grammar. I think he is just focusing on the content because there is someone else who is looking at the writing (Student D7).

For several students the idea of writing from the very beginning of their research journey was a new idea. The encouragement to write constantly was considered helpful, especially when the student was new to the research process. The constant movement of writing between co-supervisors ensured that students had to write often. Student C8 below relates how prior to joining the writing co-supervision model, she was able to 'manipulate' her writing deadlines.

I think the thing that really helped me, probably not the most but really made an impact, was when I started working with you and you giving me like exact deadlines - like chop-chop deadlines. Those were keeping me on my toes, those were very, very helpful. They were keeping me on your toes because I knew I had to keep on going, whereas with my other supervisors on the other hand, they would give deadlines and I would manipulate their deadlines, extend them by a month and relax and take it easy (Student C8).

Feedback and face-to-face consultation

The modus operandi for writing feedback in this model is that the student has oneon-one consultations with the writing co-supervisor, during which written feedback is discussed with the postgraduate student.

An important part of my experience was that the writing supervisor and I sat and discussed why I had written in the manner I had. Then we were able to decide how best to write what I **meant** to write in order to convey the meaning

clearly and concisely. She encouraged me to do this myself first, and then if necessary she explained how it could be improved. This has been extremely useful to me as I was able to understand why the changes were necessary and how to ensure that I didn't make the same mistakes again (Student E10).

Occasionally it is necessary for the writing supervisor to meet with the content cosupervisor to discuss feedback comments. The field notes shown below record such a meeting.

Met with Supervisor D to discuss my feedback comments. Clearly not au fait with concept of signposting. Discussed the description of technical ideas. Badenhorst (pers com. Research Writing Workshop 27 July) says the writer needs to prove to the examiner that she understands the concept of signposting and cohesion. Each concept must be fully described and explained (Field notes, Writing co-supervisor).

The development of student writing

In conceptualising the new writing-centred co-supervision model involving postgraduate students of all writing backgrounds and abilities, it has become clear that a focus on the following areas facilitates the development of research writing: content issues, structure, coherence and signposting, argument and evidence, voice, and common error identification.

Students who were part of the writing-centred co-supervision model were asked to reflect on whether the model was proving useful in the development of their writing. Student C8 first reflects on her work with the writing supervisor when halfway through writing her Masters research report. She alludes to structure, voice and audience as important issues in the development of her writing, as well as more superficial issues such as gaining knowledge of her common errors.

The writing sessions have helped me a lot in presenting my ideas in a clearer way. They improve not only the presentation of ideas but also the sequence in which ideas are presented and the way in which they will be understood by the reader. It helps in creating a mental note that we do not always write for ourselves but for somebody else to understand what we are saying. A writer

always knows what they want to say but the important part is in making other people understand. The one-on-one sessions help one to verbally communicate ideas so that it's easier to write them down. This does not only help with the task at hand but also with other work: it becomes easier to apply what has already been discussed in the writing sessions.

One easily realises the mistakes one does when writing. These sessions help to improve the things we take for granted like language, tense and punctuation. People sometimes have habits when writing, like over-using a phrase or word. The sessions help you remember that there are other words and phrases that can be used without creating monotony in writing. Writing becomes more interesting and less daunting (Student C8).

Later at the conclusion of her Masters, Student C8 again offered a reflection on the relationship between herself and the writing co-supervisor. This student had suffered from writer's block several times during her Masters journey. Badenhorst (2007, 2) suggests that we need to cultivate a writing identity – "The more we see ourselves as writers as well as researchers, the more we encourage writing habits". I had encouraged her to see herself as a writer.

What has helped me the most are the writing sessions with you the writing cosupervisor. I wasn't very conscious about my English - I thought I was. I
thought I knew how to write. After I started my writing sessions with you there
has been this light bulb going on! You encourage. You encourage me just to
start. That is amazing. From the very beginning you said "Whatever you
have in your mind just write it down". Even if it is disorganised, I will try and
make sense of it. Most of the things you say have helped. There is this word
I loved to use and every time I do, I hear your voice saying "You use this quite
a lot!" I am very conscious of tense and sentence and paragraph
construction. My paragraphs used to be haphazard and we talked about that
they had to be structured. I like what we said - what we talked about the other
day - that I should really find a meaning in what I am trying to say and try to
say it in as little as possible without unnecessary words (Student C8).

The creation of a writing identity is linked to the habit of early and regular writing. 'Writing up' is seen by students as something that takes place once all data is

collected. So students need to be encouraged to write from the outset (Kamler and Thomson, 2007). Student D7 embraces this early writing process with enthusiasm. The attention to ongoing writing relates to the 'process approach' to writing. The 'process approach' to writing stands in opposition to the 'product approach' (Badger and White, 2000). The process approach focuses on the complex and reflexive nature of writing whereas the product approach emphasises the finished product.

I found, thanks to you (the writing co-supervisor) that writing as you go along saves a lot more time. It sort of helps you not to forget stuff. Even if it's a small idea putting it down on paper helps you to remember what it is and I think it makes life a lot easier. If I had to wait till I had finished with the data, then writing up everything at the end, then I think I will have a lot more work to do. I like writing on a small portion - a chapter (Student D7).

Students are often encouraged to think about their audience when they write. Badenhorst (2007) suggests that it is easier to write when the audience is considered to be 'safe'. Student D7 reflects at the conclusion of her Masters on the importance of the role of audience in her writing. She realises that she has a story to tell. She has also developed a sense of authority and ownership as part of her writing identity when she says that she often finds that she is able to disagree with her content supervisor with regard to her research.

When I write I often don't quite read my writing as an outsider 'cause I'm the one writing it. But from you (the writing co-supervisor) I get to see my writing from a different perspective -an outside voice. Then I see what needs to be added and what needs to be taken out. Generally it helps me figure out how to write for a wider audience and not just for myself. I have started to read what I'm writing. It has taught me to explain things a little bit more and to think about the audience. You give me ideas on how to express myself. It helps me to write better in that I get to tell my story and I find I can express myself better when you ask questions, because I realise "Oh, I can actually explain this in other words like this". I find it easier then to write from there. My content supervisor has his ideas of what's going on in the project and I find that often I don't agree with him. When I have to tell it to someone else like you, then I get to say what I really think should happen. I can now pick

out my own mistakes before you even point them out to me, so I think the repeated drafts are working - they are quite helpful (Student D7).

In one instance the writing-centred co-supervision model consisted of three supervisors; two content supervisors and the writing supervisor. Despite the possible problems that may have emerged from this number of co-supervisors, the experience appears to be a positive one for Supervisor J.

The writing co-supervision model is an excellent idea. I haven't seen any disadvantages for the co-supervisors. The PhD student with three supervisors – we are all picking up things that the other one is not necessarily mentioning. I think it's just a much more dense experience of supervision. They are exposed to very different ways of thinking. They learn a lot more and it shows in their writing. The depth increases (Supervisor J).

Student J6 is the PhD student who coped with having three supervisors. It is clear from her reflection that one-on-one discussion was key to learning to express herself clearly and succinctly. She suggests that the key to giving feedback is not necessarily 'what' to change but 'how' to improve.

The writing co-supervisor is sent from heaven! I used to submit chapters to my two content supervisors and got written feedback but we never really sat down and discussed verbally how writing was supposed to be. They can tell what's wrong but they probably don't know much to tell a student how to make it right. With the writing co-supervisor we sit down and she makes me read it aloud and then she says "What were you trying to say?" After a while you realise that OK, this is what all these other guys have been trying to tell me, except they don't know how to say it. All of a sudden you have somebody who knows exactly how to tell you to improve and you sit down and do it on your own. She guides you- not telling you. She teaches you the process (Student J6).

So one of the main advantages for students of the writing-centred co-supervision model is the availability of two supervisors - each with different roles, interests and knowledge.

Convenience: someone is always available to assist you; you get clear direction after getting advice from two people with different perspectives; so there is development - gaining more knowledge from the experiences of the supervisors. The outcome is improved- an improved and near perfect piece of work is possible (Student E10).

Conceptual and content issues in student writing

One of the interesting consequences of the writing-centred model of supervision is the spin-off for the content supervisor in relation to the conceptual material presented by the student. The writing supervisor concentrates on ensuring that concepts are clearly articulated in the students' drafts. Cadman (2005,130) suggests that academic development practitioners "have developed special skills in negotiating content understanding, both in speech and writing, where the writer is the field expert and the language specialist is a facilitator for the translation of a researcher's complex, often multi-lingually understood, ideas into comprehensible, disciplinary English". This idea is borne out by the reflection of Supervisor J below, where he contends that content supervisors take ideas very much for granted as they are au fait with the concepts in their area of research expertise. In working with the research writing of an allied discipline there were times when I, as the writing co-supervisor, requested more conceptual clarity in student drafts. The fact that I may not be an expert on all facets of the discipline enables me to ensure that the student writes as explicitly as possible by insisting on explanation of taken-for-granted ideas and assumptions. My involvement in the second allied discipline, where I may not be a content expert, results in a nuanced version of the model of a supervisor/consultant who is inside the discipline.

The improvement in writing has been incredible. I mean the fact that you may not be familiar with the material is a huge advantage because I have been missing half the stuff. Since we have been doing the writing co-supervision I have realised that I have been taking a lot for granted. We are talking about things that I breathe daily so I know what they are saying even if they have not said it correctly. So I miss it - I just gloss over it. You pick it right up

because it doesn't make sense. I am too familiar with it. I should be more rigorous and read it with the eyes of someone who has never seen the problem. I think it's good to have a reader who may not be technically familiar with the material. I think that helps the student communicate much better (Supervisor J).

One of the Masters students (Student E10) reflects on the process and experience of the interaction with the writing supervisor while writing her MSc thesis. She focuses on the improvement in the structure and coherence of her writing:

My MSc supervision experience began with the writing supervisor in my Hons year. She has been involved in improving the structure, language and grammar of both my Hons and MSc proposals. The most useful contribution was how to structure my written work. She pointed out that my structure of moving through global to a very local scale was not clearly outlined in my proposal, and that there were no connecting sentences at the end of the various sections. The reader would then find it challenging to understand the logic of the flow of the proposal. The writing supervisor did not just point this out but helped me to learn how to show the links between sections of my writing. The writing supervisor also combed through my draft and explained issues with my conceptual understanding, grammar and word usage and how I could improve my writing (Student E10).

Flow and coherence were also aspects commented on by the two external examiners when evaluating Student D7's Master's dissertation. They had this to say:

While the text is sparse and clipped, the structure of the dissertation is good and the logic of the chapter linkages is clear and well-managed (External Examiner 1).

I found the thesis to be very clearly organized and well-written (External Examiner 2).

Grammar and editing

So an advantage for co-supervisors in this model is that each supervisor is able to concentrate on her academic strengths. However there is a misperception regarding the role of the writing supervisor expressed by Supervisor E.

When it has been a co-supervisor who is primarily helping with writing and format, it has given me the freedom to concentrate more on content and not have to worry as much about grammatical and formatting errors (Supervisor E).

She believes that the writing supervisor should be concerned with *grammar* and *errors*. I consider these to be superficial aspects in the feedback process. It is far more important for the student to engage with the construction of concepts. As discussed earlier in the literature review, Dunlap (1990) suggests that when a student has a clear understanding of the concepts, the grammar invariably improves. The focus on grammatical and formatting errors is what Bean (2001) refers to as 'superficial error correction' and he suggests that this focus will not allow deeper and more complex thinking on the part of the student.

Editing is a contentious issue and one on which there is little agreement amongst supervisors as whether it is required of them as supervisors. As suggested elsewhere, some supervisors resort to outside editors while others feel duty-bound to accept editing as part of their supervisory role, particularly at the final stage of the drafting process. The editing function is evidenced in the feedback below sent in an email to Student 8 from Supervisor C regarding corrections to her MSc.

I am not entirely happy with a couple of the new sentences: P29 would read better as'...habitat fragmentation, which is compounded by..."

P33 'no impacts work in isolation...'=vague...what impacts. Also please change the end of the sentence to '...habitat loss, followed by a severe drought period' (Supervisor C).

This tendency to rewrite and correct student writing is also evident in the reports of some external examiners as shown in the example below.

P6 1st line 2nd par 'Geologically the rocks of Lesotho belong to the ...' (External Examiner 3).

The writing supervisor makes an explicit effort to **reduce** the emphasis on editing by the supervisor, and suggests to the students that editing is their responsibility. Initial and superficial editing by the writing supervisor is avoided as the focus is on the development of the ability of the student to self-edit as they develop self-knowledge of their abilities. The aim here is to move students from what Race (1998) terms 'unconscience uncompetence' to 'conscious competence' with regard to their research writing. Use is made of the 'Never Again Notebook' where a student notes repeated errors (and how to fix them!).

My Affective Role as writing co-supervisor and related gender issues

Cadman (2005, 35) suggests that English language teachers in Australia in tertiary education are predominantly middle-aged women sharing 'a strong nurturing imperative'. It has become clear that I, too, offer a nurturing supervisory role, and provide what Canagarajah, (2004, 191) refers to as a "safe house(s) in the contact zone". In addition to academic writing issues, personal issues often surface when I meet with students. The students often tend to turn to me, the writing supervisor, rather than to the content supervisor when personal life issues arise. Students indicate that they feel comfortable discussing these issues with me as they understand that personal stress may influence the progress of their academic writing. I have completed several university counseling courses and have an international life coaching qualification. The latter has proved significant in enabling students to take control of their goals - both personal and academic. My mode of supervision seems to resonate with Grant's (2005) depiction of the Psychological supervision discourse discussed in Chapter 2. In this discourse of supervision the supervisor is portrayed as "a source of motivation and support" (Grant, 2005, 340). On reflection this particular contextual position as a supervisor often relates to the supervision style of the content supervisor who may be seen to hold an alternative supervisory discourse. I have on occasion, had to deal with students in need of advice on how to 'manage' their supervisor. An example of my caring role reflected in my field notes and in a later email to Supervisor D was the meeting with Student D7 who confidentially discussed relationship issues and the resultant stress regarding her academic work.

She is very stressed due to friendship issues and there were tears! (Field notes, Writing supervisor).

When asked to comment on the future of the writing-centred co-supervision model, two content co-supervisors had this to say:

I don't think you will work yourself out of the writing co-supervision and it's very beneficial to pass on the writing information to the co-supervisors. You give us a good foundation and suggestions (Supervisor B)

Ideally what you want to be able to do is get supervisors to facilitate the writing process for themselves, but I don't think that all supervisors can do it, because it is not just about the technical things about writing. So it is never going to work for everyone (Supervisor F).

The perception that not all supervisors could take on the role of the writing supervisor is tied to the gendered perception of my role by a female co-supervisor:

I think also that confidence-building is really important. I also **do** think that it takes a particular kind of personality to help students in this way. I don't think I would be as effective as you (the writing supervisor) because you are very nurturing and encouraging. If you look at your other colleagues who do teaching and learning work, they are also approachable, whereas other academics are focused more on the actual research not on the transmission of 'how to' (Supervisor F).

There is an acknowledgement that students benefit from the attention and feedback offered by the writing supervisor. The intensive effort put in by the writing supervisor is also recognised. Aside from the development of the writing skills, this form of cosupervision is seen by content supervisors as engendering confidence in the students. Certainly, I make an effort to be readily available for consultation and I see the development of self-confidence by the students in their ability to express their ideas as critically important.

I think that most students really do need writing skills. They need to be able just to have somebody to sit with them and work intensively. So to have the knowledge that there is somebody who is actually dealing with it. I think that's nice (Supervisor B).

A second supervisor (Supervisor J) points to the idea of a 'space' for the thinking/talking/writing process.

They have someone who is both interested and informed. Yes, one of the things that is missing from our students' life is the opportunity to talk to other informed people about their work.... There is thinking and talking and writing, and sometimes we miss out the talking phase. It needs a space and the right time (Supervisor J).

The explicit nature of co-supervision in this model relies on the agreement of a 50/50 split between the writing co-supervisor and the content co-supervisor. If the perception of who hold the greater power in this relationship between co-supervisors becomes problematic, there exists the opportunity that the model will break down. In practice this has at times created tensions between co-supervisors. These have often been resolved by frequent (email) communication as to what aspects of the student's writing is being addressed by the writing co-supervisor. However, the fact that there is most often not a reciprocal action by the content co-supervisor points to his/her perceptions of power as unequal despite the initial agreement.

Knowles (2007, 247) suggests the power relations inherent in the supervisor-student relationship show a practice that is "less orderly, transparent, reciprocal and equal" than assumed. In the case of the writing-centred co-supervision model an attempt has been explicitly made to open up the power relations between supervisors and students as well as between co-supervisors. Knowles' (2007) position is in agreement with that of Grant and Graham (1999) who suggest that the domination-submission notion of the power relations between supervisor and student may be simplistic in that the student in this context is not necessarily disempowered. Using Grant's (2007) discourses of power as a framework, the supervisory style of co-supervisors appears sometimes to be different from my own 'Psychological' style. Co-supervised students are (unconsciously) quick to pick up on my supervision style and frequently request advice on how to cope with feedback and other aspects of

supervision. This concern has implications for the building of a student's writing identity relating to confidence levels and for the empowerment of the student. In this discourse analysis of supervision relating to power both the 'Trad-supervisor' and the 'Techno-scientific supervisor' are seen by the students to be the powerhouse and source of disciplinary knowledge. The student consequently adopts a position of submission. The impact of this power differential is that the student may be reluctant to take the initiative in developing their writing and may become (over)reliant on one or both of the supervisors. On reflection, I have realised that these positions have important implications for the success of the writing-centred co-supervision model. The stated intention of the model is to enable the student to develop a writerly identity and to take control of their writing. Thus taking control links to the notion of 'power within' as opposed to the notion of 'power over' conceptualized by Williams These conceptions of power are useful in deconstructing the et al., (2014). implications of power differentials between supervisor and student as well as between co-supervisors in the writing-centred co-supervision model..

Confidence

The significance of anxiety or confidence levels has been identified by both academics and their postgraduate students as a key factor in success (Cadman, 2000). Manathunga (2005) reported that experienced supervisors saw confidence-building by supervisors as essential. Anecdotally we know that supervisors are aware that their students may secretly dread meeting their supervisor to receive feedback. Paltridge and Starfield (2007, 44) term this the 'imposter syndrome' where students 'fear failure and rejection'. Fear of judgmental feedback or anxiety in relation to the supervisor may impair writing ability (Murray, 2006).

Student 4 and Supervisor F highlight the affective component embedded in the writing-centred co-supervision model. Student E6 was curious and keen to receive feedback and mentions 'encouragement' and 'motivation' as key personal responses to the feedback she received.

The minute I started consulting with you every two weeks, it was always very interesting because I always look forward to seeing you - to see what progress I have made. The first draft came back and it was very messy and then I went to rewrite it, and it was very encouraging. After that I kept on

getting encouragement on my progress. I was also looking forward and it was motivating to see the change (Student E6).

The support for students throughout their research writing journey is not, as mentioned earlier, restricted to those students who have English as an additional language. In an email to the writing co-supervisor Supervisor F reflects on this aspect of the model as well as that of 'building confidence'. She points to what she terms the 'non-language benefits of the model'.

I emphasise the issue of problem of expression – as your work has shown that we cannot assume that writing support is only for students whose mother tongue (or whatever the PC jargon is...?) is not English - as first-language English speakers have benefitted. So, this is about supporting students to express themselves clearly- and yes, language is one of the issues - but not the only one. It's more than just the writing-it is a confidence issue. I do think that confidence is a big issue, and that the extra support does assist with building confidence. This is an area I think you should think about further-some of the non-language benefits of the model! (Supervisor F).

My experience in working with Student C8 and the content co-supervisor (Supervisor C) emphasises the importance of building confidence in fledgling postgraduate writers. In one of my meetings with Supervisor C I raised the issue of confidence since Student 8 appeared to be losing confidence in her work. This appeared to stem partly from overly-detailed feedback which caused the student to struggle as she felt her voice in the writing was negated. We discussed that it was the student's right to decide what feedback to accept but that it would be important for her to identify where and justify why she chose to digress from the strategies advised in the feedback. Despite this meeting, Student C8 was faced with 5 ½ pages of critical feedback with only one positive comment. A crisis of confidence emerged. The student postponed a scheduled meeting with me and met with the content cosupervisor. At this meeting she requested to drop out of her Masters citing ill-health of her mother, lack of finances and a looming hand-in deadline. I again met with the supervisor where we agreed that part of the issue was the manner in which the feedback was conveyed to the student i.e. one-way email with no face-to-face consultation. Despite this the supervisor later showed me a further 2-page email

with abbreviated feedback that he wanted to send to the student. I suggested that he first meet with the student. I later met with the student (who was by this stage extremely anxious), and we agreed she should colour-code what feedback she liked and agreed to take on board and work with (Field notes Writing co-supervisor).

The upshot of this student's experience has been a completed Masters, and a move to a PhD in a new university. She now says that she *has* confidence in her ability to write. On completion of her Masters, the same student (Student C8) reflected on the development of her writing and the interaction with the writing supervisor. This reflection shows a clear understanding of her progression as a writer. The sense of pride in the development of her writing is vivid and she comments on her increasing confidence in her ability to write well.

When I first came to Wits I thought I could write. The thing is I did write a lot, but I eventually figured out it was not necessarily good writing. Writing for the sake of writing and writing to produce work that is of a high quality are two significantly separate issues. When I first started working with the writing supervisor, I began to read my work out loud. I made faces a lot because half of the time I didn't understand what I had written, and what I meant by it. That was the first task I had to deal with: making my ideas as comprehensive on paper as they were in my head. We began by small steps, sentence and paragraph construction. More than one idea per paragraph meant that the paragraph had lost its intended meaning. All my paragraphs were like that -bouncing from one idea to another. This however changed rapidly.

When we first started out with the writing supervisor our meetings were long, but in time they became shorter. This was not necessarily because I was becoming better at writing but because I could identify my own errors thus making it easier for the writing supervisor and I to concentrate on other writing issues. The longer I worked with the writing supervisor, the more proud I became of my writing. I began to feel and recognise that I was telling the story that I intended to tell in a coherent and academic manner (one always has to think about the reader!).

Towards the end of my thesis, I honestly had begun to think like the writing supervisor when I was writing. I began to say what I meant in short simple sentences and this made my work understandable. I have reached a stage where I no longer read my work in horror but with pride, because it does sound good. Sometimes very good! I still think there is room to improve my English and I hope the writing supervisor will still be around for that.

I am filled with gratitude for the patience and understanding that she has displayed throughout the years. I am thankful to have had her support for this ride. I am filled with pride for myself and for the quality of work I have produced (Student C8).

The frequent contact with the writing-supervisor also diminishes the sense of isolation as a writer. There is an implication of the writing supervisor operating as a 'safety net'.

I think I am looking for a sense of how I write. Yes and if it worth doing, it must be good. If you are working so hard at it, then give it the kind of weight it deserves. I think it's actually similar to having to sit down and see yourself writing and actually do it. Then when you have started you have to say "I like my work. I like what I have done". It gives you that fulfilling feeling! And there is the knowledge that the writing supervisor is right behind you... (Student C8).

The impact of the writing-centred co-supervision model on traditional supervision practices

The content co-supervisors were asked whether their experience in working as a cosupervisor in the writing-centred co-supervision model has changed their supervision practice in any way. Supervisor F refers to the very first student who's conceptual and writing difficulties led to the development of this model:

When we read a weak piece of writing- we often conclude that the student is a weak student. However, the writing support (in my experience with Student

X), has been an important tool in differentiating between conceptual weaknesses and problems with expression. We found in this case that the problem was the latter. So, instead of dumbing down the project (which is often a supervisor's response to poor writing), the project remained intellectually and methodologically challenging, and instead, problems of expression were supported through the writing co-supervision (Supervisor F).

It is interesting to note that in his response to the question, Supervisor J has taken on board the relationship between conceptual clarity and the ability to write. Kamler and Thomson (2006, 3) touch on the heart of the matter when they state that "what often looks like poor writing is also a textual struggle to take on a scholarly identity and become authoritative".

It goes back to clarity of thought. In a second language the clarity of thought might be there, but they are not able to put it on paper. Sometimes I can't tell whether it's lack of language skills or clarity of thought! One needs clarity before the other (Supervisor J).

Supervisor C reflects that since being involved in the co-supervision model he has not changed his supervision strategies very much but tends to manage the interactions with students more tightly.

Not in a big way. The co-supervision model has taught me to keep tighter control on the student workflow and the setting of meetings for particular purposes (language with writing supervisor and content with me). I still tend to address both language and content collectively where I am the only supervisor (Supervisor C).

Since working with the writing co-supervisor, Student C8 comments on the subtle change in the nature of the feedback from her content supervisor. She points to the feeling of initially being overwhelmed with simultaneous feedback on her writing and her content material from the content supervisor. Once the distinct roles inherent in the new co-supervision model were taken on, the student (and her content supervisor) found it easier to find a feedback focus.

Without the co-supervision in the beginning, I would write something down and then my supervisor would have to go through English and content. Some things were kind-of lost in translation in between there, and he would just hold his head and say "Ugh!" My papers would be full of his comments. English here, content there! Lately it has been more of content and yes, there are things he picks from my English, but not as much as before. I can focus on one thing at a time. I was sometimes overwhelmed. In the beginning I would have to do all things at once. It has become simpler. "Go with this. Take this direction". Sometimes he changes things on my draft but it's not much and he doesn't do it a lot anymore (Student C8).

Advantages of the writing-centred co-supervision model for supervisors and students

Bearing the comments and reflections portrayed above the new model of cosupervision has several advantages:

- Co-supervision of this nature creates discussion and transfer of knowledge between supervisors relating to how to develop students' writing
- Constant attention is paid to writing. Students write more frequently and begin to write early in the research process
- Students receive focused feedback
- Students receive feedback more frequently
- Students learn to manage their time more effectively
- Students gain confidence in their ability to write

6.5 Challenges and limitations of the Writing-centred Cosupervision Model

"Researcher's reflections on their actions and observations in the field, their impressions, irritations, feelings and so on, become data in their own right" (Flick, 1998, 6).

Although overall responses are supportive, there are issues to be considered in relation to the writing-centred co-supervision model. The writing-centred co-supervision model does have limitations. These are discussed below structured

around the following areas: power and responsibility, communication with cosupervisors, the writing process, efficiency and personality.

Perceptions of power, responsibility and communication

Early in the development of this co-supervision model, there were issues around the recognition of my role as a co-supervisor. My role as writing co-supervisor remains largely invisible to some of my colleagues. In one instance, I was not advised of the proposal presentation date by the content supervisor (Supervisor G) despite having spent some hours with the student concerned (Student G5). On hearing of this, the student was most apologetic and hastened to advise Supervisor G of his slipup. As a consequence of this lack of recognition I was approached by the head of the discipline who enquired how he might ensure my recognition as an equal partner in the co-supervision model. The perceptions of the unequal status and power differential between the two supervisors in the model persisted for a few supervisors during the first year the model was implemented. A second co-supervisor (Supervisor E) commented informally that she considered me to be 'helping out' as far as supervision was concerned. We met at my behest and she was politely reminded of the agreed status of co-supervisors in this model.

Firstly, as discussed earlier in this chapter, there is often a power issue between supervisors. This is related to the status of the writing supervisor in relation to the content supervisor, and is dependent on the personal relationship between them. In a traditional co-supervision model, the relationship is either a pairing of an experienced supervisor with a novice supervisor, or alternatively two co-supervisors each with different but complementary content expertise. In the writing-centred co-supervision model, in certain instances, the content supervisor may attempt to relinquish the role of offering feedback on writing and this may be relegated entirely to the writing supervisor. It may also be that my 'caring' role (typified by the Psychological discourse of supervision) together with my writing interventions may be seen as marginal work - work of lesser importance than content-related work. This dismissal of writing development by some supervisors may also link to their personal supervision discourse. Such supervisors may consider that the development of a student's capacity to write academically is not their responsibility.

Thus ilt is quite possible that the overall effect of the writing-centred co-supervision model may be to further marginalise writing. This is not ideal as it is hoped that there would be spin-off from my writing feedback which would impact on the practices of the co-supervisors. In fact, if knowledge regarding writing is fully transferred between the writing supervisor and the content supervisor, the writing supervisor could be working herself out of her role as writing supervisor. One of the most important outcomes of this model for the writing supervisor would be if content supervisors would begin to take on my role insofar as the development of student writing is concerned. Student 8 comments on feedback from Supervisor C and alludes to the similarity of these feedback comments to those of the writing supervisor. This may indicate some small transference of feedback practices from the writing supervisor to this content supervisor.

My content co-supervisor makes notes in drafts-to say what **you** sometimes say "What does this mean? This doesn't make much sense. You shouldn't talk about this, it is insignificant" or "This is nice. You should stick with this. Go with this. Take this direction". Sometimes he changes things on my draft but it's not much and he doesn't do it a lot (Student C8).

In general, the email communication regarding feedback from the writing supervisor to the content supervisors reflects mixed feedback ranging from 'big picture' feedback e.g. structure, thinking around ideas, and signposting to comments on paragraphing and sentence construction. One of the more useful, albeit fairly superficial feedback items referred to in the emails relate to common errors specific to particular students. Some of these include comments on punctuation, the specificity of writing and referencing. At postgraduate level there is often a tendency to over-reference and this interferes with the flow of ideas.

Throughout the co-supervision process, the writing supervisor stays in contact with the content supervisor by means of brief face-to-face discussions (the student is not present). The writing supervisor also ensures that the content supervisor is kept in the loop regarding the writing development by sending updating emails reflecting on the writing-centred discussions held with the student. Examples of these emails are given below:

Email from writing supervisor to Supervisor C re Student C8

Student C8 and I met today and discussed the Introduction. Suggested she take a look at Cecile's 'problem/purpose statement' ideas (See Badenhorst, 2007). Suggested she rework the environment the section with clear historical structure. Suggested she take ownership of your suggestions and bring to me next week.

Email from writing supervisor to Supervisor J re Student J12

We spent 2 hours going over Student J12's analysis chapter this morning. He will make the changes before bringing it to you for content discussion and comment. We discussed the following:

- He often does not explain clearly and needs to rephrase. Part of the problem is the absence of nouns which give specificity to his writing
- He needs to add 'the' into his sentence construction. We discussed where this is necessary
- Suggested he shorten his overlong sentences
- He needs to avoid overusing/incorrectly using the colon and the semicolon.
- We discussed the use of signpost sentences and paragraphs to give the reader some idea of the plan of the chapter/paragraph

Email from writing supervisor to Supervisor E re Student E4

Suggested the following re literature review:

- Needs an opening paragraph signposting the themes of the chapter
- Restructuring needed to avoid repetition
- Subheading to be added to signal themes plus signposting sentences
- Too many direct quotes
- Subject-verb agreement needs attention

And again later to the same Supervisor:

Spent some time together revisiting the draft. Surface problems include:

- Repetition
- Overuse of 'very'
- Vague use of 'this' and 'it'.
- Invasive referencing style. Suggested names to be moved to end of discussion to allow the logic to flow. Citing in text needs to be in date order

Deeper problems include:

- Signposting and use of headings around themes in the literature review
- Writing is often vague and needs to be more specific e.g. the reserve is 'hot'
- Some ideas float and need to be moved and linked to the rest of the literature

This was followed by a reply from Supervisor E re Student E4

Brilliant- thanks so much! We've chatted about her writing quite a bit and what you have raised is really helpful.

A further example follows showing the communication sent from the writing supervisor to the content supervisor (Supervisor D) regarding the literature review of Student D7.

Suggested the following re literature review:

- We have decided to simplify the literature review
- The initial part of the literature review is not contextualised and one wonders initially why the parameters she mentions are important.
 Suggested she move a section to the beginning to overcome this
- There are instances of repetition
- She tends to over-reference and it is invasive. We decided to split sentences to address this

On reflection, it is clear that the communication process is predominantly one-way i.e. from the writing co-supervisor to the content supervisors and this reflects a power differential between the content and writing supervisors. There were seldom communications emanating from the content supervisor. A comment from Supervisor F below indicates a sense of what *she* considers the writing supervisor should be concerned with when she says "but actually I might identify that what you need to help that student with is...." There is a sense here of implied role and power differentials with regard to the relationship between the two supervisors. Thus there is a tension between the acknowledged 50/50 split between the content and writing supervisors, and an implication that the work of the writing supervisor is considered by the content co-supervisor to be of lesser importance.

One further disadvantage of the writing-centred model could be if there is interference by the writing supervisor related to content. Since the roles of both supervisors are agreed from the outset this has not happened. However the writing supervisor has, on occasion, discussed possible changes in content with the student subject to the approval of the content supervisor. The student would then be free to decide whether such changes were indeed useful and whether it would be productive to discuss these suggestions with the content supervisor.

One of the issues for me as writing co-supervisor is that I am also a discipline expert, so I have ideas about the content. So sometimes I cautiously make those comments and suggest that the student talks to the content supervisor. So there are issues of clarity here. I have tried to demarcate lines to the student of what I am responsible for and what the content supervisor is responsible for. Sometimes these need to be blurred since the content supervisor is also free to comment on the writing (Field notes, Writing cosupervisor).

When content supervisors were asked to comment on any disadvantages of the writing-centred co-supervision model, they commented on the remote possibility of the conflicting advice on content.

The only disadvantage would be if the co-supervisor was suggesting some kind of content change. I suppose it would be more of a problem in the traditional co-supervision model (Supervisor B.)

What I don't think is a disadvantage is that I don't think this type of cosupervision confuses the students. A lot of co-supervision around content confuses students because they get pulled in different directions content-wise (Supervisor F).

In order for this form of co-supervision to be successful there must be equal buy-in for the writing process from both supervisors and the student. The process of writing becomes intensive as the drafts are seen independently and in a staged order by each of the two supervisors. Unless this process is carefully managed, there is the possibility that the student may receive conflicting feedback from both supervisors simultaneously. However the data from both students and supervisors shows no evidence of this. These and other possible additional disadvantages are suggested by Student E10 below:

There may be sometimes a delay. Approval of both supervisors is very important. In situations where the other supervisor is not available, the student has to wait until they are available. There may be different and often confusing styles of supervision. Different personalities - this might lead to the student preferring one supervisor over the other. Conflicting advice/ideas might result in tension between the student and the supervisors. Competition among supervisors - one supervisor may try to prove to be better than the other. The tendency to abdicate responsibilities to the other supervisor may result in delay of progress, and /or even worse, poor quality work. I don't think any of these really apply to my two supervisors (Student E10).

The writing-centred co-supervision model: a personality-driven model?

One of the disadvantages of this model is that it appears to rest on the interest, enthusiasm and ability of a person inside the discipline to take on writing work.

I don't think we can replace you as a writing co-supervisor because I do feel some students need intensive help and serious intervention. Unless there is someone like you, I think students could fall out (Supervisor B).

In order for a discipline-specific academic to take on the role of writing co-supervisor there is the distinct possibility that the writing supervisor may not be seen as a suitable content supervisor by prospective postgraduate students. Thus a perception may develop amongst colleagues and possibly potential postgraduate students that such an academic is not a specialist in her own content area. A further concern is the question of what constitutes sufficient expertise in writing for the writing specialist. How might a content specialist gain the expert writing knowledge needed? The majority of writing specialists involved in 'outsider' models have a background in language and linguistics. Certainly a background and knowledge of academic literary is vital for a writing specialist. Finally the existence of power differentials between the two co-supervisors may inhibit the expansion of this model.

6.6 Conclusion

There is evidence that this model of supervision enhances the confidence of the research students and this in turn leads to improved writing. In addition, and most importantly, this co-supervision model opens up a space for communication between supervisors as they begin to openly disclose and share their supervision practices. The promotion of good practice, particularly with regard to feedback practices has permeated through the discussions between the content supervisors and the writing supervisor. One of the advantages of this model is that there is less of a tendency to edit - at least by the writing supervisor, and greater attention is placed on the development of the students' writing. The writing-centred co-supervision model thus facilitates better research writing and may also be more efficient in terms of supervision than the traditional co-supervision model as the two supervisors are each able to concentrate on more focused and distinct feedback. The notion of a developmental writing process rather than the production of a final single piece of writing has also taken root among most of the supervisors involved in the writingcentred co-supervision model. The quote below, suggesting a discussion around the development of argument in student writing, is an example of the kind of interaction facilitated by the close working relationship which has developed between the content and the writing supervisors.

The area I think we need to move to next is to develop critical thinking. We still have a major problem with getting students to engage with research in a critical way, and to develop arguments in a coherent and logical way. I am not sure how we do this – we all need to put our heads together on this one? (Supervisor F).

Cadman (2005, 35) suggests that by foregrounding the needs of students, we "frequently fail to make time to access existing scholarship and write". She suggests further that "our knowledges may exist and remain on the periphery of the academy through our own hesitations about language and public performance" (Cadman, 2005, 67). So it has been important that I have written and reflected critically on the writing –centred co-supervision model in the hope that it has created awareness of the importance of research *writing*.

Whilst the writing intervention reflected in the Writing-centred co-supervision model can in many ways to be successful, on reflection, it has become clear that this instance of the writing-centred co-supervision model is personality-driven in that it reflects my own personal interest in writing as an integral component of good The emphasis on writing by a co-supervisor may, in fact further supervision. marginalise the work around the development of writing. This may be the result of observed inequalities in the power relations between the two supervisors as alluded to earlier. The question remains as to how this model might be replicated elsewhere. My recommendation is that, in the same way as academic development has been gradually taken on and integrated into mainstream academic work, so should all supervisors take on writing pedagogy as an integral and critical component of their supervision practice. This move might entail training for many new and also many experienced supervisors in writing pedagogy and written feedback. In reality, until such time, there is an important space for the distinctive role of the 'writing supervisor'.

Chapter 7: Conclusion and Recommendations

This study provides an important opportunity to advance an understanding of the dynamics of writing–centred postgraduate supervision. Drawing on the preceding discussion chapters, this final chapter provides a summary of my key research findings and draws out the implications of these findings for supervisors and their interactions with their postgraduate students. A critical reflection on the research process is offered. The chapter concludes with a list of recommendations derived from the implications and suggests possibilities for future research.

For some time postgraduate pedagogy has taken a lesser role in supervision practice compared with the role of supervisor as researcher (Pearson and Brew, 2002). However recently there has been a shift in doctoral training from viewing the thesis as a product to a pedagogy of training researchers to develop their research skills and expertise (Deem and Brehony, 2000; Gilbert, 2004). Recognising that research writing remains significantly undertheorised (Aitchison and Lee, 2006; Aitchison et al.; 2012), this research offers new insights into the writing pedagogy employed by supervisors. In addition this research, located in South Africa in a department consisting of two allied disciplines in a Science Faculty, provides a local perspective on supervision pedagogy and research writing.

Too little work has been done, either locally or globally, on the dynamics of research writing. Kamler and Thomson (2001, 6) maintain that because writing is seen as 'marginal or ancillary' to the real work of research there is very little research that "opens out the complexity of PhD writing practice". In an attempt to redress this paucity, this research was undertaken. Initially an aspect of this research was suggested by a colleague when I presented the development of my writing-centred co-supervision model at a national university colloquium. This was the initial seed for the research.

Hence the title of this research, "Writing-centred Supervision for Postgraduate Students", is related to that early interest I developed in the practices of postgraduate writing supervision. So the aim of this research was to uncover, in a South African context, the perceptions and practices relating to postgraduate supervision, with a particular focus on postgraduate research writing. In this study I

considered it necessary to consider the perspectives of both supervisors and their postgraduate students with regard to the challenges of research writing.

The research focused on three key questions:

1. What is the nature of postgraduate writing supervision?

- What writing issues are perceived by supervisors and their postgraduate students with regard to the students' writing?
- What writing strategies are used by supervisors and their students?

2. What is the nature of written feedback given to postgraduate students by their supervisors?

What feedback issues are raised by supervisors and their students?

3. What is the nature of the new writing-centred co-supervision model?

What are the implications of this model for the development of postgraduate writing and supervision?

These three questions are interlinked as it was important to discover what supervisors and students recognise as writing issues. In the light of that aspect the implications of the written feedback are critical. In an attempt to address these two major concerns, the writing-centred co-supervision model provides a possible practical solution to the development of postgraduate writing. The importance of my findings is linked to each of the research questions and is presented in the following section.

The nature of postgraduate supervision: issues and strategies

The chapter on writing issues and strategies is a strategic move designed to address the research gap around perceptions of postgraduate writing-related challenges, particularly in the context of a South African Science department. In this research a number of research writing issues have been identified by supervisors and/or

postgraduate students. This research is unique in that, in addition to providing a map of these issues, I also assess the extent to which these writing issues are linked to strategies employed to enable students to overcome their writing challenges. The key findings and their implications are presented in the section which follows.

The first finding is that an analysis of the issues and strategies put forward by supervisors suggest that there is little pre-thinking about the process of assisting postgraduate students to write. With the exception of one supervisor (Supervisor F), many of the supervisors had to think long and hard in the interviews before they could answer questions relating to strategies they use to assist their students with their writing.

A second finding is that supervisors and their students tend to highlight general issues of research writing that they find to be problematic. These revolve around the writing research writing process itself. the positioning of the (argument/voice/audience), language and referencing, the style of writing, the relationship between thinking and writing and the students' reliance on the Supervisors suggested a range of strategies designed to address these supervisor. issues, for example, supplying key readings and models of good writing, assisting students to position their work, and encouraging them to seek assistance elsewhere from writing workshops, the university writing centre and how-to academic texts. The strategies the students found useful were similar to those suggested by supervisors but were less focused on the macro issues relating to structure and argument. Students suggested a wide range of smaller and more creative out-ofthe-box ideas, such as the use of blogging, working only on small sections of work at one time, planning using mindmaps, changing the location of where they preferred to work, and moving from one piece of writing to another when feeling blocked. A third finding is that surprisingly, there was little similarity and a mismatch between the strategies put forward by individual supervisors and those strategies identified as useful by their students. It would have been expected that there should be some match between these strategies. Two explanations for this may exist: supervisors may espouse these strategies but do not discuss them with their students; or the students decide that they find their own alternative strategies more useful than those suggested by their supervisors.

Fourthly, the relationship between thinking and writing is not fully recognised by supervisors. Many supervisors had not considered the writing-thinking conundrum as an important part of the process of research writing. By the same token, reading strategies were not suggested or utilised by supervisors and not all supervisors offered advice on key readings.

The fifth finding is that aside from writing 'the actual research text', no other forms of writing were considered by supervisors. These other forms of writing, such as visual mapping of the literature and debates, abstract writing, pieces of writing on the student's contribution to knowledge, are absent from the repertoire of these supervisors. The question of what other forms of writing students were encouraged to engage with was originally one of my preferred research questions. This question received blank looks from supervisors in the interviews and answers were not forthcoming.

The final finding is how important the style of scientific research writing is for many supervisors in these two allied Science disciplines, particularly those working with quantitative data and analysis. Quantitative analysis is narrowly conceived as 'not being creative'. Journalistic writing is eschewed and students are required to write 'factually and scientifically'.

The nature of written feedback given to postgraduate students

Bearing in mind the writing issues raised above, the investigation of the nature of written feedback given to postgraduate students is central to this research. This aspect of postgraduate writing is until recently relatively unexplored and research on feedback has typically focussed on that related to undergraduate students' assessments (Carless, 2006; Nicol, 2010, Vardi, 2012; and Yang and Carless, 2013). In *this* research, the feedback practices of a group of supervisors are uncovered using a newly-constructed analytic feedback framework which illustrates a continuum of feedback practices. Findings in this regard are discussed below.

The first finding is that written feedback generally consists mainly of mixed feedback comments, with little practical feedback for students on *how* to improve their writing. This is especially true of the feedback offered by the majority of supervisors in this

study. The supervisor interview data revealed that often little attention is paid to assisting the student to develop his/her writing.

The second finding is that supervisors seldom discuss the nature of their feedback and are largely unaware of the different types of feedback which may be offered at any one time. Supervisors (and students) lack a shared language which would enable discussion around feedback. An analysis of the data leads me to conclude that supervisors' knowledge of their written feedback practices is critical and that a shared meta-language regarding feedback would allow supervisors to open a space for an improved and more useful feedback dialogue both with their colleagues and their postgraduate research students. Evidence points to the usefulness of questions as a feedback device as written questions from the supervisor do assist with the sense of ownership of the writing by the student.

A further finding related to the language of feedback is that a feedback framework (or taxonomy), such as the one I developed in the chapter on feedback, is very useful in unpacking the nature of a supervisor's feedback practices. However some explanation of feedback taxonomies is essential if these are to be accessible to all supervisors as the language used in these classifications often requires explanation for those supervisors (the majority) who lack linguistic backgrounds. For this reason the more simplified feedback model conceptualised in Chapter 5 may be more useful for supervisors keen to reflect on their feedback practices.

Fourthly, it is clear that although different feedback may be appropriate in different places in a draft and at different stages of the research process, there is no clear picture in the minds of the majority of the supervisors of this distinction. Feedback varied from being too little, to being totally overwhelming in volume and detail, leading to emotional distress and lack of motivation for some students.

A final finding is that, unsurprisingly, editing by the supervisor remains a debatable practice. Supervisors remain unsure of whether it is their responsibility or that of the student. This uncertainty stems from the sense of responsibility supervisors have in ensuring a reputable outcome. There is also ongoing debate as to whether outside editors should be engaged and whether supervisors should offer to pay for these interventions. There are questions of fairness as not all students are financially able to pay for such a service.

The Writing-centred Co-supervision model

The third focus in this research is on investigating a new model of co-supervision i.e. the writing-centred co-supervision model and the implications of this model for supervision practice. (See research question 3 above). What is unique about this co-supervision model is that it has a content supervisor and a writing supervisor both located within the discipline. In other versions of a writing-assisted model, a writing supervisor may be located outside of the discipline. In the latter model, the outside writing advisor may not have specialist content knowledge (Cadman, 2005; Aitchison and Lee, 2006). There are a number of important findings (and implications) emanating from the discussion of the model of writing co-supervision presented in this research.

The first finding is that **power issues** remain inherent in this co-supervision model, and that research writing remains on the margins of academic work and 'subordinate to the main work of thinking and knowledge production' (as argued by Aitchison and Lee, 2006). The co-supervision model was predicated on an agreement of a joint and equal responsibility of each supervisor. Unfortunately although this was set out for participating postgraduate students and their content co-supervisors at the outset, the role of the writing supervisor was not always taken seriously by co-supervisors and the agreement of an equal responsibility was not adhered to by all content co-supervisors. As the writing co-supervisor, I was, on occasion, viewed as 'helping out' and there was a tendency by some supervisors to ignore my role. This is evidenced in part by the one-way traffic of informative emails from the writing co-supervisor to the content co-supervisors, with little return communication. This points to the perception of some content co-supervisors that the development of writing is a marginal academic activity. However, despite the issues of perceived power disparity between co-supervisors, most importantly, this co-supervision model does open up a space for communication between supervisors as they begin to openly disclose and share their supervision practices.

Secondly, although some academic staff in the two allied disciplines opted not to be part of the co-supervision model, students on the other hand were nearly always enthusiastic at the possibility of attention being given specifically to the development of their writing. Despite the push for traditional co-supervision in my institution, one possible explanation for the lack of buy-in for co-supervision from supervisors could be tied to reasons related to promotion and probation for newer and younger academic staff within the institution. There is increasing pressure to graduate postgraduate students within specified time limits. In addition new staff are eager to establish their own supervision profile and therefore 'sharing' supervision may be seen to impact on the institution's perception of their ability to supervise alone. There is evidence in this study that the older, more established supervisors are more enthusiastic about joining the writing-centred co-supervision model than their less experienced colleagues.

Thirdly, it is clear from the study that supervisors and students underestimate how long it takes to develop research writing. The assumption that students from within the institution 'know how to write' also needs to be challenged. The strategy of face-to-face meetings between the writing co-supervisor and the students where there was discussion around **how** the students might improve their writing (rather than what was problematic) is a confidence-builder for the students. There is strong evidence that this model of supervision does enhance the confidence of the research students and this in turn leads to improvement in their writing and the construction of a writing identity for the student. This discussion strategy enabled students to claim their writer identity and diminished their sense of isolation. An important finding is that this co-supervision model also allows the writing co- supervisor to provide a 'safe space' in the writing process for the students.

Fourthly, the role of the writing-co-supervisor is acknowledged as a time-saver for the content co-supervisors, and that it 'lessened the load'. Co-supervisors indicate that this meant they can focus more time and effort on issues of content. Unfortunately some supervisors see my role as that of an 'editor' and there is a misperception that my role is that of 'fixing up' grammar and spelling. This relates back to the central finding mentioned earlier concerning the inequality of the power relations between co-supervisors and the implications of this for the model. In addition there is limited evidence for the hoped-for transfer of knowledge to co-supervisors around the 'how-to' of postgraduate writing.

A fifth finding is that very often, close proximity to, and knowledge of the research content by content supervisors and the students writers results in the assumption that all readers are 'au fait' with the content. Despite being a discipline specialist, the broad nature of the fields I co-supervised meant that as writing co-supervisor, I was able to identify taken-for-granted assumptions made by the students (and co-supervisors) with regard to content and methodology.

A final finding related to the implementation of the writing-centred co-supervision model is that the **replicability of this model in other contexts may prove challenging**. Some co-supervisors suggest that the role of the writing co-supervisor is personality-driven in that not all academic supervisors located in a discipline may be prepared to take on the challenges of becoming a writing co-supervisor. There also remains the question of how much writing—related knowledge is required to fulfil the role of a writing specialist within a discipline? How does an academic within a discipline gain such knowledge if they do not have a linguistic background? A systemic understanding of language and writing in the university context is necessary. Finally, how would taking on such a role, given the power challenges, impact on the supervisor's standing within the discipline?

Critical reflection on the research process

One of the limitations in this study is that due to practical considerations, not all students were at the same stage in their research undertaking, nor were they registered for the same degree. Some were students enrolled for a Masters degree and others were doctoral students. I was reliant for my student sample on supervisors providing me with access to their current postgraduate students. This meant that the student sample ranged from students who had recently completed their proposals to students who were nearly at the end of the process and receiving feedback on near final drafts. So there were constraints on which students were available to become participants in my study.

A further roadblock was the fact that virtually all the supervisors participating in this study revealed that they did not keep copies of drafts of their postgraduate students' research writing. These were necessary in order to provide evidence of the feedback

practices of the supervisors. It was then necessary to acquire these from the students themselves. Disappointingly many students did not keep all their drafts.

Whilst my case study cannot be used to generalise to other disciplines and institutions, the insights gained from this study in a Science Faculty can feed back into the institution. More particularly the findings can inform and enrich the community involved in this study. This has already proved to be the case as I have facilitated many workshops on feedback under the auspices of the Centre for Teaching and Learning Development in my institution and also in the newly-created Postgraduate Diploma in Higher Education which targets tertiary lecturers.

Recommendations for practical applications of the key findings

A key recommendation is that other forms of writing be suggested by supervisors to their students in order to develop their writing. These writing practices are called 'pedagogical text work strategies' (Kamler and Thomson, 2006b, 58). My research shows that for the majority of students, the only student writing that takes place during the writing journey are drafts of sections of the actual thesis. There are many varied suggestions for smaller useful pieces of writing, for example setting out the argument prior to writing a chapter, and mapping the debates and areas of research in setting up a literature review. These strategies often allow the student a release from writer's block and offer alternative avenues into the research writing.

A further recommendation is that all supervisors become aware of their feedback practices. This can be done by running workshops for academic staff on feedback so that supervisors are able to reflect on what it is that they do regarding written feedback. By providing the time and space for this critical reflection, colleagues can begin to create their own community of practice focusing on feedback.

My main recommendation is that, in the same way as academic development has been gradually taken on and integrated into mainstream academic work, all supervisors should be encouraged to engage with writing pedagogy as an integral and critical component of their supervision practice. Since the research shows that many supervisors are not fully equipped to assist their students with 'the how' of

academic writing, this move might entail engaging with the many new (and also many experienced) supervisors in writing pedagogy and written feedback.

Implications for the field

It is apparent that many academics lack formal supervision training and assume that what they are doing is both useful and efficient. This may not always be the case, and it would be useful for all universities to run compulsory supervision workshops/seminars at regular intervals for all staff, including those who claim extensive experience in supervision. These workshops would then open a 'space' for self-reflection on one's supervision and feedback practices.

Suggestions for further research

It would be useful to conduct further research on the feedback practices employed by supervisors. One such avenue could be to track the changing nature of feedback using longitudinal case studies of supervisors and their postgraduate students. It might also be useful, in the South African context, to investigate if there were differences in feedback given to students with English as an additional language compared with that given to first-language speakers of English. It would also be of interest to compare the nature of feedback given to students in different academic disciplines and faculties. A further area of research could be to compare the different feedback experiences of Masters and doctoral students. Aitchison et al., (2012, 2) comment that 'we still understand relatively little about how doctoral students actually learn research writing, how supervisors 'teach' or develop the writing of their students and what happens to students and supervisors during this process". So there are still many avenues to be explored with regard to postgraduate student writing and pedagogy.

Finally, in conclusion, for those supervisors committed to improving the research experience of our postgraduate students, it is hoped that this study makes a contribution to advancing our knowledge, in an African context, of supervision and its associated writing practices.

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Appendix A

Appendix A: Interview Guide: Questions for all Supervisors/Students

Interviews with Supervisors

What do students need in supervision?

What part does writing play in your supervision?

What strategies do you use in supervising students' writing?

At what stage do you address writing?

What form does your feedback to students take?

Do students do any other kinds of writing?

What are the writing difficulties for you as supervisor /the student?

Who needs writing assistance?

How often do you meet with your PG students?

Interviews with Postgraduate Students

How easy is it to write?

What changes in writing have you experienced in moving from UG to PG studies?

Do you get support for your writing?

If so, how do you get support for your writing?

Who helps you?

What strategies have helped you with your research writing?

What do you need to improve your research writing?

What kind of writing do you do as part of your research?

When do you do this (at what stage of your research)?

How often do you meet with your supervisor?

What feedback do you get on your writing from your supervisor?

Additional Questions for Supervisors/Students who are part of the GAES Writing-centred Co-supervision Programme

Interviews with Supervisors

Are there advantages and disadvantages for supervisors associated with the Writing-centred Cosupervision Programme? If so, what are they?

Are there advantages and disadvantages for students associated with the Writing-centred Cosupervision Programme? If so, what are they?

Interviews with Postgraduate Students

Are there advantages and disadvantages for students associated with the Writing-centred Cosupervision Programme? If so, what are they?

Appendix B

Information and Interview Consent Form

Dear Student/Staff member,

The purpose of this research is to explore writing-centred postgraduate supervision. Traditional supervision with regard to writing, as well as practices provided by a writing co-supervision model in your discipline will be investigated.

The research will employ a qualitative case study approach to investigate the flow of events and processes related to the writing aspect of research writing and supervision. The intention is to understand research writing from the participants' perspective. Negative personal issues will not be taken up by the researcher and students will be asked to use alternative channels to communicate these issues e.g. the Teaching Hotline, or through established university processes.

In order to assist with the research I would like to invite you to participate in this study. You will not be penalized for not participating, and you have the right to withdraw from the study at any time. It is also important to let you know that there will be no payments for participation. Efforts will be made to safeguard your privacy (actual names and contexts will be disguised) so that issues remain anonymous. The information that you give during the research process will be written down, however, your names will not be disclosed. All data will be destroyed.

If you require more clarity on this research or have any questions, feel free to ask and I will try and answer your queries where possible.

Thank you for taking the time to consider participating in the study.

Cheryl Chamberlain

Consent Form for Participation in the Research

I agree to take part in the research project and agree to allow Cheryl Chamberlain access to drafts of my research writing, my research notes taken during consultation with my supervisor/s (or my student/s), written reflections on my research process, feedback from supervisors/students, emails to/from my supervisor/s (or students), and comments from internal and external examiners. I understand the purpose, conditions and procedures of the study as they have been explained to me. I understand that I am not going to get paid for my participation and that I have the right to withdraw from the study at any time during the study without a penalty. I understand that my identity will be protected.

Name of participant:
Date:
Signature:
I
Date:
Signature of the researcher:

Audio-taping Consent Form

Dear Student/Staff member,

You are invited to participate in this research process by participating in open-ended audio-taped interviews with the researcher. All data will be destroyed. Thank you for your participation,

Cheryl Chamberlain

Consent Form for Audio-taping of Interviews		
	hereby willingly consent to the taping of my interviews as part ostgraduate Supervision. I understand that all taped data will be	
Name of participant:		
Date:		
Signature:		