DETERMINING COMPETENCY FOR ENTRY TO NURSING PRACTICE: A GROUNDED THEORY STUDY

By

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ABSTRACT

Critical Comparative Nursing Assessment (CCNA) is a theory about how the competence of completing Bachelor of Nursing students in New Zealand is determined. Semi-structured, audio-taped interviews and field notes were used to collect data from twenty-seven nurses with experience in undertaking competency assessment. A Glaserian grounded theory approach was used to guide the data collection and analysis. This utilised the processes of constant comparative analysis, theoretical sampling and saturation to generate a middle range substantive grounded theory. This is presented as a model consisting of four emergent categories that explain how nurses formulate professional judgements about competence. These are a) *gathering*, which describes the processes used to collect evidence of practice to inform decisions; b) *weighing up*, which explains how evidence is analysed using the processes of benchmarking and comparative analysis; c) *judging* brings into focus the tensions inherent in making professional judgements about competence and how nurses formulated these, and d) *moderating*, which describes the processes nurses use to validate decisions and ensure that professional responsibilities and public safety are upheld. The basic social psychological process of comparing integrates these categories to explain how nurses resolve the tensions associated with making decisions about competence. This research presents a new way of viewing and understanding how nurses assess competence. It identifies where the challengers and tensions related to the assessment of competence lie and suggests strategies that if implemented could further enhance the validity and reliability of assessment outcomes.

Key words: Grounded theory, nursing, clinical competence, student assessment.

DEDICATION

This thesis is dedicated to my family. For my husband Tony and my children Christopher and Stephanie. While I have pursued higher education and indulged my interest in nursing, you have always been there. I am deeply grateful. Thank you for your support and patience and for allowing me to make this dream possible.

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Glossary

Buddy - Registered nurse working along students supervising practice development. Sometimes known as a preceptor.

Competence – The combination of skills, knowledge, attributes, values and abilities that underpin effective and/or superior performance in a profession / occupation area (NCNZ, 2004b).

Competent – The person has competence across all domains of competencies applicable to the nurse, at a standard that is judged to be appropriate for the level of nurse being assessed (NCNZ, 2004b).

Clinical – Practical experience. Sometimes known as practicum.

Clinical Nurse Educator – Registered nurse working with students during practical experience.

Clinician – Registered nurses working in clinical practice.

Elective – A period of practical experience where students choose the practice area. Also referred to as transition

Hui – Gathering, meeting.

Indicators – Key generic examples of competent performance. These are either comprehensive or exhaustive. They assist the assessor when using their professional judgment in assessing nursing practice.

Maori – Indigenous people of New Zealand.

Nurse – A person registered to practice as a nurse under the Health Practitioners Competence Assurance Act 2003.

Nurse educator – Registered nurse working within an educational institution.

Pakeha – Non-Maori, European, Caucasian.

Performance criteria – Descriptive statements that can be assessed and which reflect the intent of a competency in terms of performance, behaviour and circumstance (NCNZ, 2004b).

Polytechnics – Institutions of higher education in New Zealand.

Preceptor – Registered nurse working along students supervising practice development. Also known as a buddy.

Practicum – Clinical experience. Sometimes known as clinical.

Reliability – The extent to which a tool will function consistently in the same way with repeated use.

RN partner – A registered nurse working along students supervising practice development. Also known as a buddy or preceptor.

Student – Bachelor of Nursing student.

Transition – The period between completion of core course components and undertaking State Final examinations. Also referred to as electives.

Validity – The extent to which a measurement tool measures that which it purports to measure.

Whanau – Maori term for family.

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Chapter 1: Introduction

1.1   Professional accountability and regulation of practice

Human rights, professional accountability and public safety are issues that have arisen in the media in recent years. Public commentary regarding perceived clinical negligence and a weakening health service has placed the spot light on the Public Health system (Health Workforce Advisory Committee (HWAC), 2003; White, 2001). Questions have been asked about the competence of health professionals and their accountability for practice (Hunt, 1997; Tilley & Watson, 2005). In response to health care market place pressures and public concerns about the competence of health professionals, the New Zealand Government responded by introducing the Health Professionals Competence Assurance Act (HPCAA) in 2003.

The purpose of the HPCAA (2003) is to protect the health and safety of the public by ensuring that health practitioners remain fit and competent to practice within a defined scope of practice (NCNZ, 2004a). The emphasis of the HPCAA contrasts with previous frameworks in that, where it was assumed that practitioners were fit to practice indefinitely, the legislation now requires ongoing evidence of continued competence to practice. The introduction of the HPCAA has radically changed the regulatory framework for health professionals. It outlines rules by which all professionals must provide safe and competent service to the public (NCNZ, 2004a). It is considered that legal requirements such as these make professional bodies and individual practitioners more accountable for their actions or omissions (Tilley & Watson, 2005).

The HPCAA focuses on maintaining standards and improving the competence of health professionals. Sections twelve and sixteen outline the functions of the Nursing

Council of New Zealand (NCNZ) and include its scope of responsibility in regard to the registration and enrolment of nurses, and identify actions required to assure protection of the public. This covers education programmes (including the establishment of standards for preparation and admission to the profession), initial registration, monitoring ongoing competence and regulation of post registration education and advanced practice (Ministry of Health, 2002).

With the introduction of the HPCAA, regulatory bodies, such as the NCNZ, have been empowered to implement a range of actions to ensure that the health workforce is competent. For nursing, this has resulted in an increasing flexibility of registration and provided NCNZ with the ability to place conditions on scopes of practice. This has included the identification of a mandatory number of practice and professional development hours as prerequisites for continued practice. It is envisaged that strategies such as this, and the introduction of annual competency-based practicing certificates, will enhance care and prevent errors (Nelson, 2003; Parsons, 2003).

As a consequence of the introduction of the HPCAA, scopes of nursing practice, competencies for entry and continued practice, and requirements for undergraduate nursing education programmes have been reviewed. These reflect the recommendations from the KPMG Strategic Review of Undergraduate Nursing Education (2001) and legislative requirements of the HPCAA. Educational institutions are charged with the responsibility of ensuring that graduates meet these requirements and are competent and fit to practice as registered nurses before they are put forward to sit State Final examinations and attain RN status (HWAC, 2003; Tate & Moody, 2005).

1.2 Nursing education in New Zealand

New Zealand nursing has witnessed many changes in the way in which nurses have been educated and prepared for practice. Until the early 1970s, nursing students completed traditional apprentice-style training. This was governed by Hospital Board Schools of Nursing. Until this time, the emphasis of training was on the acquisition of clinical skills (Pycroft, 2003). Following the Carpenter Report in 1971, the responsibility for nurse education was gradually transferred from the heath sector's Hospital Schools of Nursing, to the Department of Education. This resulted in the establishment of more structured theoretical programmes in polytechnics and nursing programmes being offered in universities. For the next 20 years, Comprehensive Nursing Diploma programmes replaced all other nursing programmes and became the qualification for entry to the profession (Burgess, 1984).

Responding to overseas trends in nursing education, a commitment was made in the late 1980s, by the nursing profession in New Zealand, to offer degree programmes. The Education Act (1990) empowered polytechnics, enabling them to offer degrees. A degree in nursing became a reality in 1993, with two of New Zealand's then fifteen Polytechnic Nursing Departments offering Bachelor of Nursing programmes. By 1995, all Polytechnic Departments of Nursing offered New Zealand Qualifications Authority (NZQA) approved degrees in Nursing or Health Studies as the entry qualification to the nursing profession (Andersen, 1997). These developments resulted in the discontinuation of diploma programmes and have seen significant changes in curricula, with all nursing programmes now offered at university level.

The design of pre-registration education programmes and the evaluation of their success is based on the regulations and standards set by NCNZ. A comprehensive programme provides the basis for preparation of nurses. This is designed to ensure that nurses, who successfully complete undergraduate programmes, are safe to practice. While there is not a standardised nursing curriculum in New Zealand, NCNZ standards outline requirements of theory and practice. Competency is normally assumed to be the end point of pre-registration education, with new graduates possessing the necessary knowledge and cognitive and psychomotor skills to be safe and effective to practice at a beginning level in the health care environment. NCNZ define competence as "the combination of skills, knowledge, attitudes, values and abilities that underpin effective performance as a nurse" (NCNZ, 2007, p. 20). Competence at a beginning level is taken to mean entry-level competence for professional practice.

While education assumes the primary responsibility for theoretical components, a collaborative model is used to facilitate clinical learning components within nursing programmes. There are a variety of models used throughout the country. These generally involve lecturers from educational institutions working in collaboration with clinicians, who precept students. While education holds the responsibility for ensuring that students meet both the requirements of programmes and the competency standards, they rely heavily on the support of nurses working as preceptors to supervise and teach students in practice, provide feedback about the student's performance, and to make a contribution to the assessment of practice competence.

During transition experiences, which generally occur at the end of the nursing programme, course outcomes and assessment reflect NCNZ competency requirements. It is expected that students will demonstrate practice that is competent, reflecting the student's ability to function at a new graduate level. At this time, the direct involvement of education is diminished with students working alongside preceptors who, it is assumed, will soon become peers. During this period, the preceptors' assessment of student competence is vital, and plays a significant role in contributing to the student's final competency assessment (Lee & Hendry, 2001).

1.3 Expectations of graduate competence

Innovations in medicine, short stay hospital care, the increase in patient acuity, and inadequate staffing levels and skill mix, have changed the face of nursing practice (Aiken, Clarke & Sloan, 2001; Dickerson, Peters, Walkowiak & Brewer, 1999; O'Neil, 2003; Tate & Moody, 2005; White, 2001). As a result, performance expectations of new graduates have also changed (Tzeng, 2004), and requirements of competence have been reconstructed by practice to reflect the everyday challenges of practice at the 'coalface'. According to Chapman (1999), employers want graduates, who "have minimal need for further training, supervision or orientation; who are aware of the workplace needs and requirements and preferably have more than beginning competence" (p.130). Consequently, in order to cope with the demands of a changing health care system, new graduates are expected to 'hit the deck running' with the equivalent of two years experience 'under their belts' (Greenwood, 2000; White, Oelke, Besner, Doran, McGillis Hall & Giovannetti, 2008). O'Connor, Pearce, Smith, Vogeli and Watson (1999) have researched the clinical performance of newly qualified nurses and their fitness for purpose. They confirm that "senior

nurses have clear subjective expectations of the competence level of newly qualified nurses" (p. 559) and that nurses question the competence of new graduates. On further exploration of the assessment of new graduate performance by preceptors, these authors found that the competence level of newly qualified nurses exceeded the expectations of senior staff. This research highlights differences in the perception of competence and the perceived efficiency of new graduates.

The changing face of health care and a shift in practice expectations of new graduates is an international concern and has resulted in criticism of nursing education programmes (Crookes, 2000; Diede, McNish & Coose, 2000; Morolong & Chabeli, 2005; Piercey, 1995; Walker, 1998; Walters & Adams, 2002). According to Greenwood (2000) expectations have changed so radically that some clinicians are using standards of advanced practice to measure new graduate performance. The tensions inherent in this situation are reported in New Zealand, where the differences between educational programme outcomes, NCNZ competency requirements and the unwritten requirements of practice have resulted in some confusion surrounding practice expectations of student nurses, and new graduates. This has given rise to criticism of the effectiveness of educational programmes to prepare graduate for practice (Walker & Bailey, 1999).

Recently, this concern has been fueled by the release of the new Nursing Council of New Zealand Standards for Nursing Education (2005) detailing the delivery requirements for theory and practice. Where these had previously been equally distributed, the new education standards now make provision for reduced practice hours. This is commensurate with international trends in nursing education.

While the clinical performance of newly qualified nurses and their 'fitness for purpose' has been an issue that has been debated in nursing circles for some time (Bartlett, Simonite, Westcott & Taylor, 2000; Carroll, 1984; Grundy, 2001; O'Connor, Pearce, Smith, Vogeli & Watson, 2001), changes like the issues raised above, have caused renewed concern for nurses, who question the adequacy of education programmes, and the preparedness and competence of graduates for professional practice. This has again become topical internationally (Crookes, 2000; Glen, 2000; Vinson, 2000; Walsh, 2000; Whelton, 2000). Debate about whether nursing education should remain within the education sector or return to a hospital-type training system has re-emerged. While this move is unlikely, it highlights differences in the perception of competence and the perceived efficiency of nursing education programmes to provide graduates that meet the demands of practice.

Although NCNZ competencies specify practice requirements that are an integral part of undergraduate education, the absence of a standardised Bachelor of Nursing curriculum, coupled with the practice issues identified above and the differing opinions of nurse educators regarding expectations of student performance, further contribute to confusion about competency expectations of graduates exiting nursing education programmes. The changing expectations of practice and the confusion surrounding this was identified by the Ministry of Health (1998) and the NCNZ commissioned KPMG strategic review of undergraduate nursing education (2000). This, and the resulting release of the KPMG report (2001) raised several issues surrounding the preparation of nurses and assessment of competency to practice. The KPMG report identified that it is assumed that all graduates of comprehensive programmes have achieved NCNZ competencies, and although this is a reasonable

assumption, there was concern that nurse educators and clinicians (preceptors) did not have a shared understanding of what the competencies for entry to practice were, or how they were demonstrated (Health, Education & Community Services, 2001).

1.4 The researcher's interest in the area of study

The concern that nurse educators and preceptors do not have a shared understanding of the competencies for entry to practice, or how they are demonstrated (KPMG, 2001), was highlighted for me, when discussing NCNZ competency requirements with colleagues and clinicians prior to this research. I was informed that many experienced nurses are unable to interpret the competencies outlined by NCNZ. Some nurses did not believe that they could achieve all of the competency criteria themselves and that the level of practice required of new graduates was far too high. Further to this, requests for assistance in interpreting assessment requirements were made by preceptors involved in the final transitional clinical assessments of Bachelor of Nursing (BN) students. This is a critical assessment point in determining practice competence and suitability for registration. This raised questions about the validity and reliability of assessment outcomes.

As a nurse involved in nursing education for twenty years, I was both surprised and concerned about the confusion and apparent lack of preceptor knowledge of NCNZ competencies, expectations of student practice and competency assessment issues that were raised. In my experience these issues have not been voiced before.

Colleagues speculated that the advent of the HPCAA and competency-based practicing certificates for nurses had raised the profile of competency standards,

which had previously been unacknowledged. They revealed that there was some anxiety associated with competency standards and that they spent a considerable amount of time explaining course requirements, expectations of student practice and competency standards to preceptors. They confirmed the findings of the KPMG report by reporting that they felt that their expectations of student practice were often different to that of their practice colleagues.

The rewriting of job descriptions in practice to reflect competency standards, the ongoing debate about the HPCAA and the need for confirmation of competency were also thought to contribute to nurses' anxiety about competency standards, with nurses either seeking support to make judgments about competency of students, or declining to contribute to assessments. A group of nurses with whom I spoke said they feared that their professional competence would be questioned if they declared a student safe and future incidents indicated incompetence. The perceived implications of this situation raised anxiety and some nurses believed that this had resulted in preceptors abdicating responsibility for contributing to assessment. This situation had occurred during the practicum of students from the programme with which I was associated.

These issues stimulated my interest in the assessment of competence and raised questions about assessment practices. If preceptors did not know or were unable to interpret the NCNZ competency standards, which formed the foundation of their practice and the student competency assessment, on what basis were they making professional judgments about competence? How did they assess this and did this influence their contribution to the assessment process? If educators were not

sufficiently exposed to student practice to confidently make decisions about student competence, and preceptors could not or would not provide expert opinion, how was the assessment completed? How did nurses know students were safe? Furthermore, what guarantee could nursing education give the NCNZ and the public of New Zealand that new graduates had met competency requirements and were safe to practice? These questions and the issues previously discussed, initiated an interest to undertake research to discover and explain what was happening regarding the assessment of practice competence for completing BN students in New Zealand, and how decisions about competence are made.

1.5 The significance of the study

The need for research in this area was further stimulated by a preliminary literature review that provided evidence of an international interest in practice competency. While there had been a number of publications in recent years, the majority of these focus on: characteristics of competence and measurement issues (Exstrom, 2001; Hardcastle, 1999; Waddell, 2001; Watson, Stimpson, Topping, & Porock, 2002; Zhang, Luk, Arthur & Wong, 2001); standards of competence, specialty areas and advanced practice (Badger & Rawstorne, 1998; Barker, Williams & Smith, 2001, Darbyshire, 1994; ICN, 2002; O'Brien, O'Brien, McNulty, Morrison-Ngatai, Skews, Ryan, Hardy, Gaskin & Boddy, 2002; Wissmann, Hauck & Clawson, 2002); and assessment methods and measurement of student nurse clinical performance (Andre, 2000; Freeth & Nicol, 1998; Horsburgh, 2000; Neary, 2001; Robb, Fleming & Dietert, 2002). Others (French, 2002; May, Edell, Butell, Doughty & Langford, 1999; Maynard, 1996; White & Taylor, 2002) discussed the link between evidence-based practice, critical thinking, nursing knowledge and competency to practice; or

the educational preparation of nurses and the performance of the graduate nurse (Bechtel, Davidhizar & Bradshaw, 1999; Chapman, 1999; Fulbrook, Rolfe, Albarran & Boxall, 2000; Grundy, 2001; Meerabeau, 2001; Watson, 2002).

To my knowledge, only two research projects concerning competency to practice have been undertaken in New Zealand. In 1995, the NCNZ commissioned research to develop standards and competencies for entry to the register of nurses. This became the determinant for "generic benchmarks for safe nursing practice in any setting", including mental health (NCNZ, 1996, p. 5). Although all of the information and data used and collected for the purposes of this study remains confidential to the NCNZ, it is reported that the competency assessment framework could be used to assess competence in a variety of ways throughout the practice component of the three year course and when used to assess third year students, it provided "a one to two hour 'snapshot' of practice in the final practicum [which] revealed useful data" (NCNZ, 1996, p. 11).

The second research project was undertaken by O'Brien, O'Brien, McNulty, Morrison-Ngatai, Skews, Ryan, Hardy, Caskin and Boddy (2002) to address the specific needs of mental health nursing. This research provides information in the form of a report to the Health Research Council of New Zealand. This study gathered data from mental health nurses regarding what constituted best practice. It does not elaborate on how competency decisions are made.

The introduction of the HPCAA and competency-based practicing certificates have initiated considerable debate in the last five years about competency to practice,

standards of practice, patient safety and public liability within the nursing profession. Neither of the previously mentioned studies address the complexity inherent in expert nursing practice in the field of competency decision-making. This research is important not only because of omissions in the literature. No research has been undertaken determining how educators and clinicians use the NCNZ competency framework, the best practice standards to inform competency decisions and determine competence to practice, or how nurses make competency decisions.

As a profession nursing needs to be able to assure the public that robust methods of assessing competence are used to ensure the public that graduates from nursing programmes are safe to practice. Understanding how nurses determine competence and discovering the processes utilised will not only contribute to the body of nursing knowledge about the practice of nursing, it will assist in identifying how nurses can facilitate assessment of competency to ensure that outcomes are valid and reliable and that public safety is assured.

1.6 Organisation of the thesis

This study contributes a new perspective to the body of nursing knowledge by explaining how nurses manage the competency decision-making process and determine competence to practice. Chapter one has provided an overview of my interest in this subject and the significance of this research. Chapter two explores the literature related to competence and methods of assessment. Chapter three outlines the theoretical underpinnings of the research and introduces the notion of symbolic interactionism and its relationship to grounded theory. This explains the processes inherent in grounded theory and provides methodological rationale for the way in

which the study was conducted and the methods utilised. The research process and details of the study aims, objectives, question, location and participants, including recruitment and ethical considerations are detailed in Chapter four. The substantive theory of Critical Comparative Nursing Assessment (CCNA) is introduced in Chapter five. This provides an overview of the theory that emerged and identifies parameters for consideration. Chapter Six is the first of five chapters that lay out the results of this enquiry. Chapters six (*Gathering*), seven (*Weighing up*), eight (*Judging*) and nine (*Moderating*) each discuss elements of CCNA. These constitute the various aspects of the substantive theory that make up the model of CCNA, explain the strategies that nurses use to manage the process of competency assessment, and the conditions that influence this. Chapter ten discusses the notion of critical comparative analysis and how the basic social process of *comparing* is integral to all aspects of the model, and central to the competency decision-making process. Discussion highlights conditions that influence comparative analysis and the quality of decisions about practice competence. Chapter eleven concludes the thesis by revising the research aims, highlighting the implications of the findings for nursing, identifying the limitations of the study and making recommendations for further research.

1.7 Conclusion

The introduction of the HPCAA has initiated considerable debate about professional accountability and competence to practice. The primary focus of this in nursing has been on post-registration practice and has been concentrated on defining scopes of practice and clarifying advanced nursing practice for Nurse Practitioner roles (Millar, 2004). As nurses have hastened to protect the boundaries of the profession and define

standards for specialist areas of nursing (ICN, 2002; Ministry of Health, 2002; NCNZ, 2003, 2004b), little consideration appears to have been given to the changing health care environment and the implications this has for undergraduate education in New Zealand. Despite the review of competency requirements for entry to nursing practice, there remains a desperate need to clarify the practice expectations of students at varying levels within nursing programmes, and further consider the impact of the changing heath care environment on requirements and expectations of practice for nurses entering the professions.

Clinical competence or 'fitness for purpose' of newly qualified nurses is an important professional issue nationally and internationally. On examination of the literature, it appears that there is no generally accepted definition of competency and that there is variation in the expectations of practice for the beginning practitioner (Crookes, 2000; Diede, McNish & Coose, 2000; KPMG, 2001). While there is considerable literature related to critical thinking and professional judgment, and Benner (1984) amongst others, has drawn attention to issues surrounding clinical decision making and the importance of expertise, no research has been found that explained 'how' nurses make decisions about practice competence. For me, this validated the need for further research to discover what is happening regarding the assessment of competency, and how competency decisions are determined that ensure that graduates exiting from comprehensive nursing programmes are safe to practice.

This chapter has introduced the area of interest, identified initiating factors and provided rationale for conducting the research. Chapter two now presents background literature related to the definition and assessment of competence.

Chapter 2: Background

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2.1 Introduction

This chapter discusses the notion of competence, definitions and terms used to describe the concept of competence, methods of assessing and measuring competence, and factors influencing the reliability and validly of assessment in competency-based assessment. It should be noted that this section of the thesis provides background information only. In keeping with grounded theory, the literature review conducted prior to the commencement of the study was limited to justifying and informing the need for the research. Limiting the exploration of the literature until after the concepts, properties and categories have emerged, ensures that the emerging theory is free from the claims made in the literature and prevents issues related to forcing (Glaser, 1992a). Literature reviewed in the process of theoretical sampling occurring later in the research process, has been treated as data and woven into the theory. This is referred to in subsequent chapters explaining the CCNA model.

2.2 Defining competence

A number of authors (Alspach, 1992; Bradshaw, 2000; Calman, 2006; Chambers, 1998; Cowan, Norman, Vinoda and Coopamah, 2005; Girot, 1993; Grundy, 2001; McMullan, Endacott, Gray, Jasper, Carolyn, Scholes, & Webb, 2003; Milligan, 1998; Mustard, 2002; Watson, Stimpson, Topping, & Porock, 2002) make reference to the existence of multiple definitions of competence, and how nebulous the concept of competence is. Cowan, Norman, Vinoda and Coopamah (2005) claim that lack of consensus about the concept has contributed to this, and the confusing and contradictory nursing literature on this topic. The inconsistent use of the word

competence and competency has added to this confusion. While (1994) makes a distinction between competence and performance, and concludes competence is dependant on clinical performance. Woodruffe (1993) also raises this point suggesting that while competence is an aspect of a work that can be performed, and competency is the behaviour underpinning the performance of the work, the distinction between the two is easily blurred. McMullan, Endacott, Gray, Jasper, Carolyn, Scholes and Webb (2003), hold a similar view suggesting that the terms competence, competency, capability and performance are all used interchangeably and inconsistently in the literature. Pearson, Fitzgerald, and Walsh (2002), concur suggesting that the term competence has no one singular definable meaning. They propose that the term competence describes the characteristics and attributes that underpin competent performance in an occupation, and that this may include possessing insight and awareness of one's own expertise and limitations.

Wolf (1996) contends that differing perspectives about competence can be attributed to the rise of the competency-based movement. This, he suggests, has resulted in the concept of competence becoming over-defined, and reflects the differing philosophical position held on this subject. Cowan, Norman, Vinoda and Coopamah (2005) draw attention to the distinction between behavioural and physiological constructs including cognitive and affective skills. These can be seen in the many definitions of competence and are reflected in the variety of words used to describe these. They include words such as ability, sufficiency, adequacy, capacity and transferability, which imply that competence is demonstrated by the physical act of completing tasks to a predetermined level of performance. Other definitions make references to the unobservable attributes, capacities, dispositions, attitudes and

values inherent in a profession, and suggest that competence is also about having knowledge, and acting in ways that are congruent with the philosophical beliefs underpinning practice.

Ashworth and Saxton (1990), contend that differing perspectives of competence arise because this is an act of human activity, and one which has not yet been coherently specified. They suggest that a significant contributing factor to the inconsistency in defining competence is that "it is not clear whether competence is a personal attribute, an act, or an outcome of action" (p. 3). Notions to this effect continue to be apparent in the literature, which reveals three differing viewpoints about the nature of competency and how it is assessed. Gonczi (1995) clarifies the debate by categorising the varying perspectives on competency as the task-based, general personal attributes and the integrated approaches.

2.2.1 Competence - Task-based perspective

The task-based or the behaviourist, approach conceptualises competence as a set of discrete behaviours associated with the completion of an individual task. In this situation, the task becomes the competency and the assessment of this is based on direct observation of performance. In nursing, the generation of task checklists for specific nursing skills, believed to demonstrate competence to practice, provides a good example of this approach (Bjork, 1997; Elzubeir & Sherman, 1995; While, 1994). The disadvantage of this form of assessment is that it is unconcerned with the connections between the task and the context of practice. Neither does this take into account the wholistic nature of nursing practice, or the individual circumstances and needs of patients. Gonczi, Hager and Athanasou (1993), contend that those who

follow this approach to competency assessment see curricula as preparing graduates to meet "task specified occupational competency standards" (p. 2). They argue that the weakness of this approach is that "it is reductionist, ignores underlying attributes, ignores group processes and their effect on performance, is conservative, atheoretical, and ignores the role of professional judgments in intelligent performance" (Gonczi, et al., 1993, p. 2). Gonczi (1994) concludes that this form of competency assessment is inappropriate for conceptualising professional practice.

2.2.2 Competence - The general personal attributes perspective

The general personal attributes perspective acknowledges the attributes of the person undertaking the task. General attributes typically include, knowledge, communication skills, the ability to think critically and analyse a situation, and more recently emotional intelligence (Scott, 2003). The underlying assumption of this perspective is that the person who has these attributes will be able to apply them to a range of tasks in a variety of practice contexts. This approach relies on the existence of a generic set of competencies. Gonczi (1995) contends that attributes underpin the notion of competence, and because they are often referred to as competencies, this results in competency being interpreted as the "combination of attributes underlying…professional performance" (p. 5). However, he identifies that there are a number concerns with this approach. He argues that "there is no certainty that generic competencies actually exist" (p. 2) that can account for the individualistic nature of human activity, or that these could be applied across disciplines in competency assessment. This view is supported by McAllister (1998), and evidence produced by Benner (1984), and Darbyshire (1994), suggest that high levels of competence (professional expertise) are domain specific. McMullan et al., (2003)

further highlight this by drawing attention to the importance of context, and the different ways of practising. Further to this, issues related to objectivity of tools used to assess personal attributes raise questions about validity and reliability of assessment outcomes.

2.2.3 Competence - An integrated perspective

The integrated approach "seeks to marry the general attributes approach to the context in which [assessment] will be employed" (Gonczi, 1995, p. 2), and incorporates the evaluation of attributes (qualities) identified by the professions that are considered necessary for job performance, and the occupational tasks associated with the position. This acknowledges the knowledge, abilities and attitudes displayed in the context of a specifically chosen set of professional tasks appropriate to a profession, and specifies expected level(s) of practice.

Gonczi (1995) argues that an integrated approach defines competence in a wholistic manner that captures the richness and integrated nature of professional practice. Using integrated definitions as a basis for the formulation of professional standards of practice and assessment results in a more comprehensive evaluation of performance. This and integrated competency assessment methods incorporate the idea of professional judgment with competence being demonstrated by the "complex structuring of attributes needed for intelligent performance in specific situations" (p. 2).

Benner (1984) describes competent practice as consisting of conscious, deliberate planning where the nurse sets priorities and is efficient and effective in routine situations. She uses the words competency and proficiency synonymously.

As previously identified, the integrated approach to competency assessment typically includes the assessment of personal and professional attributes, and a set of tasks, which wholistically reflect the components of the role. For assessment purposes in nursing, components of practice are often organised into what are referred to as domains of practice. Within these, standards of practice are identified and form the basis of performance criteria. These are used as a framework to validate competence and guide professional judgment about this. This form of assessment employs the use of competency-based assessment methods to judge whether a person is competent or not competent, according to the performance criteria (standards) set (Gonczi et al., 1993; Rutherford, 1995; Wolf, 1996).

2.3 Competency-based assessment and professional competence

According to Hayland, (1993) competency-based education and training originated in the USA during the 1960's. This emerged in teacher education during a time when there was a need to make education and training more responsive to the needs of employers. Implementing competency-based education and assessment was viewed as a method of raising the level of skill in the workforce, and more effectively meeting the needs of industry (Rutherford, 1995; Wolf, 1996). During the 1970s, the USA Department of Health, Education and Welfare supported the competency assessment movement by encouraging colleges and universities to develop competence-based curricula. This occurred in conjunction with health reforms, in relation to health education, and was directed at addressing societal concerns about the health care systems and standards of care. Developments in the USA greatly influenced the United Kingdom and other countries addressing similar issues at that

time. These events contributed to competency-based assessment being used widely in the health professions to determine practice competency (Wolf, 1996).

Put simply, competency-based assessment is the assessment of an individual's competence against prescribed standards of performance. Traditionally, assessment of competence has been conducted in two contexts. These are in the field of training and education and in relation to performance review. In education and training, competency-based assessment methods are used to assess the knowledge and skill of the learner against the outcomes of an educational programme. This may be either on completion of the programme, or on an ongoing basis throughout the course of instruction. In the case of performance review, the employee's performance is assessed against a job description and the organisation's goals and objectives (Rutherford, 1995). In both assessment situations, competency-based assessment determines whether a person meets the prescribed standards of professional competence.

While the determining of continued competence is not a focus for this research, the introduction of the HPCAA (2003) has resulted in significant changes being made to licensing requirements and issuing of practicing certificates. This has contributed to the renewed interest in the concept of competence, and how this is demonstrated and assessed. It has also drawn attention to competency-based assessment and the competence of graduates of nursing programmes entering the profession.

In New Zealand, competency-based assessment methods are used to assess student competence. This employs a criterion reference approach to assessment, where,

performance is assessed against clearly specified outcomes. These represent standards of practice identified by the profession as essential for successful (safe) practice. Each competency standard is assessed individually using criterion referencing with the goal of assessing mastery. Assessment outcomes arising from competency-based assessment are judged as competent or not competent. Unlike norm referencing, where the grading of work is based on norms and results in the individual's performance being compared against the performance of others, competency-based assessment requires all standards (criteria) to have been met in order for a pass (competence) to be achieved. Grading is rejected and how an individual's performance compares with that of others is irrelevant (Wolf, 1996). While issues related to the interpretation of the level of performance raise some concern (Andre, 2000; Ashworth, Gerrish, Hargreaves & McManus, 1999), Ashworth and Saxton, (1990) claim that the underlying premise of competency-based assessment provides a more objective assessment of people's performance, and therefore provides an accurate measure of an individuals capability and level of competence.

The competency-based assessment process involves the collection and interpretation of evidence of practice that demonstrates that learning has occurred, and that the required level of performance has been achieved. Within the traditional education system, evidence of learning often takes the form of written assessments and examinations results. These are matched with specific course learning objectives. Collectively these should reflect the competencies the student needs to demonstrate in order to successfully achieve the programme of learning. In clinical practice, sources of evidence extend to include: direct observation of work activities;

responses to oral questioning; and written material including reports, reflective journals, exemplars and self evaluation accounts (Girot, 1993; Marara, 1998). As with traditional sources of evidence, these are considered in relation to the performance criteria.

The use of an integrated approach, such as that described by Gonczi (1995), provides a more wholistic framework on which to conduct the assessment of competence, and a means for formulating a comprehensive set of professional standards that can be used to assess practice. However, consideration needs to be given to the notion of professional competence, and how this is assessed when a competency-based assessment framework is used. When the two are combined, the interface between them causes tensions to occur that raise the degree of complexity of the assessment, and the decision-making needed to inform professional judgment. This may have an impact on the reliability and validity of the assessment outcome (Gonczi et al., 1993; Wolf, 1996).

Gonczi, et al., (1993) note that the use of the word performance implies practice that is directly observable. They argue that this is an issue in assessment of competence as "competence is not directly observable, rather it is inferred from performance" (p. 6). They suggest that it is because of this that competencies are defined as combinations or attributes that underpin successful performance. This may result in interpretation difficulties when professional competence is assessed (O'Connor, Pearce, Smith, Vogeli & Watson, 1999; Rutherford, 1995; Wolf, 1996).

Another factor to be considered is that standards for a profession are often established at various levels to take into account differing expectations of practice (Wolf, 1996). For example, expectations of new graduate nurses, and those of experienced practitioners in advanced roles, differ and require specification of performance level. As competencies are defined as combinations of attributes that underpin successful performance, they tend to be broad statements that are vague, and do not specify level. Because of this, they are also often interdependent on other competencies. For example, to demonstrate competence in completing a task the person being assessed may need to demonstrate competence associated with another element of practice in order to achieve (e.g. completing a dressing, and at the same time educating the patient about the treatment). It is therefore important that the assessor has a clear understanding of the performance expectations required. When evidence of practice displayed in one competency is needed to judge practice in another, this process of decision-making calls on the need to make inferences. This is an example of cognitive processes and how evidence is "aggregated to reach a final judgment about whether competence has been achieved" (Wolf, 1996, p. 67). Wolf (1996), elaborates on this concept further and highlights the risk of bias affecting the assessment stating:

> As assessors do not simply match behaviour to assessment criteria, they utilise internalized wholistic concepts about what an assessment outcome 'ought' to show, and about how far they can take account of the context of performance, make allowances, refer to other evidence about the candidate in deciding what they 'really meant'. For example, assessors will 'make allowances' for whether or not a question or task was particularly difficult in evaluating the candidates response (p. 67).

Another issue affecting the determination of level is the "inherently high variability in the context of the assessment" (Wolf, 1996, p. 67).

Neary (2001) found that, while it was considered important to assess students in the practice setting, "trying to categorize it by using learning objectives that aimed to match the various stages and levels, at which the student was expected to achieve, was problematic for both college staff and practitioners" (p. 7).

Further to this, when assessing professional competence, it should be noted that both attributes and performance are linked. This means that:

> … attributes of individuals do not in themselves constitute competence. Nor is competence the mere performance of a series of tasks. Rather, the notion of competence integrates attributes with performance. According to this integrated conception, competence incorporates knowledge, skills and attitudes displayed in the context of a carefully chosen set of realistic professional tasks or elements which are of an appropriate level of generality (Gonczi, et al., 1993, p. 6).

Registered Nurses hold a position of trust within society. Public expectation is that nurses are competent at point of registration and throughout their career. This includes personal and occupational competence. Personal competence concerns the "…individuals personal qualities, skills, knowledge, motives and aspirations" (Grundy, 2001, p. 261). These are attributes that the person brings to the role of the nurse. Occupational competence focuses on performance. Here, evidence is required to demonstrate the individual's ability to perform to specified standards of professional practice, and demonstrate that they are 'fit for purpose', and competent to practice in nursing (NCNZ, 2004).

Consequently, where professional competency standards are based on an integrated approach, competence is a construct, which is not directly observable, but rather

inferred from successful performance. Performance and observation of this is, therefore, important. Where competency standards directly reflect an observable act, the assessment of competence is easier than in situations that call for use of inference in the interpretation of attributes such as values or attitude.

Clinical competence is a complex phenomenon. As practitioners adapt their practice to differing contexts, they call on the use of a variety of attributes and often use these simultaneously, with the use of some attributes being more overt than others. Where inference is required to mediate decisions about competence, concerns related to the need for sufficient evidence to justify judgment becomes an issue in assessment. The experience of assessors is also of importance, as judgments concerning achievement of standards will require interpretation of the context in which practice takes place, the level of performance of the person being assessed, and the expected level of achievement for each standard (Rutherford, 1995).

The complexity involved in decision-making in regard to these circumstances raises questions about the effectiveness of using competency-based assessment methods to determine professional competence, and in particularly in relation to the assessment of attributes such as values and attitude. Ashworth and Saxton (1990) contend that:

> Assessing involves the perception of evidence about performance by an individual assessor and the arrival at a decision concerning the level of performance of the person being assessed. This is a radically interpersonal series of events, in which there is enormous, unavoidable scope for subjectivity - especially when the competence being assessed are relatively intangible (p. 23).

The assessment process is fraught with difficulty, and biases inevitably influence assessment (Ashworth & Saxton, 1990). While others (Gonczi, 1993; Rutherford,

1995) contend that this issue is overcome by having clearly defined criteria in assessment, engaging in processes of continuous assessment and utilising multiple assessment forms (Nearly, 2000b; 2001), Ashworth and Saxton (1990) argue that prejudice and the interpersonal relationships introduce subjectivity. It is their belief that the specification of assessment criteria is unlikely to affect the degree of subjectivity in assessment. This further highlights issues surrounding inference, which is a necessary component of the decision-making process, and the influence of assessor beliefs and values on the assessment outcome. It draws attention to issues about the validity and reliability of competency-based assessment used in professional practice (Rutherford, 1995; Watson, Stimpson, Topping & Porock, 2002; Wolf, 1996).

2.4 Competency assessment in undergraduate nursing

Girot (1993) identifies that since the 1960s, there have been many attempts to achieve more objective clinical evaluation of student nurse competence. An increase in the number of articles published about competence coincides with the transfer of nursing education from hospital-based schools of nursing to institutions of higher education. According to Cowan, Norman, Vinoda and Coopamah (2005), this arose because of the change in focus of nurse preparation. Hospital-based programmes had relied on standardised syllabi focused on biomedical subjects and practical skills. In this setting, assessment focused on evaluation of tasks and the personal qualities of the student nurse. This included assessment of moral character, and how students interacted with patients and colleagues. According to Bradshaw (2000), this type of training and assessment was designed to ensure that, in addition to examinations, students possessed the personal attributes necessary for competence.

The move of nurse education to institutions of higher education was driven by the then perceived ritualistic approach of apprenticeship-type training to prepare nurses. The advent of diplomas and degrees were perceived to provide a wider knowledge base, and foster the development of critical and analytical approaches to nursing (Cowan, Norman, Vinoda & Coopamah, 2005; Watkins, 2000), and therefore perceived to facilitate the advancement of nursing. According to Chapman (1999), while the transfer of nurse education to institutions of higher education equipped students with broad generic knowledge, and fostered the notions of reflective practice and lifelong learning, this type of education did not necessarily equip students for the realities of the workplace environment. Employers wanted graduates to enter practice with a minimal need for further training. Watson, Stimpson, Topping and Porock (2002) contend that this has contributed to competence becoming a controversial issue in nursing. Grundy (2001) suggests that the perception that the student's practical skills are inapt, resulting in being unable to meet the demands of practice, and issues related to competency assessment are the instigator of criticism of education for failing to adequately prepare graduates.

In order to ease tensions between the interests of employers and education, nursing regulatory bodies advocated the adoption of a competency-based approach to assess student performance, and specified competencies to be demonstrated prior to entry into the profession (Chapman, 1999). Integrated competency assessment methods advocated by Gonczi, et al., (1993) have been widely adopted to facilitate the assessment of performance. This uses competency-based assessment methods, and seeks to assess the combined practice knowledge, understanding, problem solving, technical skills, attitude and ethics. Advantages of this form of assessment are its

ability to assess a number of different aspects of performance simultaneously, employ a number of different assessment methods, and decrease the number of assessments undertaken by students required to demonstrate competence in multiple domains of practice.

Very few studies have been conducted in New Zealand regarding competency to practice and assessment methods. These have previously been discussed in Chapter one. None of these have addressed the assessment of competence of student practice. On exploration of the literature, a number of international publications were found addressing the notion of competence and issues related to assessment of this. The foci of these are diverse and can be loosely categorised as addressing: requirements for competence attributes and nursing skills for competent practice; methods of assessing competence, including the relationship between critical thinking, reflective practice and competence; assessment tools and measurement of competence; and issues related to the validity and reliability of assessment outcomes.

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2.4.1 Competence requirements: Attributes and skills

Several studies have been undertaken that focus on the identification of competency requirements for practice, attributes and skills, and how these can be assessed (Badger & Rawstorne, 1998; Barker, Williams & Smith, 2001; Bechtel, Davidhizar & Bradshaw, 1999; Boxer & Kluge, 2000; Chapman, 1999; Clark, Owen & Tholcken, 2004; Darbyshire, 1994; Fulbrook, Rolfe, Albarran & Boxall, 2000; Grundy, 2001; Meerabeau, 2001; O'Brien, O'Brien, McNulty, Morrison-Ngatai, Skews, Ryan, Hardy, Gaskin & Boddy, 2002; O'Connor, Pearce, Smith, Vogeli & Watson, 1999; Utley-Smith, 2004; Watson, 2002; Wissmann, Hauck & Clawson,

2002; Zang, Luk, Arthur & Wong, 2001). The majority of these have focused on post-registration assessment of competence, advanced practice and requirements of specialty areas. Few studies have been found that focus specifically on determining the requirements and attributes needed for students in undergraduate education, or newly registered nurses.

Boxer and Kluge (2000) undertook a study in Australia to determine the essential clinical skills for beginning registered nurses. This identified that the most frequently performed clinical skills were those related to universal precautions for infection control, vital signs assessment, management of intravenous therapy, administration of medication, and a wide range of patient related hygiene skills. Although this study did not attempt to measure the degree of competence demonstrated by the nurses undertaking these skills, or discuss how competence is assessed, it raises questions about the preparation of nurses and assessment of competence requirements for new graduates. Boxer and Kluge (2000) suggest that further study should be undertaken to determine the critical skills that nurses need on entry to practice. Unlike the majority of the literature reviewed, which portrays competency as being a reflection of wholistic practice, and utilises integrated methods for assessing this, Boxer and Kluge advocate a task-based assessment approach be used to assess safe practice, with the student's ability to perform specific clinical skills determining competence.

Utley-Smith (2004) undertook a study of new baccalaureate graduates to identify the competencies needed in the health care environment. A cross-sectional survey was completed by 365 nurse administrators. Findings revealed that six aspects of competency were required for practice. These were competency in health promotion,

supervision, interpersonal communication, direct care, the use of computers, and caseload management. While the findings of this study provide an analysis of requirements needed to fulfill a new graduate role, and are important for curriculum development, they do not address how new graduate performance in these tasks might be assessed.

Clark, Owen and Tholcken (2004), collected data from students about their perceptions of competence in relation to measuring performance of nurses caring for people with chronic illness in the community. This study was a preliminary work designed to gather information that would later be used to develop an assessment tool. It advocates using student perceptions to find more insightful ways to measure how students are using course material. While this research provides insight into student perceptions about competence to practice in a specific area, and presents a tool to facilitate assessment, it does not address how this is used or the processes employed by assessors to make decisions about the competence of students.

Badger and Rawstorne (1998) undertook an evaluative study of pre-registration nursing students' skills in life support. The study was designed to assess competence. This was limited to the performance of tasks associated with resuscitation, and did not include assessment of student knowledge. This study identifies the importance of competent practice, and the risk to public safety if students are unable to perform life saving procedures. It does not elaborate on the criteria used in the assessment, and / or how competence is measured. Like other studies (Bjork, 1997; Elzubier & Sherman, 1995) that have attempted to address the assessment of competence by specifying tasks, there appears to be little consistency in the literature regarding

these, with most of the literature focusing on the development of assessment tools and methods of assessing practice as opposed to how competence is determined.

2.4.2 Methods of assessing competence

While observation of practice at the bedside has traditionally provided the means of assessing students (Bradshaw, 2000), the advent of the use of an integrated approach has resulted in a wide variety of assessment methods being used to evaluate performance. These included the use of: simulated assessment, including objective structured clinical examinations (OSCE); videoing practice; case studies; critical incidents; nursing care plans; portfolios; journaling; critical reflection; and self and peer assessment. While some of the studies describing the use of these methods explained the utilisation of a single tool, a number of these adopted an integrated approach to assessment by incorporating multiple assessment methods.

Pearson, Fitzgerald, Borbasi, Walsh, Parkes and Lazarevic, (1999) advocate an integrated assessment approach. This combines theory and practice to formulate a wholistic assessment framework. This is generally problem orientated, includes aspects of professional practice, incorporates the assessment of a number of competencies, and demands analytical ability and problem solving. This form of assessment is used in a number of professions including nursing, medicine, dentistry, physiotherapy, law, and accounting to assess practice competence. Objective Structured Clinical Examinations (OSCE) is an example of an integrated assessment. This has been used widely to assess medical and nursing students. OSCE uses a simulated practice situation to evaluate practice competence in a controlled environment. This addresses safety issues associated with practice in acute contexts.

While simulated assessments such as OSCE provide insight into the student capability in a controlled environment, practice contexts vary. As a result, it is believed that demonstration of competence in one setting does not necessarily equate to practice competence in another. Furthermore, that context may inhibit skill transferability (Schoening, Sittner & Todd, 2006).

While there is a danger of inferring that competence in a simulated assessment setting will be commensurate with that in the practice context, positive evaluations of the use of OSCE and other forms of integrated assessment utilising simulation have been reported (Andersen & Booth, 2006; Badger & Rawstorne, 1998; Priest & Roberts, 1998; Schoening, Sittner & Todd, 2006; Walters & Adams, 2002). These provide valuable information about the organisation of this type of assessment, and give detail of the types of scenarios presented to students and the tasks assessed. They do not however, elaborate on whether the evaluation process increases the student's knowledge and skill acquisition, and it is not clearly explained how differing levels of performance are accounted for in the assessment process, or how these are used to determine student competence.

Videoing student practice is described by Winters, Hauck, Riggs, Clawson and Collins (2003), and Campbell and Williams (2007) as a method of assessing development of practice. Videoing has been used in educational settings since the 1960s as a method of facilitating discussion, observing role models, and for providing students with feedback on their performance. Like OSCEs, videoing student practice incorporates simulation and provides a safe practice and learning environment. The advantage of videotaping over OSCE is that this removes the

distraction and stress impacting on performance when the assessor is present. Winters, Hauck, Riggs, Clawson, and Collins (2003), claim that this technology is an effective method for teaching and assessing competencies. As a formative assessment method, the opportunity to view one's own practice and / or having multiple opportunities to work through practice problems, is a valuable means to assist students to address deficits, and develop confidence in practice. Similar practices have been helpful for teaching and assessing CPR (Badger & Rawstorne, 1998; Campbell & Williams, 2007).

While this innovative method of assessment provides another means of observing practice, Winters, Hauck, Riggs, Clawson, and Collins (2003), identify limitations regarding its use in the assessment of competence. They found that some skills are not easily evaluated using the video method. For example, skills such as medication administration could be performed correctly with many variations. This highlights the difficulty of assessing competence and using competency-based assessment methods to determine competence. Because of the diversity in methods, and requirements of treatment, nursing care and the approach taken by the student may be different to that specified in the criteria for assessment. The nursing practice, however, may be appropriate and safe. Similar issues are apparent in other forms of simulated assessments such as OSCE.

In order to overcome this and manage the subjectivity associated with inference, the assessment criteria needs to be extensive (Rutherford, 1995). This may not be applicable to all scenarios and raises questions about how the assessment is managed, if all criteria are not achieved. It draws attention to issues related to the reliability and

validity of assessment. These issues have challenged nursing education to move out of the laboratory and use the clinical setting for teaching and assessing practice (Bjork, 1997). Winters, Hauck, Riggs, Clawson, and Collins (2003) also found that skills that required observation of fine motor movements are difficult to video, and while the use of self and peer assessment was useful, they noted that students tended to work with peers who had similar abilities. This resulted in peer partners making the same errors and evaluations that did not always reflect performance.

Written documentation, such as case studies (Jones & Sheridan, 1999), critical incidents and nursing care plans (Wilkinson, 2001; Youngblood & Beitz, 2001) can be used as both teaching and assessment tools. These provide an opportunity for students to make explicit their ability to problem solve, think critically, assess patients, respond to problems, plan care, and demonstrate nursing and scientific knowledge. Documentation such as that described above also provides the opportunity to assess the student's ability to communicate in a logical, clear and concise manner. Piercey (1995) argues that, based on information embedded in written materials, nurse educators can draw conclusions related to cognitive and affective domains underpinning practice.

Critical incidents provide a method of assessing student practice in relation to specific practice episodes. Here, the focus of assessment is on judgment and / or action. These forms of theoretical assessment can be used as tools to assess students' problem solving and analytical abilities (Beveridge, 2003). While there is potential to use these to determine competence, their use is largely associated with theoretical components of educational programmes. The weighting attributed to these academic

tasks, how these are applied in the assessment of competence, and how they align with practice and the competency standards, is largely unexplained.

Literature was also found discussing the link between evidence-based practice, critical thinking, nursing knowledge and competency to practice (French, 2002; May, Edell, Butell, Doughty & Langford, 1999; Maynard, 1996; White & Taylor, 2002). This highlighted the contribution of reflection on practice, and the crucial role this plays in facilitating learning (Benner, 1984). The value of incorporating reflection in competency assessment methods, is that it provides the assessor with the opportunity to determine the degree of insight that the student possesses, their ability to transfer learning that has occurred in the class room into the clinical situation, and the ability to recognise the relevance of this to developing practice.

Journaling, and the use of self-evaluation and critical reflection techniques, are advocated as methods for enhancing the development of practice competence (Walsh, McAllister, & Morgan, 2002). The use of these techniques is widely reported in nurse education and used to facilitate critical thinking and knowledge transfer (Beveridge, 2003). While studies identify the value of reflection, self evaluation and the development of critical thinking as being essential for competent practice (French, 2002; May, Edell, Butell, Doughty & Langford, 1999), the majority of studies reviewed focused on the use of these activities in the development of diagnostic reasoning and clinical decision making. While these studies make reference to the relationship between reflection, critical thinking, and competency standards, the criteria for assessment and how this is applied to assess practice competence, is not thoroughly explained.

Karlwicz (2000) claims that while used extensively for recording experiences and achievement of competencies for registered nurses, there is a growing interest in using portfolios as a method of evaluating student competence. These can be used to showcase course work that demonstrates the attainment of professional competencies, as well as demonstrating the realisation of personal and educational goals. Portfolios provide the opportunity for students to illustrate their ability to synthesise and use research findings, and apply professional standards. These methods, however, are criticised for being time consuming to produce and to mark. According to Karlwicz (2000), despite their popularity, and the contribution portfolios can make to determine competence, they have limitations that draw attention to their validity and reliability. Karlwicz (2000) asserts that there is a lack of research-based evidence that supports the claim that portfolios can be used to assess overall performance. Issues related to authenticity are also of concern, as are the marking of the portfolio, and discrepancies between assessors. Further to this the lack of standardised measures raise questions about interrater reliability, and whether portfolio analysis can produce accurate predictions about competence to practice.

As previously identified, there are a number of different methods that can be utilised to inform decisions about competence. Neary (2000b; 2001) advocates continuous practical assessment, and argues that having multiple opportunities to assess over a period of time, and utilising different methods, results in a greater likelihood that this will be objective. Neary contends that using a variety of methods increases the amount and variation of evidence on which to make professional judgment. This is in keeping with an integrated approach, and assists in determining whether students possess the skills, and attributes necessary for competent practice. While this would

appear straightforward, conflicting opinion, the lack of an accepted definition of competence, and issues concerning the measurement of performance have resulted in the development of a plethora of tools to assess performance.

2.4.3 Assessment tools and measurement of competence

Problems concerning the measurement of competence, the dissatisfaction with existing assessment tools, and the need for competency assessment methods that are fair, valid and reliable, have driven the literature concerning competency assessment in nursing. This has primarily been focused on the assessment of undergraduate students, determining competency requirements for entry to professional practice, and the development of tools to assess this. While the development of task checklists are helpful (Bjork, 1997; Elzubeir & Sherman, 1995; While, 1994), by identifying elements of practice that are considered essential to the safe delivery of care, the issue of measurement of practice remains problematic (Andre, 2000; Buckingham, 2000; Freeth & Nicol, 1998; Horsburgh, 2000; Neary, 2001; Nicol & Freeth, 1998; Robb, Fleming & Dietert, 2002).

Bondy (1983) sought to address this issue by developing criterion-referenced definitions for rating clinical performance. These definitions provided a framework for grading performance according to specified levels of practice. Each level is assigned a numerical value. This is recorded against specified criteria of performance that represents various elements of practice. Scores are tallied with the outcome of the calculation designed to determine the level of student practice, and whether this meets the prescribed level. The assessment tool is technical, and using this is time consuming. The exclusiveness of the criteria and its interpretation raise similar issues

as those previously discussed. This includes concern about interrater reliability, and whether the outcome of analysis can produce accurate predictions about competence to practice.

O'Connor, Pearce, Smith, Vogeli and Watson (1999) undertook research to determine the competence of newly qualified nurses. They used rating scales in an attempt to overcome the subjective nature of assessment. While they were able to compare senior nurse's expectations of the level of competence of newly qualified nurses with those of preceptors conducting competency assessment, they identified the need for consensus about what is an acceptable level of performance for newly qualified nurses. They concede that in order to estimate competency by objective means, further development of their tool was required, and advocated that research should be conducted to compare methods and determine competence of practice on qualification as a nurse.

The adequacy of some assessment tools to assess competence, including personal attributes, and requirements for specialty practice areas have been raised by some authors (Buckingham, 2000; Chambers, 1998; Dolan, 2003; Smith, 1997; Waddell, 2001). While tools provide sources of evidence that may be useful in informing decisions, they do not address issues related to how assessors use these to inform decisions, and how they know that practice is competent. While competency-based assessment is designed to be objective, the assumption that the influences of being human are set aside, and that competency-based assessment is free of norms is challenged by some (Wolf, 1996). According to Girot (1993) using rating scales is open to different interpretation, and have been criticised for their lack of reliability.

Attree (2006) argues that "no toolkit of standardised 'off the shelf' valid, reliable and sensitive measure exists to evaluate performance" (p. 640). Mahara (1998) and Wolf (1996) support this position arguing that the dynamic nature of the context of nursing, and the uniqueness of caring for individuals, have resulted in no one assessment method being found that can successfully evaluate overall clinical competence.

2.4.4 Validity and reliability of assessment.

As previously identified, a diverse range of tools is required to assess the different aspects of practice. The variation in tools has raised concern about the consistency of assessment, and whether judgements arising from these can be generalised (Dolan, 2003; Girot, 1993; Smith, 1997). The literature abounds with publications which discuss the thorny issue of subjectivity, and present a plethora of assessment tools that have been developed and abandoned in the quest to overcome this problem (Woolley, 1977). Chambers (1998) argues that "the validity of tools used to asses clinical competence are difficult to establish, making objective assessment complex at best, and impossible at worst" (p. 201). The unresolved issue of valid and reliable assessment methods to determine competence has resulted in the search for valid and reliable methods of assessing competence.

Norman, Watson, Murrells, Calman and Redfern (2002) undertook a study to assess the reliability and validity of tools used to assess student competence in the United Kingdom. This study spanned two years and collected assessment data from 257 nursing students and 43 midwifery students studying in four educational institutions. Correlational analysis of data showed that there was little or no relationship between

most of the competence assessment tools used. Norman et al., conclude that there is no single method yet determined that is appropriate for assessing clinical competence. Attree (2006) supports this position, and claims that this is because assessment tools are developed on evidence that is "largely derived from small scale, single case studies, [with] the majority of measures being self devised" (Attree, 2006, p. 640). She contends that this results in assessment of practice being based on invalidated tools of unproven reliability, and that the results are often not generalisable. This raises concern about the assessment methods used in nursing, whether these are accurate predictors of competence, and if professional standards and public safety can be assured by their use. No assurance can be drawn from the literature to support that this so.

2.5 Conclusion

This chapter has highlighted that much attention has been given to defining competence and addressing the difficulty surrounding assessing students' practice performance. Girot (1993) identifies that issues surrounding the validity of assessing practice competence have presented in the literature since the 1960s. Forty-five years on, the commentary about competency assessment, best practice, and the need for assessment methods that are reliable and valid continue. Assessment of clinical practice is intended to ensure occupational and professional standards are maintained. The nursing profession is accountable to society, and by inference, those who undertake clinical assessments are accountable to ensure that assessment processes are robust and public safety can be assured (Harding & Greig, 1994). While a number of different competency assessment tools have emerged to guide the assessment process, Attree (2006) argues that assessors need valid and reliable

assessment tools to evaluate knowledge, and its application to practice. This is difficult to achieve in healthcare contexts, where the complexity of practice results in confounding variables that are difficult to control.

The literature presented in this chapter has explored the notion of competence, competency-based assessment, methods of assessing competence, and issues related to the reliability and validly of assessment outcomes. While this supports the notion that nurses are able to take account of the complexity of practice and real life situations (Benner, 1982; 1984; Benner & Tanner, 1987), it highlights the deficiencies of current methods of assessment, and does not adequately reflect the process involved in making complex judgements. Nor does it provide an explanation of the processes underpinning the assessment of competence, how nurses measure practice performance, and / or account for how decisions about competence are made in differing care contexts. Until the processes that demonstrate how nurses do this are revealed, issues related to the reliability and validity of competency assessment processes, and decision making will remain unresolved.

According to Athree (2006), theory provides the knowledge base in a discipline. It can explain processes, conditions and factors that are important for facilitating understanding. There is a need to development more accurate methods of assessing competence and facilitate the management of the assessment process, to ensuring that professional standards and public safety are protected. Theory explaining what is happening regarding the assessment of competence of completing students will assist nursing to address this and the issues raised in this chapter.

The next chapter presents the theoretical underpinnings of this research and outlines how grounded theory, underpinned by the tenets of symbolic interactionism, is an appropriate methodology to have been employed in this research to discover how nurses determine the practice competence of completing BN students.

Chapter 3: Theoretical underpinnings, research methodology and methods

3.1 Introduction

Theoretical perspectives inform research methodology and methods. These guide the way in which a study is conducted (Crotty, 1998). Grounded Theory (Glaser, 1978; Glaser, 1992a, 1992b, 1996, 1998; Glaser & Strauss, 1967) underpinned by symbolic interactionism (Blumer, 1969) was the methodology used for this study. In order to enhance understanding of the methodology and methods used in this research, this chapter discusses the philosophical issues underpinning the research methodology and methods utilised.

3.2 Theoretical underpinnings of the research

Different ideas about the aims and methods of research have given rise to some friction and disagreement within the research community. This has arisen as a result of criticism of the positivist approach to research. The positivist approach to research is one which focuses on 'hard facts', natural phenomena and scientific methods. It lends itself to quantitative methods and statistical analyses. The empirical nature of the positivist approach is one of its most important features (Davidson & Tolich, 2003). This is characterized by the research procedures, which aim to demonstrate how results are obtained and the ability of these to be replicated (Polit, Beck & Hungler, 2006).

For some time now the scientific method has been scrutinized and criticized by philosophers, scientists, creative artists, social critics and social scientists (Cohen & Manion, 1994; Davidson & Tolich, 2003). Since the mid nineteenth century the core ontological and epistemological assumptions of the scientific method have been

challenged. Its reductionist, objective, mechanistic and empirical nature has become transparently inadequate for examining naturally occurring phenomena involving people (Polit, Beck and Hungler, 2006). Individual lives, minds and social realities cannot be accounted for using a positivist approach to research in the social context.

Nursing education occurs in a complex, multifaceted, social context. There are differences between the people involved, and the contexts in which clinical teaching and learning take place. All clients are different and require differing levels of nursing skill and intervention to achieve positive health outcomes. The contexts of research in this arena are diverse, multi-dimensional and comprise numerous variables. Many of these factors are impossible to control, thus rendering a positivistic research approach inappropriate. For educational and nursing research, an alternative approach would seem more appropriate, one that caters for specific situations and provides rigorous and valid data, and which takes into account the 'real world context' of the subject of study and the people involved.

In recent years, there has been a tendency for nursing research to adopt interpretive and critical paradigms using qualitative methods (Davidson & Tolich, 2003). Interpretive enquiry is regarded as humanistic and wholistic with regard to its treatment of people. It is premised on certain fundamental principles, which distinguish it from positivist inquiry. According to Bassey (1999)

> Interpretive researchers reject the positivists' view that the social worlds can be understood in terms of general statements about human actions. To them the descriptions of human actions are based on social meanings…people living together interpret the meanings of each other and these meanings change through social intercourse (p. 43).

Therefore, understanding a social act cannot be divorced from the socio-cultural circumstances (Mezirow, 1996). Davidson and Tolich (2003) contend that "[The] interpretive approach is the systematic analysis of socially meaningful action through the direct detailed observation of people in natural settings in order to arrive at understandings and interpretations of how people create and maintain their social worlds" (p. 26).

Cohen and Manion (1994) assert that an interpretive approach takes into account the individual, has a focus on action (behavior with meaning) and from a theoretical perspective, theory is emergent. As in grounded theory, theory follows the research and does not precede it. Interpretivists seek to understand the lived world from the viewpoint of those who 'act' in it (Singleton & Straits, 1999). The roots of grounded theory can be found in the interpretive tradition of symbolic interactionism, which speculates on issues related to human behaviour (Streubert, Speziale & Carpenter, 2003). For this reason, grounded theory, a methodology positioned within the interpretive paradigm, was selected as the methodology for this study.

3.3 Symbolic interactionism

Underpinning grounded theory, symbolic interactionism embodies the tenets of the interpretive paradigm and is a branch of interpretive sociology. It was developed in reaction to the grand functionalist theories of social action that dominated sociological thought during the mid nineteenth century (Bowers, 1988, Charon, 1998). Developed originally by George Herbert Mead, the intellectual development of symbolic interactionism was influenced by many sociologists, philosophers and psychologists, most of whom were closely associated with the Chicago School of

Sociology. Of these, Herbert Blumer comprehensively articulated the work of George Mead and developed Mead's ideas further (Bowers, 1988), coining the term symbolic interactionism in 1937 (Blumer, 1969).

Symbolic interactionism aims to explain social action by understanding the ideas, values, interpretations, meanings and the social world of individuals (Charon, 1998). It is underpinned by three assumptions. These are: human beings act towards things based on the meanings things have for them; meaning arises from communication with others and facilitates the construction of self; and people use interpretive processes to deal with the world (Blumer, 1969). This theory of social action is organized around three central concepts. These are the self, the world and social action (Blumer, 1969; Bowers, 1988; Stryker, 1980). In Meads theory, '*the self*' is composed of two components, these being the 'I' and the 'Me'. The 'Me' is that part of self that can be identified and talked about. It is conceptualised as the object of self-reflection, while the 'I' component is the reflector. Self-identity emerges from the social interactions of humans and is adjusted and modified in changing situations. "Mead regards this ability of the human being to act toward him-self as the central mechanism with which the human being faces and deals with the world" (Blumer, 1969, p. 80).

According to Mead's theory, rather than being the physical world, '*the world*' refers to the social world that is interpreted and experienced. The term 'object world' is used to describe the world as individuals interpret it. In symbolic interactionism, an object is anything that can be named, described and reflected on. This includes "everything from physical objects to abstract concepts. Anxiety and professionalism

are no less objects than are chairs and hats. For the symbolic interactionist, objects have no inherent meaning. Their meaning is derived from how people act toward them" (Bowers, 1988, p. 38).

As individuals define the meaning that objects have for them, the meaning of 'things' may vary from one individual to another and may change over time. As a result, what is reality for one person may be different for another. "This notion of multiple realities precludes the development of anything comparable to operational definitions used by other research methods" (Bowers, 1988, p. 39). The prime objective of an interactionist as a researcher is to discover the realities of people, the nature of the objects in their world, their experience of that world and how the process of social interaction directs their behaviour and actions.

According to Mead, the processes of social interaction and '*social action*' occur as a result of a series of events and processes that take place among individuals in the context of the social world (Blumer, 1969). Socialization helps individuals to learn the meanings of 'objects' by observing and interpreting how others act and react to these. In doing so, emersion of the individual in the social context assists the construction of self, and reality facilitates understanding, directs behaviour and assists people to predict the behaviour of others.

Symbols such as verbal and non-verbal gestures designate objects within the social world. Symbols, which have a shared meaning, allow people to interact in predictable and meaningful ways (Gladwell, 2005). Language is an example of a shared symbol, which facilitates understanding and social action. In addition,

because of their shared definitions and object worlds, cultures and religions once internalized, also facilitate understanding resulting in norms and conformity of action (Bowers, 1988, 2003; Gladwell, 2005).

Social (symbolic) interaction is "a complex active series of social processes involving the fitting together of lines of behaviour of the separate participants" (Blumer, 1969, p. 70). Symbolic interactionism provides the researcher with the framework to unravel the social context. By focusing on the individual rather than on the social system, the ideas, values, experience and realities of people, from the perspective of their world can be discovered, and the process of social interaction and how this directs behaviour and actions can be explained. In order to achieve this, analysis begins with the individual rather than the larger group or system. The direction of analysis is from the individual up through social groups, organizations and institutions. This is in contrast to grand theorists, who begin with theory and attempt to validate it empirically working from the top down through the system and its parts to the individual (Bowers, 1988).

Taking a symbolic interactionist approach using grounded theory, acknowledges that the participants in this study would be influenced by their backgrounds. In addition to family, culture, education, personality and other variables that constitute the individual and society generally, the participants would also be influenced by their nursing education and experiences within the society of nursing. This is important as this influences the participants' understanding of competence in nursing and how they assess this.

3.4 Research methodology

3.4.1 Grounded theory

The development of the grounded theory approach is credited to Barney Glaser and Anselm Strauss who, like others connected with the development of symbolic interactionism, were associated with the Chicago School of Sociology. According to Schreiber and Stern (2001), "Grounded theory is a major qualitative method…that has made a significant impact on the development of social theory and more recently in nursing research"(p. 1).

Since the development of grounded theory in 1967, the research method has continued to evolve. Two dominant schools of thought have emerged over recent years. These are primarily the result of differing opinions and approaches to process between the two original authors. Strauss and Corbin's (1998) introduction of coding matrix and dimensional analysis has been criticised as having reduced the rich complexity of grounded theory as described by Glaser and Strauss (1967) "to a linear and formulaic recipe" (Schreiber & Stern, 2001, p. 56). Others have interpreted this framework of analysis as forcing data and being unhelpful to the constant comparison analysis method (Glaser, 1992).

Regardless of the approach used, the aim of grounded theory research is to explore social processes that present within human interaction. It was developed for the purpose of studying social and psychological phenomena (Glaser & Strauss, 1967). The primary purpose of grounded theory is to develop a theory about a dominant social process (Giddings & Wood, 2000; Streubert, Speziale & Carpenter, 2003).

Theory is generated from an inductive approach, which allows whatever is theoretically relevant to the population under study to emerge. The goal of a grounded theory researcher is to discover theoretically complete explanations about particular phenomena. In doing so, fundamental patterns and processes that occur in social life become apparent. Because of this, grounded theory is a useful method for research in areas that have not been previously studied or where there are gaps in understanding and new perspectives might be beneficial (Chenitz & Swanson, 1986; Schreiber & Stern, 2001).

3.4.2. The research process of grounded theory

Despite there being varying versions of how to undertake grounded theory research, the fundamental elements guiding the research process are considered to be theoretical sensitivity, constant comparative analysis, theoretical sampling, use of literature and memo writing.

3.4.2.1 Theoretical sensitivity

Theoretical sensitivity is the process by which the researcher guards against potential biases that can threaten the rigour of the study. It is the "ability of the researcher to think inductively and move from the particular (data) to the general or abstract" (Schreiber & Stern, 2001, p. 60). Development of theoretical sensitivity requires practice (Glaser, 1992a). It helps diminish potential bias from the researchers' background and prevents premature closure of theory development in favor of the researchers' personal beliefs and ideas.

To develop theoretical sensitivity, the researcher must recognize and constantly challenge their personal ideas about the study topic. Memoing is advocated as a method of promoting theoretical sensitivity (Glaser, 1978, 1994, 1998; Glaser & Strauss, 1967; Schreiber & Stern, 2001). The researcher memos their understanding, assumptions and personal ideas about the topic under study and sets these aside to compare against the data at a later date. This is not the same as bracketing used in other interpretive methods. In grounded theory everything is data (Glaser, 1998) including the experience of the researcher, which is acknowledged and recognized as being unable to be removed from the research process. Glaser (1992a) argues that personal experience with the phenomena under study is vital to the analysis' process and aids the researcher in identifying important information arising from the data. Theoretical sensitivity assists the researcher to detect degrees of difference in the data, and be responsive to this. By being able to ask questions of the data and remain open to impressions, the researcher engages in a process of constant comparative analysis. This allows for the emergence of theory that is grounded in the data. This process is central to the method of grounded theory.

3.4.2.2 Constant comparative analysis

Constant comparative analysis (Glaser 1992a, 1998; Glaser & Strauss, 1967) is used to analyse data gathered from a variety of sources. This process requires the researcher to engage in a systematic process where data are compared to determine similarities and differences. Using a Glaserian grounded theory approach, constant comparative analysis is used in three levels of coding that result in the generation of theory. The levels of coding are known as first, second and third level coding.

First level codes are often referred to as in vivo, or open codes. Reading through an interview transcript or other documents and carefully examining the meaning of what the participant or author has relayed, identifies these. The content of the data is coded by fracturing it into abstract segments. First level codes contain the smallest conceptualized portions of data. When undertaking first level coding, constant comparative analysis is used to compare incident with incident to identify similarities and differences. The names given to the codes arising from this process are often words that the participants used to describe their experience.

Second level coding commences when the researcher notices similarities in the concepts identified in open coding and incoming data. The goal of second level coding is generation of "an emergent set of categories and their properties which fit the data, work, and are relevant for integrating into a theory" (Glaser, 1978, p. 56). To achieve this the researcher examines and collapses first level codes into categories.

When the researcher has successfully collapsed the first level concepts into categories, the focus of the analysis changes to examining the relationship between and among the categories (Schreiber & Stern, 2001). Third level coding then commences. At this stage of the analysis, hypotheses about the emergent categories are formulated. Theoretical codes assist this level of analysis. Theoretical codes are emergent and "weave" the fractured story back together. "They provide models for theory generation and emerge during coding, memoing and sorting" (Glaser, 1998, p.163). Development of theoretical codes enhance the level of abstraction and complete the concept formation phase by conceptualizing how the categories

interrelate, and account for resolving the participants main concern (Glaser, 1998).

Using theoretical sampling, these are tested and with further data collection and

analysis the researcher confirms categories and their properties. To achieve this the

researcher engages in inductive and deductive thinking processes. Constant

comparative analysis is central to all levels of analysis including coding and sorting

memos in grounded theory.

3.4.2.3 Theoretical sampling

In grounded theory, theoretical sampling is a deductive process undertaken to delimit

the collection and analysis of data, and verify the properties of categories. It is the

process whereby data are collected, coded and analysed simultaneously to generate

theory. It is directed by the emerging codes and categories and "is the 'where next' in

collecting data, the 'for what' according to codes, and the 'why' from the analysis of

memos." (Glaser, 1998, p. 157). As categories emerge, "the researcher targets

certain groups or subgroups for data collection…to test and refine emerging

categories" (Schreiber & Stern, 2001, p. 64). By seeking different perspectives on a

topic, the researcher is challenged to develop explanations for the variation in the

data and to unify them at a more abstract level into theory. To assist in raising the

level of abstraction, memoing or diagramming is undertaken throughout this process

to record ideas.

During theoretical sampling the researcher explores more than one data source

(including literature) to provide a wide perspective on the phenomena. This may lead

to exploring the topic of study in other groups or circumstances to elaborate and

saturate categories. Theoretical sampling continues until saturation has occurred and

no new information is identified. As a result of theoretical sampling and constant

comparative analysis, concepts emerge which integrate categories. These validate the relationship between categories and the context within which they occur. This process reveals the Basic Social Process (BSP) as a core category, which accounts for the most variation in the problematic pattern being researched.

There are two types of basic social process. These are a basic social psychological process (BSPP) and a basic social structural process (BSSP). Both should explain rather than describe the phenomena under study. These are described as "a central theme or concept that holds all the data together" (Stern & Pyles, 1986, p. 7). The core category or BSP reoccurs frequently in the data and reveals the process used by the participants to resolve a social problem or phenomena. A BSP "has clear and grabbing implication for formal theory" (Glaser, 1978, p. 95). It has the ability to accommodate change over time and is labeled as a gerund that embodies the actions of the participants. The BSP illuminates the main behaviour of the participants in the substantive area of enquiry and explicates "what is going on in the data" (Glaser, 1978, p. 94).

3.4.2.4 Memoing

Memoing commences during the research planning stages and continues throughout all phases of the research process. According to Glaser (1998), memos keep track of the emerging theory. They consist of the researcher's ideas and theorising about substantive codes and their relationship to the emergent theory. In short, they "capture the meaning of conceptulised ideas" (Glaser, 1998, p. 178), and may vary from being a few words to a detailed account of the researcher's thoughts about data, and the development of the research. As the research proceeds, memos become

increasingly theoretical, suggesting relationships among the categories and concepts (Schreiber & Stern, 2001). Memos provide an audit trail of process and decision making through the research, sorting these memos aids the development of theory and the writing of the final research report.

Diagramming is another form of memoing, which assists the researcher to reflect on and understand the relationship(s) between emerging categories of data. Diagrams may take the form of scribbles or arrows with words. Visually putting ideas together in this manner can assist the researcher to identify what is missing, identify causal relationships and progress theory development.

3.4.2.5 Use of literature in grounded theory

Although it is accepted that the researcher's experience is part of the research and they cannot "unlearn" what is already known, there is a risk that conducting a literature review in the area of interest prior to the commencement of the research, may influence the researcher to superimpose preconceived ideas onto the data. To avoid this, Glaser, (1978, 1992a, 1992b, 1998), Glaser and Strauss (1967), and Strauss and Corbin (1998) advocate avoiding a literature review or limiting this to validating the need for the area of study. Alternatively, to promote theoretical sensitivity, they suggest reading related and unrelated professional literature to expand one's ideas about issues surrounding the area of interest. Once the core category or BSP is revealed and the grounded theory well formulated, a literature review in the substantive area can be undertaken. Findings from this are woven into the theory as additional data for constant comparison, contributing to theory development.

3.5 Methodological rationale - Why grounded theory?

Symbolic interactionism theory described by Mead (1967) and Blumer (1969) provides the theoretical underpinnings of grounded theory. Both encourage processes of inductive reasoning, emphasise the importance of theory grounded in reality and allow what is relevant to the participants to emerge. Both symbolic interactionism and grounded theory place social interaction and social processes at the center of attention. When used as a theoretical point of reference, symbolic interactionism lends itself well to studying issues associated with the nursing profession (Schreiber & Stern, 2001). As a tenet of the interpretive paradigm, it provides a theoretical perspective for studying how individuals (nurses) interpret 'objects' and situations in their world. In nursing, the shaping of self, and the adjustment of behavior to varying situations is the end result of the process of social interaction within the profession (Benner, 1984). Failure to meet the social conditions of nursing may indicate to others (nurses) deviant behaviour, where established norms have not been meet. With regard to competency assessment, the influence of socially accepted norms of behaviour in nursing and the expectations of nurses assessing competence has an impact on whether nursing students achieve competency.

For this research, grounded theory provided a way of discovering what was happening in relation to the social process surrounding competency assessment from the perspective of those assessing student competence. It illuminated the processes utilised by nurses to determine competency and identified the process and meaning(s) underpinning decision-making. This has allowed this researcher to develop a substantive theory providing a new perspective about how competency assessment of completing BN students is undertaken, and address gaps in the

understanding of how professional judgments and decisions about competency are informed.

For the purposes of this research a Glaserian grounded theory approach was adopted. In my opinion, this was less prescriptive, reduced the risk of forcing data, allowed greater freedom to discover the realities of the participants and facilitated the emergence of substantive theory more than the approach advocated by Strauss and Corbin (1998).

3.6 Methods

3.6.1 Interviews

Interviews are an appropriate method of obtaining data within a framework of grounded theory. Polit, Beck and Hungler, (2006) support the use of interviews stating that "[w]hether one chooses to conduct group or individual interviews, the underlying goal of qualitative investigations is always the same: to explore in depth the feelings and beliefs people hold, and to learn how these feelings shape overt behaviour"(p. 7).

Interviews may be formally structured, based around set questions or as in this study unstructured, where the interview takes place more as a conversation based around some key issue(s) and "shaped around what the respondents tell the researcher" (Davidson & Tolich, 2003, p. 241). Unstructured interviews provide an opportunity for the researcher to pose questions and then, where necessary, delve deeper in order to obtain clearer responses in greater detail (Glaser, 1998).

Importantly, the interview method allows a rapport to develop between the interviewer and interviewee. This is more likely to lead to rigorous and valid data and prevent recording of 'properline data' (Glaser, 1998), where answers that are politically or socially correct are given instead of the truth (Goldman & McDonald, 1987).

3.6.2 Focus group interviews

In addition to interviews with individual participants, focus group interviews were used in this study. Robert Merton is credited with the development of this form of group interview, which has become a highly regarded research method in social science and education, and is an important, widely used, and psychologically valid tool in research (Kevern & Webb, 2001). Historically, focus groups were developed as an alternative to individual interviews, and first used as a data gathering technique by social scientists in the late 1930s (Krueger, 1988; Lewis, 2000). In more recent times, they have been used extensively in marketing research, because of their tendency to provide valid data with a minimal investment of researcher time and money (Kevern & Webb, 2001).

According to Davidson and Tolich (2003), focus groups involve "a group's discussion focused around a particular issue…and provide a powerful technique for gaining an insight into the opinions, beliefs and values of a particular segment of the population" (p. 123).

The main objective of a focus group interview is to make the participants aware of the topic to be analysed and then allow them to comment on their experience

(Kevern & Webb, 2001, Lewis, 2000). Self-expression by the participants is important. In focus group interviews participants are given considerable latitude to express their definitions, ideas and feelings about matters of central significance to them. This allows participant responses to be placed in context rather than forced into a framework considered appropriate by the interviewer.

Conducting a focus group interview is a useful method of obtaining data in situations where participants have common knowledge and experience of the phenomena under study. It encourages conversational interaction between participants allowing elaboration and expansion of ideas about phenomena. This contributes to the depth of data and assists in the surfacing of hidden meanings. Focus group interviews "can excite contributions from interviewees who might otherwise be reluctant to contribute and, through their relatively informal interchanges, focus groups can lead to insights that might not otherwise have come to light through one-to-one conventional interview" (Denscombe, 1998, p. 115).

Davidson and Tolich (2003) contend that the strength of focus groups is the relative freedom the group situation gives to participants to discuss issues of concern. When used as a data collection method in grounded theory, focus groups offer advantages for the researcher. These include the potential of reducing the number of interviews and yet still being able to have many voices and points of view emerging simultaneously, and the ability to conduct the analysis more quickly in these circumstances (Schreiber & Stern, 2001).

3.6.3 Observation

Observation is another appropriate method of data collection, which ties in closely with grounded theory (Glaser & Stauss, 1967). Participant observation serves to elicit from people their definitions of reality and the organizational constructs of their worlds (Polit, Beck and Hungler, 2006). An advantage of participant observation is that, as a technique, it allows recording of real life data pertaining to the behaviour of the participants as this occurs. Observations may take place over an extended period of time, permitting the researcher to develop a closer working relationship with those being observed, and may be used inclusively with interviews. In these situations, the use of observation provides a window to assist understanding of the meaning attributed by the participants to situations to which they have been exposed, and facilitates a comprehensive explanation for the phenomena under study. Observation in this study was limited to observing group interaction and participant responses to stories about assessment of competency during the interview process.

3.7 Conclusion

The methodology used in this enquiry was grounded theory. This chapter has provided an overview of the interpretive paradigm, its philosophical position, and where the tenets of symbolic interactionism that inform grounded theory are positioned in relation to this. It has included a justification for the use of this methodology, and illustrated how symbolic interactionism provides a way of understanding the world of the participants, their values, interpretations and what meaning this holds for them. For this research, grounded theory underpinned by symbolic interactionism provided a way of discovering how nurses perceive practice

competency and how this is used to inform decisions and professional judgment concerning the practice competency of completing BN students.

The processes advocated by Glaser (1978, 1992a, 1992b, 1996, 1998, 2001) were utilized in this research. These were considered to be less prescriptive than others (Strauss & Corbin, 1998) and would allow the emergence of the participants primary concern and the discovery of how they managed competency assessment. In addition to an overview of grounded theory, this chapter has also included information about the methods used in this research.

The next chapter provides an account of the how the study was conducted. This includes details pertaining to the sample, the process of participant recruitment, data collection, the use of a constant comparative method in data analysis, ethical considerations, rigour, and evidence of the trustworthiness of the research. In addition, the role of the researcher in this research is explored.

Chapter 4: Research design and generation of theory

4.1 Introduction

Research design refers to the way in which the researcher plans and structures the research process (Creswell, 1998; Davidson & Tolich, 2003; Polit, Beck & Hungler, 2006; Schneider, Elliott, LoBiondo-Wood & Haber, 2003). Each researcher chooses the design that is most useful to their research purpose. This chapter presents how this study was conducted. This includes the study aim, information about the sample, a description of the participant profile, an account of where the research was conducted, how the data were collected and analysed, ethical considerations, rigour and evidence of the trustworthiness of the research.

4.2 The research process

4.2.1 The study aims and objectives

Using grounded theory the purpose of this study was to develop a substantive theory, which explained the processes employed to determine competency to practice for completing third year Bachelor of Nursing students in New Zealand.

4.2.2 The research question

In order to extract comprehensive data from the research when using grounded theory, researchers need to develop a research question that will provide flexibility and freedom to explore the area of study in depth (Glaser, 1998). As discussed in Chapter 1, the concern of this study related to competency assessment practices. Preceptors who both worked with students and were involved in competency assessment did not appear to know or understand the Nursing Council of New Zealand (NCNZ) competency standards. These standards provided the framework and criteria for assessment practice competence of completing BN students. This

raised issues about the validity of assessments, what was competency and how this was being assessed. Therefore, the question posed for this study was "what is happening regarding competency assessment of completing BN Students"?

4.2.3 Research location / setting

This research was conducted in New Zealand. The geographical area of the study encompassed three District Health Boards (DHBs), the scope and size of which included hospitals ranging from the largest hospital facility in New Zealand to small provincial hospitals and health services, and two tertiary education institutions offering Bachelor of Nursing Programmes.

4.2.4 Ethical considerations

The procedures utilised in this study can be ethically justified in that:

- Consent and ethical approval to undertake the study were gained from Victoria University of Wellington, Regional DHB Ethics Committees and education facilities whose staff were involved in the research (Appendix A).

- Recruitment notices and letters of invitation to participate in the study identify that participation was voluntary (Appendix B)

- Information pertaining to the study was given to the participants in written form (Appendix C).

- Prior to their involvement in the study, each participant voluntarily signed an informed consent declaration (Appendix C).

- The participants were aware of the purpose of the study, the nature of the study and methodology used.

- Every effort was made to ensure that the participants were well informed of their rights.

- All participants were informed in writing of their right to withdraw from the study without fear of repercussion. This included information pertaining to time restrictions in relation to withdrawal (Appendix C).

- Coding interviews and the use of constant comparative analysis and inductive theory development afforded complete anonymity of participants and the organizations they represented.

- Data were not used in any way to evaluate individual nurse assessment practices or the practices utilised by the institutions that the participants represented.

- The information obtained was not utilised to compare and contrast the practices of institutions that the participants represented.

- Participants were given the opportunity to have a copy of the transcription of their interview and have access to the research results.

- All raw data has been kept secure in a locked cabinet, and this will continue for 10 years.

- The study did not require participants to participate in such a way as to contravene the Nursing Code of Ethics.

4.2.5 Participant recruitment and selection

Participation in this study was entirely voluntary. After ethical approval had been obtained (Appendix A), the process of recruitment of participants and data collection was undertaken. The procedures utilized for recruitment and data collection are detailed below.

4.2.6 Advertising the research

With the consent of educational institutions and DHBs, a recruitment notice was placed in local staff publications, facility intranet and on notice boards (Appendix B). This provided information about the study, its aim, when data collection would take place and the requirements of the participants. It invited Registered Nurses in nurse educator or clinician roles, with experience in undertaking competency assessments, to participate in this study. Issues related to the confidentiality and anonymity of participants were highlighted. This notice included an invitation to attend an information-giving session at which more detail about the research would be given, and prospective participants could ask questions or seek clarification on issues of concern.

4.2.7 Invitation to participate

In addition to the recruitment notice, a letter of invitation to participate in the study (Appendix B) was issued to all nurses who indicated an interest in participating in the study. This encouraged prospective participants to discuss issues with the researcher directly. This could occur outside of the pre-arranged information session and included telephone discussion or e-mail. In addition to the recruitment notice, written information (Appendix C) concerning the study was also distributed to all interested prospective participants.

At information sessions issues relating to the confidentiality of the data and the anonymity of participants were again highlighted. The study, its aims, and the potential for results to be published were discussed. Information as to when data collection would take place and the requirements of the participants was given.

4.2.8 Informed consent and declaration

Subsequent to the information session, participants who wished to take part in the study identified themselves and informed consent declarations (Appendix C) were signed. The date, time and venue when the data would be collected were confirmed at this time.

4.2.9 Sampling

In keeping with grounded theory, the sample was ideational, with data completeness determined by theoretical completeness (Glaser, 1998; Schreiber & Stern, 2001). Therefore, at the commencement of the study, no limits were set regarding the number of participants or data sources (Cutcliffe, 2000).

Initially, a purposeful sample was sourced for this study. It consisted of nurse educators teaching on BN programmes, and preceptors from DHBs and their associated community health providers, who had a minimum of two years postgraduate experience and who had undertaken competency assessments on completing third year BN students. Two years post registration experience was considered as a requirement for participation, as after this period of time, nurses are generally accepted as being experienced and able to undertake senior nursing roles, including competency assessment. Two years post registration experience is generally considered a minimum experience requirement for educational appointments (Benner, 1984).

In addition to participant interviews, the research sample also included professional documents and literature. This enabled wider sampling to occur. Sampling decisions were influenced by the research interest and the emergence of the BSPP. When this

occurred, related literature became data and was managed in the same way as that generated from interviews. Using the constant comparative analysis method, this was compared to existing data for similarities and differences, thus, contributing to theory development.

4.2.10 Participant profile

To assist collection and collation of individual participant details, a demographic profile sheet (Appendix D) was developed. The demographic profile sheet provided information about the participants and included details concerning age, gender, ethnic identity, nurse registration category/ type, additional qualifications, number of years and type of post-registration experience, employment status and setting, and the amount of experience in undertaking competency assessment.

Once developed, the demographic profile sheet was piloted with eight colleagues to ensure that the instructions, questions and format proposed were clear and user friendly. As a result, some modification was made to the format and structure of some questions. The aim of the revisions was to address ambiguity and improve the ease of reading, and condense the size of the demographic profile sheet. This resulted in removal of sections requiring participants to provide a written response and replacing these with a 'tick the box' format.

A total of twenty-seven registered nurses employed as either nurse educators or preceptors took part in this study. Thirteen of the participants were employed by educational institutions as nurse educators. The remaining fourteen worked within DHBs or their associated community service providers as registered nurses. Table

4.1. presents the participants demographic data related to gender and nurse registration status. Almost half (44.4%) were Registered Comprehensive Nurses.

Table 4.1: Participant gender and registration status profile

Participant profile data	Education n=13	(%)	Practice n=14	(%)
Gender				
Male	1	7.69	2	14.28
Female	12	92.30	12	85.71
Professional Registration				
Registered Comprehensive Nurse	4	30.76	8	57.14
Registered General and Obstetric	5	38.46	4	28.57
	2	15.38	0	00.00
Nurse	1	7.69	0	00.00
	3	23.07	2	14.28
Registered Paediatric Nurse	1	7.69	0	00.00
Registered Psychiatric Nurse				
Registered General Nurse				
Registered General Nurse and Midwife				

Although the research was widely advertised and provision was made for separate hui for Maori, only one nurse from this ethic background participated in the study. The majority of nurses who participated in this study had New Zealand European backgrounds. The ethnic background of the participants is shown in Table 4.2.

Table 4.2 Participant ethnicity profile

Ethnicity	n = 27
New Zealand European	20
European (other)	4
New Zealand Maori	1
Cook Island	1
Indian	1

Table 4.3 provides information concerning the participants qualifications. Twenty three of the participants held a post graduate qualifications. Twelve (44.4%) were

Masters prepared. The majority of those (10) were employed in education. Twelve of the participants were actively undertaking further education. Four participants did not hold a postgraduate qualification. Of these three were not involved in any form of further education at the time of interview.

Table 4.3: Participant qualification profile.

Participant profile data	Education n = 13	(%)	Practice n = 14	(%)
Education First Qualification				
Hospital based training Certificate	10	76.92	6	42.85
Polytechnic Diploma	3	23.07	3	21.42
Polytechnic Degree	0	00.00	5	35.71
Post Registration Qualification				
Master Health Science	0	00.00	1	7.14
Master Health Science (Mental Health)	2	15.37	0	00.00
Master Education	1	7.69	0	00.00
Master Arts	6	46.15	1	7.14
Master Applied (Nursing)	1	7.69	0	00.00
Post Graduate Diploma	0	00.00	4	28.57
Post Graduate Certificate	0	00.00	1	7.14
Bachelor of Nursing	2	15.37	3	21.42
No post registration qualification	0	00.00	4	28.57
Continuing Education				
Ph. D	1	7.69	0	00.00
Masters	0	00.00	5	35.71
Post Graduate Certificate	3	23.07	2	14.28
Post Graduate Diploma	1	7.69	1	7.14
Bachelor (Non Nursing)	0	00.00	1	7.14
Not undertaking further education	8	61.53	6	42.85

The employment status of participants is detailed in Table 4.4. All were employed at the time of interview. The majority (74%) were employed full time. The mean number of years experience was 20.62 years. All participants had two or more years post registration nursing experience, which included undertaking competency

assessment on completing BN students. The mean number of years experience

undertaking competency assessment was 8.07 years.

Table 4.4 Participant experience and employment status.

Participant profile data	Education n = 13	(%)	Practice n = 14	(%)
Post Registration Experience (years)				
< 10	1	7.69	4	28.57
11- 20	5	38.46	3	21.42
21- 30	2	15.37	7	50.00
> 30	5	38.46	0	00.00
Mean	24.08		16.85	
Experience in competency assessment (years)				
< 10	4	30.76	11	78.57
10- 20	7	53.84	3	21.42
> 20	2	15.37	0	00.00
Mean	11.92		5.28	
Employment status				
Part time	2	15.37	5	35.71
Full time	11	84.61	9	64.28

Details pertaining to the area in which participants were employed, including specific

practice settings are provided in Table 4.5. The majority (70.3%), were working in

education roles in either educational institutions or clinical practice setting.

Table 4.5: Participant employment setting and area of practice

Participant profile data	n = 27	(%)
Employment setting		
Education	10	55.5
Clinical practice	14	51.8
Both education and clinical practice	3	11.1
Practice area		
Education (Institution and practice)	19	70.3
Medical nursing	1	3.7
Surgical nursing	2	7.4
Mental Health	2	7.4
Emergency and trauma	2	7.4
Intensive care / coronary care	2	7.4
Nursing professional advice/ policy development	2	7.4
Nursing administration and management	5	18.5
Other	2	7.4

4.2.11 Data collection method and process

4.2.11.1 Interviews

A combination of focus group and individual interviews were used in this study to collect data. In total eight interviews were undertaken. Of these five were focus group interviews and three individual interviews. The individual interviews were conducted at the request of the participant. These nurses wanted to be involved in this study but were unable to attend at the time that group interviews were scheduled. All interviews commenced by reiterating that participation in the study was entirely voluntary. Issues surrounding confidentiality were emphasized. To prevent forcing the data, interviews in this study were unstructured. The format for interviews followed recommendations by Charmaz (1990) and commenced with a general open ended question. As discussion amongst the participants ensued, more specific questions about issues were raised and asked. This line of questioning provided an opportunity to explore issues in more depth and generate rich, in-depth data.

Examples of the questions asked, and the way in which the interviews were conducted, are presented in Appendix E.

As previously identified in Chapter 1 preceptors and educators appeared to have differing perspectives about the assessment of competence. As a result it was considered appropriate to interview preceptors and educators separately. The interviews provided me with an opportunity to gather information about competency assessment processes, gain insight into the opinions, beliefs and values of the participants related to how practice competency is determined, and issues that impact on this. With the consent of the participants, interviews were audiotape recorded and notes taken. It was found that, while coming from different practice areas, both nurse educators and clinicians shared similar concerns regarding competency assessment. Because of this and the use of the constant comparative analysis method, the results of this study provided a joint perspective on the phenomena.

4.2.12 The process of data analysis and theory generation

Data analysis commenced with verbatim transcription of audio taped interviews. Transcribers were employed to undertake this process and were required to sign confidentiality declarations (Appendix F). A data management system was established early in the research. Each interview was allocated a code to protect the anonymity of both the practice area in which the interview took place and the participants involved. Participant names and place of employment were not recorded.

A transcription format based on Brown and Sullivan's (1999) systems for managing qualitative data was developed. This design allowed coding and memoing to be

recorded within the same document (Appendix G). Each line of data was numbered, which was especially helpful during the data analysis process, as it kept initial memos and the raw data together, making it easier to locate the origin of codes and ideas about these.

A model of grounded theory based on a Glaserian approach (Figure 4.1) was developed and used to guide substantive theory development in this research. In keeping with grounded theory, this shows how data was collected, analysed and coded simultaneously. The constant comparative analysis (CCA) method (Glaser 1992b, 1998; Glaser & Strauss, 1967) was an ongoing process used to code and categorise data.
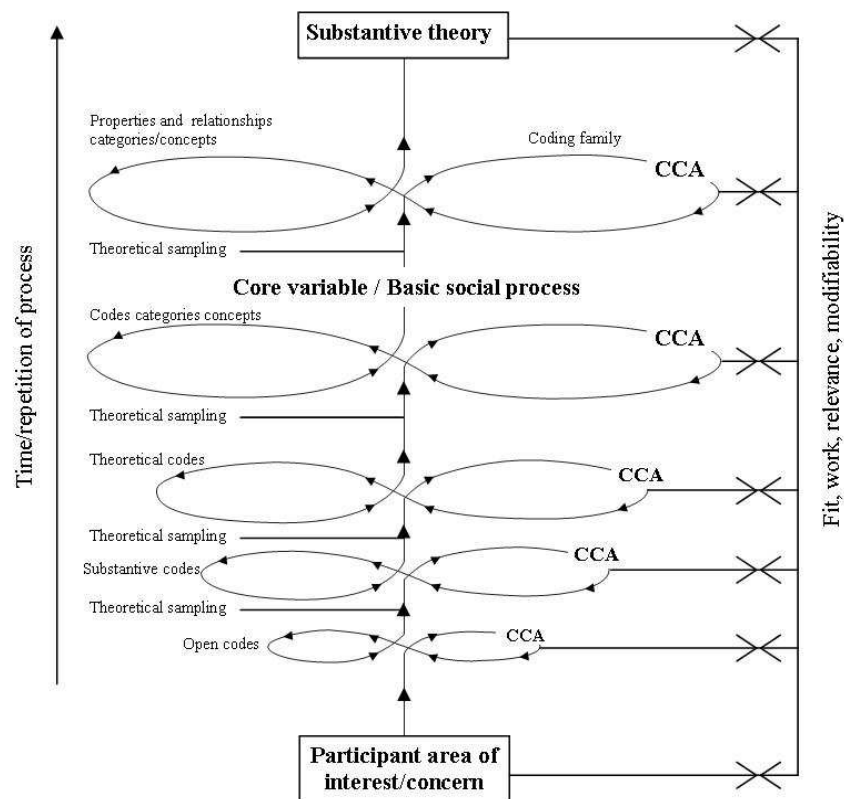
Figure 4.1 Model of inductive theory development used for the generation of substantive theory in this study

4.2.12.1 Analytical process and audit trail

Once a transcript or document had been coded, codes were typed into a data base. These were allocated an individual identification number. This specified the data set and line of text the code was associated with. An example of this aspect of the data management is provided (Appendix H). This system was especially helpful for tracking where each code emerged from the data. The open codes generated from each stage of theoretical sampling were printed on different coloured paper, individually separated, and then placed on a large board, where they could be viewed as a whole. As data was easily moved around the board this process was also helpful in sorting, and re-allocating codes. This facilitated the research progression by assisting in the recognition of similarities and differences in data and making connections and linkages between categories. At the end of each level of analysis, the board was photographed and a record kept detailing decisions. An example is provided in Appendix I.

Using CCA, three levels of analysis were employed. These were open coding, the development of substantive codes, and theoretical coding

4.2.12.2 First level of analysis – Open coding

The first level of analysis involved reading through an interview transcript, or other documents, and carefully examining the meaning of what was relayed. Systematically, the data was scrutinized with each line of data being compared to determine similarities and differences. This process identified significant words or phrases in the data used to describe phenomena. Working with a hard copy of the transcript and using a pencil, words describing what was happening were underlined.

As advocated by Glaser (1978) repeatedly asking the question "what is going on here"? (p. 94), was helpful in making sense of the data. This process fractured the text into abstract segments and led to the identification of in vivo, or open codes. The names given to these codes were often words that the participants used to describe their experience. Figure 4.2 provides an example of how the first level of analysis data was managed and open codes generated.

Interview data - Open coding	Open codes
…It's grossly <u>unfair</u> to put forward <u>I think</u> or I <u>feel</u>. But I think you do, <u>do that first</u>. And when [she] was talking to start with about grounded theory, it's like constant comparative analysis. I think as nurses we actually do that all the time. We <u>constantly compare</u> and then try and analyze. So we have a student we <u>don't think is</u> competent. Or we <u>do think</u> is competent. And you are constantly <u>weigh that up against</u>, yes, <u>what I would have done</u>. Yes I that person, yes and the <u>preceptor says</u>, oh, and you take the student to the patient and <u>they do all the things that you expect</u> of them to do. And you say you are kind of <u>mentally ticking that off in your head,</u> ok well <u>where does this fit</u> and its then that you have to <u>go back to the real,</u> what is the core thing <u>you are looking for</u>. Yes and <u>make it objective,</u> but I think initially you have that subjective, so what are the <u>subjective clues</u>, that you kind of and one of them is <u>comparing what you would do or what you know what other staff do.</u>	Fairness / being unfair Personal feelings / feelings first Constantly compare Questioning / analyzing / thinking Weighing up Personal expectations Listening to other nurses Valuing what others say Meeting expectations Mentally ticking off Questioning / analyzing / making sense. Going back / searching / recognizing practice Being objective Acknowledging / subjective clues Comparing practice

Figure: 4.2 First level analysis - An example of line by line open coding

4.2.12.3 Second level of analysis – Development of substantive codes

Second level coding commenced when similarities between existing open coding and that of incoming data were noticed. Repetition of codes occurring in the data resulted in the formation of substantive codes, where groupings of similar codes clustered to form an emergent set of categories. These were allocated properties and renamed to fit the data.

Each time theoretical sampling occurred, constant comparative analysis was undertaken. This involved engaging in a process of a constantly sorting and re-sorting data. Memoing continued throughout this time and resulted in ongoing modification of categories and their properties, as each new data set were added to the increasing data pool. Occasionally, codes emerged that did not appear to fit with existing data. These were not discarded, rather they were named homeless codes and put to one side. These were revisited each time second level coding was undertaken. As the analysis and sorting progressed, most of the homeless codes worked their way into a concept and became part of a category. Figure 4.3 provides an example of grouping of properties and formation of concepts.

Properties – Open codes	Concept - Substantive code
Losing faith Monitoring assessment outcomes Validating the professional judgment of others Questioning the validity of assessment Lacking of confidence in the system Having confidence in others Trusting practice Trusting education Valuing the professional judgment of others Trusting students	Trusting

Figure 4.3 Example of category formation

At this point in the data analysis, the focus of the analysis changed to examining the relationship between and among the categories and third level coding commenced.

4.2.12.4 Third level analysis - Theoretical coding

Theoretical coding is a conceptual phase of data analysis which explains the relationship of substantive codes to each other and the emergent theory. This level of

analysis primarily consists of memo writing and theoretical coding. These two processes assist the researcher to think about the data in a way that is theoretical rather than descriptive. Glaser (1978) lists eighteen coding families that can be used to assist this process. In this study, linkages in the data and the substantive meaning of connections between concepts emerged. Through utilising a hybrid theoretical coding family that included a combination of the interactive and process families (stages, phases, progression and the interaction between categories and concepts), and the model family (where one's theory is pictorially produced in a linear model), the fractured story was woven back together. This provided a framework for theory generation, which enhanced the level of abstraction and completed the concept formation phase by conceptualising how the emergent categories interrelated. The outcome of this phase of the data analysis process was the emergence of a BSP, which accounted for the most variance in the data.

4.2.12.5 Identification of a core variable or basic social process (BSP).

As previously identified in Chapter 3 there are two types of BSP. These are BSPP and BSSP. These are core variables that emerge as "a central theme or concept that holds all the data together" (Stern & Pyles, 1986, p. 7), and reveal the process used by the participants to resolve a social problem or phenomena. The primary problem identified by the participants of this research in relation to competency assessment of third year BN students was that preceptors involved in assessment processes did not know what the NCNZ competency standards were. When provided with a copy of these, they found it difficult to identify aspects of safe practice that exemplified the standards. The participants indicated that *comparing* was an activity that they engaged in when making competency judgments. This was referred to in all interviews and was also found in literature discussing assessment of students. Over

an extended period of time, the analytical process of *comparing* emerged from being an in vivo code, to becoming a category, before revealing itself as the BSPP.

An example of diagramming showing the relationship between concepts and BSPP is shown in Figure 4.4. With further development of the substantive theory, this diagram later became the template for the Critical Comparative Nursing Assessment (CCNA) model, which was used in this research to theoretically explain how nurses formulate competency assessment judgments and determine the practice competency of completing third year BN students.
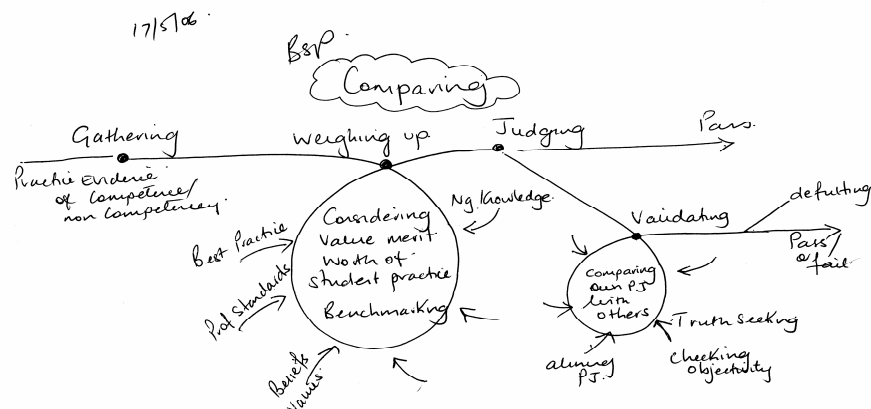
Figure 4.4 Diagramming the relationship of theoretical concepts to each other and the basic social process

4.2.12.6 Saturating categories and properties - Selective coding

Selective coding is undertaken after the core category or BSP or BSPP has emerged. This limits coding to only those conditions that relate to the core variable (BSP or BSPP) (Glaser, 1998). At this point in the research, data continued to be gathered until saturation occurred and no new information about categories and their properties was discovered. During this process, I moved back and forth between the

steps in data collection and analysis, and engaged in a process of continual refinement of the emergent theory.

4.2.12.7 Construction of substantive theory

Grounded theory is used to generate two types of theory. These are substantive and formal theory. Formal theory is developed for a conceptual area of inquiry, whereas substantive theory arises from the substantive area of enquiry. Both are considered to be middle range theory. The purpose of this study was to explain the substantive area of competency assessment of completing third year BN students. Hallmarks of substantive theory are that it 'fits' the real world, works by predicting and explaining the area of enquiry, holds relevance for those in the area of enquiry, is immediately recognizable to the participants and can be easily modifiable to differing contexts within the substantive area of enquiry (Glaser, 1978). Evidence that these criteria have been meet was confirmed by member checking. For example, when presenting the Critical Comparative Nursing Assessment Model (CCNA) identifying *comparing* as the BSPP, participants said

> *'Oh yeah, I can totally see it happening and I could keep*
> *bringing out examples of it happening' (I1-348).*

> *'that is exactly what I do' (I27- 680).*

> *'…we do gather in the information. It sounds very logical and*
> *the flow – it just makes sense. I'd never thought of it [CCNA]*
> *that way, but I can totally see it. All these things – weighing up*

and the considering and the benchmarking. You take this into account...It happens so intuitively, but we do actually take all those things into account...But I've never been able to discuss that before in this way and when it comes down to validation [moderating] I have been in that situation' (I6-190-204).

'That's exactly what I do. I gather, I benchmark, I automatically compare. Comparison and the validating process – its part of practice' (I7-1-9).

4.3 Trustworthiness of the research - Rigour and reliability

The validity and credibility of the type of research used for this study is frequently challenged. Primarily, the concern is that qualitative research methods are not reliable because they do not involve statistical analysis or deductive, hypothesis-testing methods of enquiry (McTaggart, 1998). This is not the case with grounded theory, which through the use of the constant comparative method of analysis and theoretical sampling, employs both deductive and hypothesis testing methods.

As grounded theory methodology (Glaser, 1992, 1998; Glaser & Strauss, 1967) was chosen for this study, the criteria for determining the rigour is based on Glaser & Strauss's (1967) evaluation framework. This includes evaluation of *fit, relevance, work,* and *modifiability* which are depicted as integral components of the model of grounded theory developed and used in this study (Figure 4.2).

According to Glaser (1998) "fit is another word for validity" (p. 236). The processes utilised in grounded theory to analyse data and formulate theory inherently validate the findings, in that, a functional requirement of grounded theory is that the theory must relate to the data. In order to evaluate this, concepts are examined to determine if they represent the pattern of data they purport to denote. The data management process provides an audit trail, which enables this aspect of rigour to be evaluated. The open coding example (Figure 4.3) provides further evidence of fit.

Relevance is apparent in this study, as the pattern of data not only *'fits'* the pattern of data it is purported to denote, it also explains what is happening that is important to the participants in the substantive area. The emergent concepts both fit and are relevant to the core category. This explains the most variation in behaviour in the substantive area, and how this is resolved by the participants. The CCNA model embodies concepts that are related to what is happening for the participants. These *'work'* by interpreting and explaining what is happening and offer a prediction of what will happen. Using the constant comparative method, the theory can be modified to *fit* and *work* with *relevance* as new situations arise. *Modifiability* is demonstrated when the theory can readily incorporate new data, and while this allows for qualification of what came before in the discovery process, it does not loose what has already been generated (Schreiber & Stern, 2001). This is demonstrated during member checking, where participants generalise the CCNA model to explain aspects of practice other than competency assessment. In this situation, the components of the model *'fit',* are *'relevant'* and *'work'* without loosing the essence of what has already been discovered. Further, the components of the CCNA model can stand across time and place. In doing so, political challenges in

education, changes to curricula and assessment methods could be accommodated and add to the theory without changing this. This is congruent with Glaser's (2001) ideas about the rigour of substantive theory, which should have general implications and the ability to transcend the substantive area studied.

4.4 The role of the researcher

According to Glaser (1992a) everything is data. This includes the experience of the researcher, which is acknowledged and recognized as being unable to be removed from the research process. Glaser (1992) argues that personal experience with the phenomena under study is vital to the analysis process, and aids the researcher in identifying important information arising from the data. While this is so, the researcher must recognize and constantly challenge personal theories and ideas about the study topic, as there is always the risk that the researcher's bias may influence the direction and outcome of the research (Glaser, 1998).

As previously identified, theoretical sensitivity is the process by which a researcher guards against potential biases that can threaten the rigour of the study. This diminishes potential bias from the researcher's background and prevents premature closure of theory development in favor of the researcher's personal beliefs. Theoretical sensitivity assists the researcher to detect degrees of difference in the data, and be responsive to this (Glaser, 1992a). Memoing is advocated and was used as a method of promoting theoretical sensitivity.

With a background in Nursing Education and experience in assessing student competency, it was inevitable that I would enter the study with some assumptions.

The potential existed for these to influence my interpretation about the participants understanding of competence and assessment processes. My role in this research was to put aside preconceived theory, provide opportunity for the participants to tell their stories in their own words, and systematically integrate these data into a theoretical representation of the phenomenon. Following the advice of Glaser (1978, 1994, 1998), Glaser and Strauss (1967), Schreiber and Stern, (2001) I memoed personal ideas and assumptions about the topic under study, and set them aside to compare against the data at a later date. In keeping with grounded theory, this information was then woven into the emergent theory as more data for analysis.

4.5   Conclusion

This chapter has presented the study design, procedures used to recruit participants, the participant profile, data collection, data analysis and the analytical procedures utilized to generate substantive theory. Ethical considerations and trustworthiness of findings have also been discussed. The next chapter introduces the Critical Comparative Nursing Assessment model (CCNA). This provides the reader with a brief overview of the categories embodied in the theory, and parameters for consideration when reading and interpreting the theory presented in subsequent chapters.

Chapter 5: Critical comparative nursing assessment

5.1 Introduction

Critical Comparative Nursing Assessment (CCNA) contributes a theoretical explanation about how nurses determine the practice competence of completing BN students. This chapter provides a brief overview of CCNA and introduces the Basic Social Psychological Process (BSPP) of *comparing*, its categories, concepts and properties. The purpose of this chapter is to provide the reader with an understanding of how the theory is constructed and to provide a context and parameters for reading and interpreting each phase of the CCNA process, which is presented in more detail in subsequent chapters.

5.2 Overview of the theory of CCNA

The substantive theory of CCNA was generated using a Glaserian grounded theory approach. This is presented as a model that describes and explains the processes utilised by nurses to mange the assessment of student nurse competence, and how these support and inform decision making. This theory emerged primarily from the perspectives of nurses with experience in undertaking competency assessment, who participated in this research, and other data sources, including literature, which was accessed during the process of theoretical sampling.

Theoretical sampling and the other methodological processes outlined in Chapter 4 were used to determine saturation and verify and the categories, concepts and properties embodied within this theory. This confirmed the presence of a core variable, which emerged in the form of a BSPP. As a gerund this is labeled '*comparing*'. Four sub-categories labeled *gathering, weighing up, judging* and

moderating conceptualise the four phases of *comparing* within the theory of CCNA.
These are underpinned by theoretical concepts and their properties. Each concept
reveals a different group of interactions that illustrate the processes in which nurses
engage while undertaking competency assessment and making decisions about
practice. The BSPP, categories, concepts and properties that denote the theory of
CCNA are encapsulated in Table 5.1

Table 5.1 CCNA: Categories, concepts and properties

BSPP	Category	Focus	Concept	Property	Theoretical propositions and outcomes		
Comparing	Gathering	Obtaining information to inform decisions	Creating opportunities	Establishing relationships	Information about student knowledge base and practice is required	Processes that monitor and control student practice are essential in order to maintaining safety	Competence is taught
				Identifying learning needs			
				Teaching competence			
			Letting out the leash	Supervising practice			
				Monitoring and controlling practice			
				Tracking practice development			
			Collecting the evidence	Sourcing evidence			
				Facilitating and managing feedback			
	Weighing up	Analysing the information gathered	Benchmarking	Comparing benchmarks	Nurses know what competence is	Nursing knowledge is used to benchmark (calculate and measure) competence and inform professional judgement	
				Perceiving competence			
				Perceiving non competence			
			Constructing a picture of competence	Calculating value, merit and worth			
				Making sense			
	Judging	Making a professional judgement	Being aware	Reflecting	Formulating professional judgement that is accurate and fair	Judgements are made based on maintaining professional standards and ensuring public safety	
				Making allowances			
			Being professional	Being objective and fair			
				Gate-keeping			
				Worrying			
			Being sure	Knowing			
				Determining the bottom line			
	Moderating	Validating the accuracy of decisions	Truth seeking	Establishing truth	Decisions about competence need to be accurate	Nurses have professional responsibility to ensure practice standards are met and ensure public safety.	
				Benchmarking professional judgement			
			Judging truth	Confirming judgement			
				Dealing with conflicting opinions			
			Trusting	Having faith			
				Losing faith			
			Defaulting	Relying on others			
				Abdicating			

Where possible, in vivo codes have been used to name the categories, concepts and properties that make up the CCNA model. The labels given to in-vivo codes consist of words used by the participants to describe their experience. In doing so, these reflect the perspectives of nurses and connect the process of CCNA together. This connection is strengthened with quotes from interview transcripts. These explain relationships using the participants' thoughts and link the conceptual ideas under discussion back to the data. These quotes are identified as indented text written in italics and coded by number and line of the transcription to reflect the interview from which the data was gathered. For example the code I1-28 indicates that the quotation source is interview one, line 28.

The theory of CCNA is described and explained using each of the four conceptual categories embedded within it. Chapter 6 will present the category *gathering*. This explains the concepts of *creating opportunities* for teaching competence*, letting out the leash* and *collecting the evidence*. These concepts and their properties explain the context, conditions and consequence of *gathering* data, and how this activity impacts on other categories facilitates *comparing* in the CCNA model. The category *weighing up* is explicated in Chapter 7. This outlines the intellectual process involved in calculating competence and how the BSPP *comparing* facilitates measuring the *value, merit* and *worth* of student practice against professional benchmarks. The concepts of *benchmarking* and *constructing a picture of competence* in this category of CCNA, inform and assist the process of *judging* and *moderating*. The place of *weighing up* in relation to the other categories of the process and its integral relationship to *comparing* is explored. Chapter 8 presents the category of *judging*. This category explains how the outcomes of analysis (*weighing up*) are *compared*

and *judged*. Factors influencing the resulting *judgment* and assessment outcome are explored in the concepts *being aware, being professional*, and *being sure*. These highlight the tensions inherent in making professional judgments and detail strategies that nurses employ to ensure that judgments about competence protect professional standards and public safety. Chapter 9 presents the category of *moderating*, when nurses validate the competency judgments they have made. This chapter explains how nurses *gather* the opinions of other nurses and *compare*, *weigh up* and *judge* these against their own competence decisions. This form of professional *benchmarking* is explained by the concepts *truth seeking*, *trusting*, *judging truth* and *defaulting*. These describe the methods used by nurses to manage the moderating process and what happens when conflicting judgments about competence arise.

The categories that comprise CCNA are not mutually exclusive. There is a continuous interplay between all four categories in the CCNA model that represent this theory. While the presentation of the categories of the BSPP provide a logical way in which to present the theory, the explication of conceptualised data, that interrelates at various points within the dynamic process described here, has provided some challenges. This is due to the interaction between categories and the way in which they support and reinforce each other. The integrated nature of the model, demonstrates that the concepts and properties of some categories are cross contextual and overlap. It is important to note that this is not repetition. The reintroduction of a concept addresses the different emphasis that a code, concept or category has in relation to varying aspects of the theory and the processes occurring within this, and is an indication of the interrelationship of various components and the complexity of CCNA model (Figure 5.1).
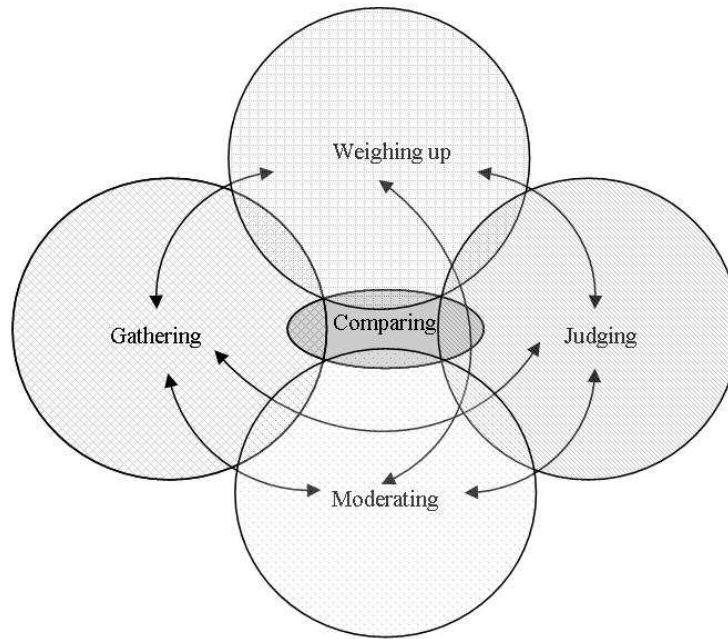
Figure 5.1 Interconnectedness and interaction of categories and the basic social process of comparing in CCNA

In order to facilitate understanding of the complexity of the model and address the overlapping concepts the theory is, in the first instance, presented as a linear model, with one category (phase of the BSPP) leading to another as depicted in Figure 4.4. (page 71). It is acknowledged that in doing so, there is a risk of over simplifying the theory and that the complexity of the comparative process will be lost. This will be addressed in Chapter 10, where the categories are woven back together and theoretically take CCNA to the next conceptual level. This will be achieved in two ways. Firstly, through presentation of the BSPP *comparing* and explicitly how *comparing* interconnects the processes involved. This will explain how the theoretical concepts of *gathering*, *weighing up*, *judging* and *moderating* interrelate, work and fit to accommodate changing circumstances, what is happening in relation to the assessment of students' competence, and how *comparing* resolves the participants' concern. The connections between categories, transitions between the

phases of CCNA, and identification of cyclical processes, where categories interact, and interaction between various processes occur will be discussed. Secondly, it will be argued that the notion of CCNA is a substantive form of comparative analysis and that while this may incorporate the use of professional nursing standards (competencies) as benchmarks, it does not rely on these to explain how professional judgments concerning the competence of students are made. The conditions that impact on a comparative assessment model and the implications these have in relation to CCNA, and the outcome of the assessment of competence, are explored. This draws together all of the concepts within the CCNA theory and explains the theoretical proposition of how the BSPP *comparing* controls each of the processes involved and facilitates the formulation of competence decisions by identifying contradictions in practice. With the support of the data, this chapter will theorise that *comparing* is more an ad hoc means of determining competence, and argues that nurses use a combination of variable and case oriented comparative assessment methods (Rangin, 1989) which include inductive and deductive methods of enquiry (Vartiainen, 2002) to determine student's practice competence. The resonance that CCNA holds with other research theories about comparative evaluation suggests that *Comparing* is a process not only central to determining competence of students, it connects critical thinking, reflection and the self-regulatory thinking processes to construct nursing knowledge. This informs the intellectual process involved in learning competence and underpins knowing in practice. The relevance of this to nursing is presented in Chapter 11. While this is in addition to the BSPP, it conveys the contribution CCNA makes to nursing knowledge and provides direction for further research.

5.3 Parameters for consideration

When writing this thesis the conceptualisation of the data, and the interactive nature of the CCNA model presented the challenge of how this should be presented. The interconnectedness and complexity of the model has makes this difficult to pull apart. In presenting this theory in a linear way and simplifying this, I am aware that there is a danger that the dynamic nature of the model could either be misinterpreted, or its complexity be overlooked. To assist the reader, definitions explaining the terminology used in the text are provided in the glossary of this thesis. I draw the readers attention to the following points which may impact on the interpretations of this theory, and should be taken into account when considering the material presented.

5.3.1 Points for consideration in relation to reading the thesis

Glaser (1978; 1998), makes reference to the fact that grounded theories should have fit and relevance to wider social groups. While the theoretical constructs within the CCNA model and issues discussed within this theory hold relevance and resonance for nurses in general or even other groups of health professionals, the reader is cautioned about generalising the ideas in this study. While reading this thesis, it may be helpful to consider that as a mid-range theory, CCNA is developmental and a theory in progress, rather than a complete product in itself (Glaser & Strauss, 1967). It is equally important to reiterate that this research has purposefully been confined to realising a substantive theory concerning competency assessment of nursing students in New Zealand, and it may not hold fit and relevance to the assessment of students in other countries, nor the ongoing assessment of competence of registered nurses.

CCNA is based on the perceptions of nurse educators and preceptors involved in the competency assessment of students. While these people represented a cross section of practice (education, acute medical / surgical, paediatric, orthodpaedic, operating theatre, mental health, maternal and child health and community), not all areas of practice were represented. As a consequence the perceptions underpinning this theory cannot be claimed to hold fit and relevance to nurses generally.

5.3.2 Terms

Unless specifically noted, the term 'nurses' in this thesis refers to both nurse educators and preceptors involved in competency assessment. It is acknowledged that nurse educators' understanding of competence standards was more comprehensive than their practice colleagues. However, interviews revealed that educators were dependant on preceptors for information, and were equally concerned about the impact that the limited understanding of competence standards underpinning the assessment had on the assessment process and outcome. Analysis revealed that as a result, educators and preceptors engaged in the same process even though they came from differing positions. The methods employed in this research have resulted in the emergence of the BSPP *comparing,* which holds relevance to all parties involved in this research. Member checking of both educators and preceptors confirmed this.

The use of the term 'competency standards' in this thesis is in reference to the Nursing Council of New Zealand (NCNZ) Professional Competency Standards. Further to this, the reader should be aware of the use of the term 'practice development' and the context in which this is applied. The international literature on

this topic is acknowledged, and while it is accepted that the context of this differs to that described in this thesis, this term has been used as it was utilised by the participants to describe the process of student skill acquisition.

5.3.3 The role of the researcher

Glaser (1978, 1998) asserts that the researcher's knowledge of the substantive area is important and assists in the development of theoretical sensitivity and the recognition of the emerging theory and its development. I, therefore, need to acknowledge my experience as a nurse educator of some 21 years, who has been involved in the assessment of student competency and preparing others for this. I recognize that while it was necessary to put aside preconceived theory, my personal and professional knowledge of the assessment of competence are an integral part of this research. My role in this research was to provide an opportunity for the participants to tell their stories and to systematically integrate these into a theoretical representation of the phenomena.

5.4 Conclusion

The CCNA model provides a theoretical construct for understanding what is happening in practice regarding the competency assessment of nursing students. This explains how the Basic Social Psychological Process (BSPP) of *comparing* answers the research question and resolves the central issue in this research. This chapter has provided an overview of the theory of CCNA and briefly presented the categories and concepts within this. Parameters for consideration have been identified.

The following chapter *gathering* represents the first of the theoretical categories embedded in the theory of CCNA. This describes how nurses gather evidence to inform competence decisions, and the processes within this that create opportunities for teaching and assessing competence, provide a means for monitoring and controlling student practice and issues related to the collection of evidence, and how these influence the BSPP *comparing,* and impact on the decision-making process and the determination of competence.

Chapter 6: Gathering

6.1 Introduction

The category *'gathering'* represents the first stage of the Critical Comparative Nursing Assessment (CCNA) model and is a process in which nurses engage in order to collect evidence of student practice that will inform decisions about practice competence. This chapter commences by outlining the theoretical propositions of *gathering* and their relationship to the BSPP of *comparing* to determine competence. The second part of the chapter will explore each of the concepts that comprise *gathering*, and how nurses manage this process by implementing strategies such as *creating opportunities* for practice development and assessment of competence, *controlling and monitoring* practice by *letting out the leash* and *facilitating and managing feedback processes* when *collecting evidence* to inform decisions. How these concepts, and the properties embedded within them, influence the nature and quality of decisions about student's competence to practice are presented.

6.2 Gathering, comparing and determining competence

According to Gordon, Murphy, Candee and Hiltunen (1994), when engaging in decision-making, information about the phenomena under consideration is required. They contend that collecting information is the first phase in a decision-making process. Collecting information results in the accumulation of facts that account for what is happening. Here *gathering* assists the decision maker to formulate a coherent picture of events or issues that comprise a situation or phenomena to be considered.

In this theory, the category *gathering* and the concepts and properties embedded within it, describe the complexity of what nurses involved in this study

considered an integral component of the competence decision-making process. In order to make a decision about the student practice competence, nurses identified that they required information about the student's ability to practice. *Gathering* is a strategy utilised by the nurses to obtain this information. This commences on immediate contact with students.

> *'Within the initial few minutes of the start of work we start a process of gathering information from your student' (I4-344-435).*

Gathering is a continuous process that occurs throughout the student clinical placement. In order for *gathering* to occur and information to be obtained to inform professional judgment, students require opportunities to demonstrate their knowledge and ability. The concept c*reating opportunities* facilitates *gathering,* by *establishing relationships*, *identifying student-learning needs* and *teaching competence.*

While these strategies are employed to provide students with the opportunity to develop their practice and provide a useful means for *gathering* information, nurses are very aware of the vulnerability of patients and employ strategies, which involve *supervising*, *monitoring, controlling*, and *tracking* the student's development of practice. These are designed to make provision for student practice development whilst maintaining patient safety. Nurses describe this activity as *'letting out the leash'.*

Like other concepts that make up the category of *gathering*, *'letting out the leash'* has a direct correlation with the theoretical propositions and outcomes associated

with this aspect of CCNA. These are that in order to assess practice competence
information regarding the students' practice knowledge and ability is required,
processes that monitor and control student development of practice are essential to
gather information to in order to maintain patient safety, and competence is taught.
These theoretical propositions are based upon the perception of the nurses in this
research regarding what was essential to determine competency. Figure 6.1 Depicts
the concepts and properties of the category of *gathering* and demonstrates the
interrelationship of these to the theoretical propositions supporting *gathering* as an
integral component of CCNA.
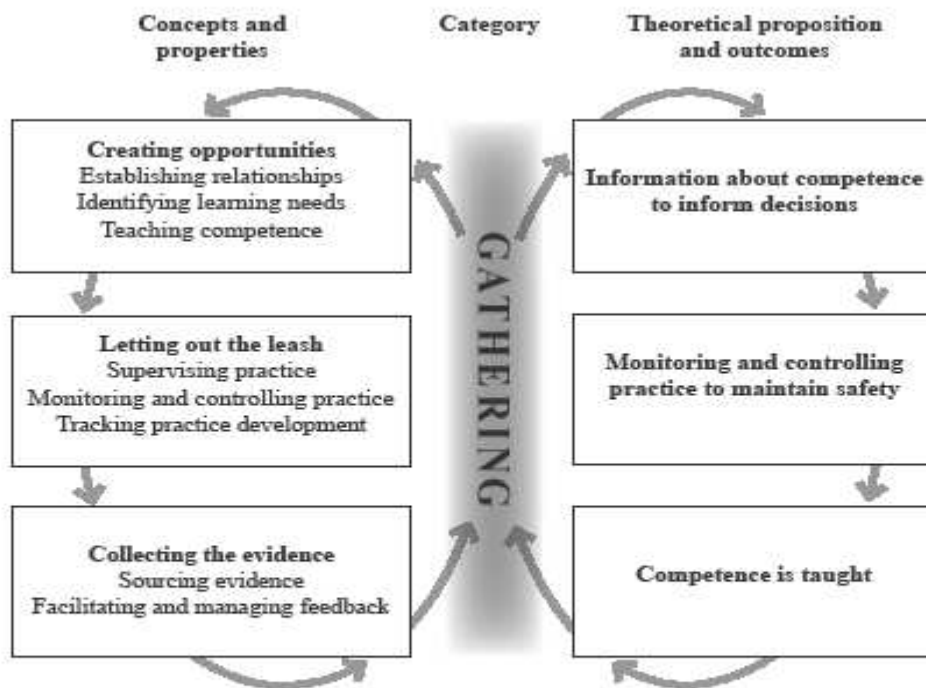
**Figure 6.1 Interrelationship between concepts and properties of gathering
and theoretical propositions and outcomes**

In a linear description, *gathering* is the first stage of the CCNA model. This is however present in all of the categories described in the CCNA model. Figure 6.2 illustrates the relationship of *gathering* to the other three categories in the CCNA model.
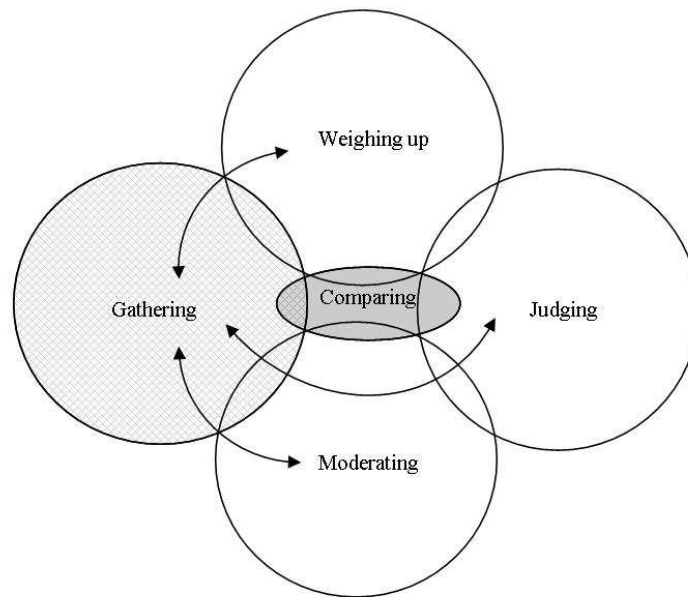
Figure 6.2 The relationship of Gathering to other categories in the CNNC model

While *gathering* is a category in itself and describes strategies for obtaining information and directing and controlling the students practice development, it is also an important aspect in *weighing up*. Here the information *gathered* is *compared* to accepted standards (benchmarks). Through *comparing* various aspects of information *gathered*, contradictions in practice may be identified and require further investigation. In these circumstances nurses will return to *gathering* further information in order to progress the analysis to determine the *value, merit and worth* of the practice. This will confirm or dispel perceptions of incompetence and assist nurses to construct a picture of the student's practice. *Gathering* is also associated

with *judging*. Like *weighing up,* the completeness of information is important to this aspect of CCNA. Having determined the level and contribution of the student's practice, further information may need to be *gathered* in order to confirm or dispel ideas about competence, or provide further evidence to confirm professional judgments made. This will involve *moderating* judgments with others. *Moderating* presents as another form of *gathering,* where information is *gathered* to test ideas about competence. Again, *comparative* analysis is employed and judgments arising from this are considered. Where there is disparity between the nurses' judgment and that of others, further *gathering*, *weighing up* and *judging* activities may be engaged in. These processes confirm the need for *gathering* to occur. Without this, *comparison* would not be possible and information to inform decisions would be unavailable. This would impact on all stages of the CCNA and demonstrates that *gathering* plays an important role in feedback processes within the CCNA model, reveals the inter-connectedness of the categories that make up the CCNA, and the role that *gathering* plays in this.

How the concepts *creating opportunities, letting out the leash* and *collecting the evidence* embedded in the category of *gathering* are utilised by nurses to collect information, and factors that influence the process of *comparative analysis* and the impact these can have on the assessment of competence, will now be explored.

6.3 Creating opportunities

The theoretical proposition that information about the student's knowledge base and practice ability is required to assess competence is supported by the concept *creating opportunities*. This comprises the properties *establishing relationships, identifying*

student-learning needs, and *teaching competence*. These properties represent strategies that nurses use to position themselves where they can observe, assess and *gather* information about student attitudes, practice knowledge and ability that will inform competency decisions. *Creating opportunities* commences with *establishing relationships*.

6.3.1 Establishing relationships

Establishing professional relationships that facilitate communication and support the student and those supervising their practice development, is important to the CCNA. In order to *identify student learning needs*, *create opportunities* for practice development, *gather* information and undertake *comparative* assessment, nurses in this study identified the need for effective relationships. These facilitate communication and place nurses in a position where they were able to *gather* information to inform decisions about competence, manage the learning environment, and keep patients safe.

It is vital to develop a working relationship with the student that results in the preceptor being able to get close, and assess the student's practice development and resulting level of competence. The closer the relationship, the more likely the student will talk openly about their feelings, and how they perceive the practice experience and those they work with and care for (Booth, 1997; Chow & Suen, 2001; Mahara, 1998). The development of trust is central to the success of interactions between the student and the preceptor (Curzon-Hobson, 2002). When students know that learning is respected, and that if they do not know something, or a mistake is made, the preceptor will be supportive, welcome questions, and help them to problem solve the

challenges of practice, the student is more likely to trust those that they work with and communicate their feelings and learning needs (Booth, 1997; Chow & Suen, 2001; Gaines & Baldwin, 1996; Redmond & Sorrell, 1996). Being open to questions and encouraging students to discuss practice assists the development of working relationships and reinforces the notion that preceptors are there to help.

> *'I am constantly saying to students…anytime, ask any questions, we will remember the mistakes but we never remember the silly questions' (I2-494-495.*

The outcome of this type of interaction encourages the development of the student – preceptor relationship and provides the preceptors with valuable information that is used to determine learning requirements, and plan teaching, which contributes to the assessment process.

The length of time that students work with one nurse influences the degree of relationship development. This is problematic where continuity of preceptors is an issue (White, 2001). The situation where students have a different preceptor every shift makes *establishing relationships* difficult. The consequences of this are that often no one preceptor has had sufficient time working with the student to establish a relationship and *gather* information about their practice ability beyond what was observed during a single shift.

> *'If you have half a dozen preceptors, who knows who has done what?' (I2-1081).*

In this situation, the scope and level of the student's practice becomes fragmented and it is difficult to identify practice development that may have occurred.

> *'[The] consistency and continuity in preceptors and clinical nurse educator is so valuable' (I2-448).*

This was considered an advantage and one which facilitated the establishment of relationships with students

> *'[and]results in a more accurate assessment' (I2-449).*

Another factor affecting the *establishment of relationships* is the individual's personality. This may or may not be congruent with the development of a positive relationship. Personality clashes are cited as influencing the quality of teaching and learning in practice, and colouring nurses' perceptions about student ability (Booth, 1996; Spouse, 2001). Nurses are aware of the potential for this and that the outcome may adversely impact on the assessment outcome for a student.

> *'I think as a preceptor you have to be aware of the fact that sometimes you get a student, who for some reason you just...there is a personality thing. I've just said, look I'll get someone else to do this or it's time for me to have a change, you know and step aside and let someone else have that person' (I2-699-700).*

Here concern for student learning and the implications of a non-productive relationship and the

'potential for a member of the preceptor team to have a bias' (I4-489)

is acknowledged. If it is established that the relationship is not workable, the preceptor may change. Nurses said that students had to learn to work as a team, and that they [student] could not choose who they worked with, or cared for. Consequently changing a preceptor was not considered lightly.

Where positive relationships are established over time, preceptors are able to *gather* more comprehensive data about students to inform competence decisions. Working with students and talking about experience provide a valuable source of information that would not necessarily be available if a relationship had not been established. Conversations between the preceptor and student augment observation of practice. These contribute to the assessment process by providing the preceptor with insights into the student's knowledge and attitude. One nurse said

'[the] conversations I have with students…influence how I think about

their competence…I listen for the language, the attitudes' (I3–17-19).

While the relationship contributes to the assessment of competence by providing the preceptor with a means to better understand the student, their perceptions, behaviour and learning requirements, establishing a trusting relationship with the student is also important for the preceptor (Gaines & Baldwin, 1996; Redmond & Sorrell, 1996) to maintain a safe practice environment for patients. Preceptors need the security of knowing that students will be honest about their experience and capabilities, and will communicate these to them, identifying when assistance is needed. In this study,

some preceptors feared that students believed that, in order to be seen to be effective and competent, they had to do everything by themselves.

> *'So the danger is that instead of going OK this isn't quite something I'm aware of, I will go and talk to the staff nurse, they think oh my god, I have to solve this by myself' (I2-491-493).*

This applied especially to transition experiences prior to state final examination, where student's practice was expected to demonstrate independence. Nurses were concerned that unless a close working relationship was established, where students felt safe to ask for advice and assistance and were appropriately supervised, they may engage in activity that was unsafe for their level of experience and knowledge. They stated that students needed to realise that

> *'They don't have to do it solely on their own' (I2- 474).*

Nurses appreciated that the pace of practice is fast, and that sometimes students found themselves in situations, that called on knowledge and skills beyond their capability. Having established relationships with preceptors meant that in times of stress, or when students do not know what to do, they have someone to consult in the department.

> *'Having someone that they trust and will tell when they are not sure or if something happens' (I2- 964-965)*

is an important aspect of maintaining a safe environment. For this reason, the establishment of a close working relationship with students is deemed important. Relationships are more likely to develop quickly where the practice environment is friendly and welcoming and where nurses recognise learning competence as a developing process (Booth, 1997; Spouse, 2001). *Establishing relationships* between students and preceptors that are positive, result in more successful facilitation of teaching, learning and assessment of competence, as the preceptor can more accurately establish which experiences are appropriate for students to undertake, assess the student's ability to manage new situations, and intervene where needed to ensure that patient safety is maintained.

While establishing a relationship with students is considered important to the teaching, learning and assessment process, nurses engaging with students are very aware of professional boundaries. In situations where these are transgressed and very close relationships have been developed, it may become very difficult for a preceptor to fail a student. In situations like this nurses said

> *'It's really difficult where students are well known and liked...people*
>
> *feel sorry for the students, they understand they've got problems'*
>
> *(I1-924-925).*

> *'You want them to get through' (I2-197).*

Where preceptors get over involved with students, there is a risk that the relationship may compromise the assessment of competence (Duffy, 2004).

'They think this student is a nice person and maybe one day they'll

make a really good nurse' (I5-121-122).

The impact of the relationship between the nurse and student, and the influence

on the competency assessment process is explained in more detail in Chapter 8

(*judging*).

 Relationships with colleagues are also important. Preceptors are reliant on other

nurses to provide information about the expectations of student practice and

competence requirements, support students in their absence, and contribute

information about the student performance when competency is formally assessed.

Developing relationships with those who work directly with students was of

particular significance for nurse educators, whose direct contact with students is

often limited due to the number of students needing supervision. They identified that

'…working in close relationship with the other registered nurse [was

important] as a lot of the time you are not actually working with the

student. You are relying on people's reflective prose and narrative

stories to inform competence decisions' (I1-50-53).

Using second-hand information about student performance to make a decision about

competence was reported frequently in interviews. As a result, nurses disclosed the

need to feel that they could trust colleagues to be open and honest about their

perceptions of the student's ability, and provide feedback about professional

judgments regarding the student's level of competence. *Established relationships* are

important for this and the validating processes used by nurses when making competence decisions. This issue is explored more fully in the concepts of *collecting evidence, truth seeking* and *trustin*g in Chapter 9 (*moderating*).

In addition to *facilitating and managing feedback* inherent in the process of *gathering*, positive working relationships with colleagues are important for *creating opportunities* to extend the development of the student's practice. Where learning experiences are not available in the immediate area of practice, the preceptor's relationship with colleagues in other areas can positively influence the student's access to these and *create opportunities* for further practice development. For example, having an established relationship with a colleague in operating theatre may facilitate a student's opportunity to follow a patient through an operative procedure. Connecting with colleagues and facilitating experiences like this increases the number of opportunities available to *gather* information about the student's performance, and is useful for *identifying learning needs* and further opportunities for practice development. The wider the variety of experiences available, the more opportunities arise to *gather* information for comparative assessment to determine practice competence.

6.3.2 Identifying learning needs

Experienced nurses have developed diagnostic and monitoring skills that are used to detect signs of patient deterioration (Benner, 1984). Similarly, nurses with experience of students develop specialised knowledge about students and what they need to marry theory with practice to develop and demonstrate competence. The process of *identifying learning needs* provides a beginning point for nurses working

with students, and is a diagnostic process that is central to the teaching, learning and assessment of competence. *Identifying learning needs* determines the scope of student practice and provides the foundation for the identification of practice boundaries (Spouse, 2001). *Identifying learning needs* underpins the theoretical propositions associated with *gathering* and *creating opportunities*, in that, in order to facilitate development of student practice and assess competence, information regarding the student's knowledge and ability is required. It clarifies which tasks are safe to delegate to students. This determines what is taught, the extent of *supervision* required and measures employed to *monitor* and *control* practice development to maintain patient safety.

Identifying learning needs is facilitated by the successfulness of *gathering*. Course handbooks detailing learning outcomes, information about the expected scope of student practice, assessment requirements and criteria, assist this process. These sources of information provide insight into practice expectations and help preceptors establish the student's clinical focus and how they might facilitate and assess practice development.

Establishing expectations for students' practice is problematic for those working directly with the student, if *gathering* is impeded by the lack of readily available information.

> *'you are not sure what's been taught and you are not sure where the student should be at on some things' (I2-819-820).*

Where this occurs, making decisions about how much students know and what the focus of learning and assessment should be, is difficult. Access to information was identified by nurses in this study as a significant issue impacting on the competency assessment process.

> *'While they [Nursing School] send out the course handbooks...they often get stuck in the manager's office and don't get to the people that need them...or the people precepting don't get a chance to read them' (I1-664-667).*

Lack of accessibility to information and not having time available during the working day to become acquainted with student educational background influences the process of *gathering* and determining competence. Without knowledge of the expected level and scope of student practice, there is a danger that preceptor's expectations of students may exceed the student's knowledge and practice ability. Here the risk exists for students to be delegated patient care that they are unable to implement safely. This was of particular concern for nurses who said they did not have a reliable source of information and could not rely on students to provide direction about teaching requirements. One nurse stated

> *'You cannot rely on students to tell you what they can or cannot do as they themselves were unsure of their scope of practice and go ahead with procedures that they were not certified to undertake' (I2-42-44).*

Without clearly defined expectations, nurses have difficulty knowing what students need to learn and how they can support student learning in practice, assess this and maintain a safe environment for patients.

If preceptors have unrealistic expectations of the student's ability for their level of education, assessment outcomes may be adversely influenced. Here, individual preceptor's expectations of practice determine the benchmark for safe practice. This may differ from the NCNZ professional standards and result in students passing or failing an assessment when they should not. Lack of understanding related to the student stage of education, and practice ability may also result in unsuitable learning needs being identified. If this occurs, teaching may be inappropriate for the level of practice, for example, titrating narcotics. While students need to know about this procedure and the implications for monitoring clients, it is inappropriate for them to engage in performing a post registration activity. A more in-depth explanation of the implications of lack of knowledge of assessment requirements, and the influence this has on determining competence is discussed in the concepts of *collecting the evidence* and *benchmarking,* and the category *weighing up* in Chapter 7.

Until learning needs are established and nurses have a clear idea about the student's knowledge base and practice ability, they control the practice environment and ensure safety by limiting student practice to observing or assisting. This limits student practice to that which is undertaken under direct supervision. Nurses are not comfortable delegating care to students until they have

'an idea of the student's knowledge base and practice ability and

[are] confident that the student is safe to practice within the context of

the situation requiring intervention' (I2- 621-623).

During this time, preceptors closely observe the student practice and *gather* information by asking questions that elucidate the level of student knowledge. For example

'I like to ask about predisposing factors they are aware of...and what

are you going to be observing for and why...[and] what's the

pathophysiology. Do you know about the emergency trolley...its just a

flow [of questions about] a chain of events...like what's normal and

what's not' (I2-368-370).

Asking questions and testing the student's knowledge of situations is a strategy used by nurses to establish information about the student's ability and is used to *identify learning needs.*

'You can judge a lot from the questions that students ask as well and

the frequency. If they ask the same question, that can lead you to

wonder how much of a good knowledge base have they got?'

(I4-386-388).

As an educator, I am aware that student preparation for practice, or lack of this, greatly influences the ability of the preceptor to undertake an early assessment of

their capability, to *identify learning needs,* and establish practice boundaries and teaching. Preparation is considered more than attending lectures and laboratory sessions at the educational institution. Students are expected to have input into determining the nature of their practical experience and have undertaken some preparation before reporting for practice. This includes formulating individualised learning outcomes or practice objectives that detail their aspirations for practice and learning needs.

Objectives provide a means for the preceptor to *gather* information and gauge where the student is 'at'. They also provided insight into what students think the experience might offer and their perception of their learning needs.

> *'What information they [student] provide as their objectives can actually tell you quite a bit as far as where some one is at' (I2-19-20).*

Students who come prepared for practice with objectives, positively influence what preceptors think about them and their level of practice development.

> *'Objectives are one of the things that give you a little bit of a clue …If they come and say this is what I want to achieve…your instant impression is wow…they're switched on' (I2-34-36).*

Thoughts surrounding this are considered by nurses when undertaking competency assessment. One nurse said

'I judge students on their preparation. Have they prepared objectives

that will work' (I1-128-129).

Presenting for practice without objectives is not viewed favourably by preceptors or educators, and raises questions about the student's professional responsibility for learning and commitment to becoming a nurse.

When determining student learning needs, nurses value information concerning previous practical experiences and how students like to learn, with conversations focusing on

'determining learning and learning styles and capacity' (I1-453).

These, coupled with responses to questions, observations of practice, course information and student objectives enable preceptors to envisage the student's practice capacity and limitations. Questioning provides an opportunity to *gather* information and cultivate initial impressions about the student's level of practice competence. This assists preceptors

'in identifying which practice tasks the student is able to complete

safely and independently, which requires supervision, and what

aspects of practice [they] needed to teach' (I2-685-687).

C*omparing* student responses and the information *gathered* to expected levels of practice identifies contradictions. These suggest knowledge and practice deficits and

assist the nurse to establish learning needs. This information provides the basis for planned teaching and enables the preceptor to create opportunities that students need to be exposed to in order to develop their practice and demonstrate competence.

The practice environment and the variety of experiences available, impacts on student learning and the opportunities to create experiences to extend practice development and assess competence. This is considered a

> *'tricky point if they [students] are in an area where there is limited hands on' (I1-453).*

Here the student may not be afforded the opportunity to demonstrate their ability. This in turn impacts on the assessment process and highlights the need for appropriate clinical placements that will allow the student to interact with patients, perform care and develop practice competence.

In situations were practice opportunities are exhausted, preceptors and educators look to others areas for experiences that will *create opportunities* for student development and provide other avenues for *gathering* information about students to inform assessment decisions. *Establishing relationships* with colleagues assists this.

Nurses acknowledge it is especially difficult to 'pick up' on everything that a student is doing when they do not work consistently with that student over a period of time. Nurses rely on others to feed back their experiences with the student. This aspect of *creating opportunities* has been previously discussed in the property *establishing*

relationships. This also influences the process of *identifying learning needs*. One nurse commented

> *'in situations where I've been concerned and passed that concern on to the colleague working with the student…and they say 'oh yes' I hadn't noticed that' (I1-585-587).*

This is an example of the value of having well established working relationships with colleagues, and communication networks that can assist the preceptor and educator confirm and monitor student practice development, and plan teaching.

While *gathering* information from students and assessing their learning needs provide a starting point for determining requirements for practice development, this process continues throughout the clinical experience. Like the assessment of patients, the assessment of students is an on-going process. In this study, preceptors appeared to give little planned thought to this activity, intuitively knowing when to provide support, teach or intervene, with the frequency of assessment being directed by the *learning needs* of the student.

Each time the student's practice is assessed, the evidence is *gathered* and *compared*. Nurses reflect on the outcome, a judgment is made and new interventions for teaching and learning implemented as required. This process is illustrated in Figure 6.3, which demonstrates the interconnectedness of *gathering* to the *identification of learning needs*, *teaching competence* and *creating opportunities* for practice

development. *Comparing* the information that has been *gathered* is central to this process.
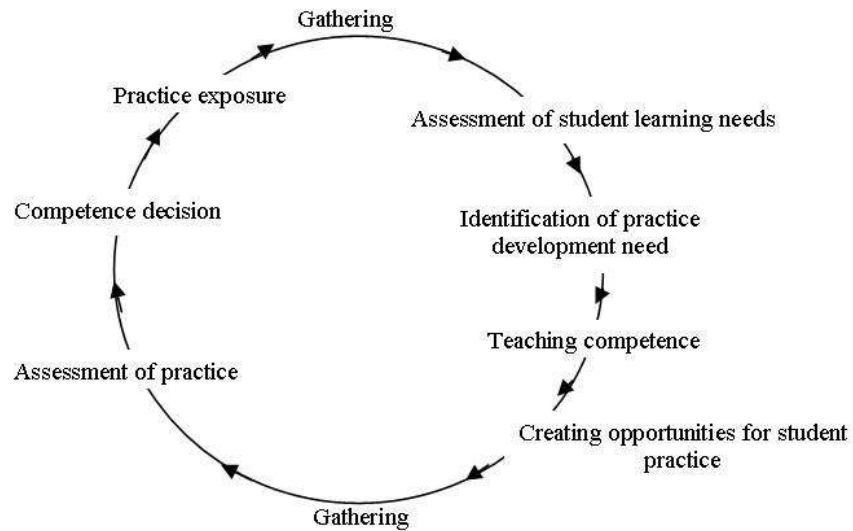
Figure 6.3 The process of gathering and identifying student learning needs

Here, c*ritical comparative analysis* determines practice contradictions, identifies learning needs and directs the 'what next' in teaching and assessment of competence. In situations where assessment outcomes do not result in a decision where the student is deemed competent, the cycle of *identifying learning needs* incorporates further teaching and assessment. The number of times *gathering,* assessing, teaching and identification of the need for further learning and practice is undertaken, is determined by how quickly a student achieves competence. Where practice exposure results in the identification of contradiction and the need for practice development, the significance of the contradiction and the time in which this occurs will impact on whether this can be addressed within the timeframes of the practice experience, and whether the student will pass or fail the assessment of competency.

Once learning needs are assessed, preceptors implement strategies, including teaching, to provide students with experience that will integrate theory with practice, support the development of practice, and consolidate learning. Nurse Educators, maintain detailed records of interaction with students, teaching, future learning needs and evidence of competence. However, few preceptors involved in this study constructed a plan for teaching and assessing practice, or maintained records of the students learning needs, what they had contributed to student learning or evidence that they had *gathered* during the assessment of competence. This impacts on *gathering* information and influences the successfulness of monitoring and tracking processes employed by nurses to control the student's development of practice. This is further explored in the concept *letting out the leash*. Determining student learning needs, teaching and assessment of practice arise as opportunities present during the day. This process is continuous throughout the practice experience.

As a diagnostic process, *identifying learning needs* is a moderating factor, which interconnects with teaching and assessing competence. *Identifying learning needs* is essential for determining the scope of the student's practice ability, knowing the tasks that can be safely delegated, the experiences that need to be created and determining what needs to be taught, in order to assess student's competence to practice.

6.2.3 Teaching competence

Central to the category of *gathering* is the theoretical proposition that, in order to assess practice competence, it first needs to be taught. The property *teaching competence* focuses on addressing practice deficits or extending practice by

providing new information and teaching skills to support practice development. *Teaching competence*, facilitating occasions for students to practice nursing, and supervising practice development, *creates opportunities* to *gather* information. Information *gathered* as a consequence of teaching interactions with students contributes to the decision-making process

The process of exposing students to practice, *identifying learning needs*, *teaching competence,* and assessing student practice development provide multiple opportunities for *gathering* information about student practice knowledge and ability that can be *compared* to best practice benchmarks to determine competence. Like the *identification of learning needs, comparison* and the identification of contradictions between observed student's practice and practice benchmarks provide the means for determining the student's level of knowledge and skill. The degree of difference between student practice and benchmarks becomes the catalyst for *teaching competence*. The greater the identified variance between the student practice and the practice benchmark, the greater the need for information and teaching. The use of benchmarks in analysing practice highlights the connection between categories in CCNA. This is explored in more depth in Chapter 7 (*weighing up*).

Where a practice deficit is identified, the degree of variance will determine the type of teaching strategy employed and include strategies to monitor and control practice until such times that the deficit is addressed. Where the variance is minimal, teaching may take the form of a casual conversation between the preceptor and student about the issue of concern. In situations where the variance is great, or when new situations present for practice development and the student has either little existing knowledge

or skill, the preceptor is likely to restrict the student's practice to observing or assisting until the procedure or aspect of practice concerned can be taught, and a controlled environment is present that allows the student to practice what they have learned under supervision. This aspect of teaching competence is interconnected with the concept *letting out the leash* which is explained in more detail later in this Chapter.

When selecting elements of practice to be taught, nurses acknowledge that these need to provide students with opportunities to meet the learning outcomes of the course in which they are enrolled; be appropriate for the scope of practice for a student; be safe for the student, those with whom they are working and for whom they are caring; and provide an opportunity to demonstrate competence. While this may suggest that teaching is structured and planned, this was not often the case. Preceptors frequently use **e**veryday moments in nursing to *create opportunities* for teaching, learning and assessment. For example "By pointing out patient problems that are unusual and by illustrating what is normally expected" (Benner, 1984, p.186), nurses teach competence through using *comparison* of similar and dissimilar patient cases.

In the same way, nurses *teaching competence* emphasise practice that meets competence standards.

> *'You see them do something or you hear them say something and I might say that's a really good example of how you're meeting this competency or that competency, as they don't always recognise it themselves'* (I3-217-219).

> *'Its like pointing out to them [student], that's an example of, or I think*
>
> *that's a good story that relates to this competency' (I3-256-257).*

This practice reinforces knowledge development and provides a means to integrate theory learned in the classroom with the practice of nursing.

While everyday moments provide teaching opportunities, nurses acknowledge that these can place undue stress on students who are expected to perform. For example:

> *'The other day we had a student working with us. We were changing*
>
> *IV fluids and I got her to work out a litre of fluid over 8hrs and she*
>
> *was having difficulty working it out. There were two of us trying to*
>
> *explain it to her. I think she was feeling pressured because she had*
>
> *two RNs standing there asking her questions. In the end, I pulled back*
>
> *and said look why don't you go out the back and think about fluids*
>
> *and work that out. She came back with the right answer' (I2-400-405).*

Choosing experiences and knowing when the student's practice capacity has been reached or pulling back is important to the teaching and assessment process. Inability to perform does not necessarily mean that the student does not have the knowledge base or skill required to complete the task. Here, the influence of the learning environment is acknowledged. Nurses consider this when making competency decisions.

Common strategies emerged from interviews about how nurses *teach competence*. These include facilitating learning competence through practice, role modeling, teaching reflective practice, self directed learning, and facilitating clinical reasoning using critical thinking exercises. Of these, facilitating learning competence through practice was the most common method used by nurses to assist practice development and *teach competence*. The outcome is that the student is often expected to perform and achieve competence having observed a procedure once. Here

> *'see one, do one supervised, do one unsupervised' (I1-1002).*

was cited by nurses as a common framework for organising teaching. Demonstration is perceived to be the quickest and most convenient way to *teach competence*. This provides an opportunity to role model the provision of care and allows multiple facets of information about equipment, procedures and patient requirements to be covered within the one activity. When selecting learning experiences preceptors prefer to

> *'...start with the basics, then progress to more complex tasks as the*
>
> *student's knowledge and skill develop[ed]' (I1-145-146).*

This provides a way of further establishing an idea about the student's knowledge base and ability, and is a way of *controlling* the teaching, learning and assessment process.

Identifying appropriate learning opportunities can be difficult for those who do not have a clear understanding about the student's expected scope of practice (Herrmann, 1997). While assessment frameworks utilise the NCNZ competencies to provide

direction for determining what students need to know and what needs to be taught and assessed, nurses in this research were of the belief that finding tasks that students could safely undertake to meet competency standards that are designed to provide practice guidelines for registered nurses, was difficult. One nurses said:

'Competencies have moved more to broader categories so its hard to find a task they [student] can do that reflects broad definitions' *(I1-86-87).*

As previously identified, the process of *gathering* information is not limited to the first interaction with a student. The outcome of data *gathering* determines the 'what next' in *teaching competence*. This is also important for monitoring and supervising practice. *Gathering* is initiated in response to the need for information and is purposeful. However, there are times when this can occur spontaneously.

'...you pick up on things and it just comes at you and you don't realise what the triggers are' (I1-1278-1279).

The *identification of learning needs*, and assessment of practice is a continuous process. While decisions about competence may or may not be formally *moderated* during this phase of CCNA, through the *establishment of relationships,* information is *gathered* from colleagues and the student. This influences the preceptor's or educator's ideas about the student's level of competence. The greater the degree of contradiction between the student's practice and practice *benchmarks,* the more likely preceptors will discuss student performance with others, and where necessary

moderate their decisions and plans for *teaching competence*. This may result in students being taught elements of practice, stricter controls being placed on practice, and an increase in supervision and monitoring activity. This is discussed further in the concept *letting out the leash.*

For nurses involved in this research, another aspect of learning through demonstration in practice involved role modeling. This is considered to be an important factor influencing *teaching competence* and assessment outcomes (Andersen, 1991; Howie, 1998; Lyth, 2000; Rittman & Osburn, 1995). According to Bahn (2001), role modeling can be conceptualised as simple imitation, which encompasses learning about professional attitude, and interactions with patients and members of the multidisciplinary team. Bandura (1977) considers modeling as being a powerful means of transmitting not only values and attitude, but also patterns of thought and behaviour. In nursing, role modeling is likened to professional socialisation, where the student learns to act as a member of the group, their behaviour representing the social norms and accepted behaviours of the clinical practice area and those who work within it (Betz, 1985; Davies, 1993; Benner & Tanner, 1996).

Where role modeling behaviour does not meet best practice guidelines, students are at risk of learning practice that does not meet accepted standards. This may adversely impact on the outcome of competency assessment, where the practice beliefs and behaviour of others are not congruent with those taught to the student (Lauder, Reynolds & Angus, 1999).

The nurses in this study were aware that it is the student's aim to fit in. They believed that students were very aware that preceptors had the power to pass or fail them in practice. Because of this some nurses thought that students

'...*do and say what they think you want' (I3- 44).*

Whether students would consistently perform to the level and expectations of the preceptor is an issue that is considered when competence is assessed. Issues related to the pressure under which students are placed, and the expectations of individual preceptors, are also acknowledged. Nurses believe that until the student's level of confidence and assertiveness is developed, they are less likely to challenge the practice of others and are therefore accepting of the ways of knowing and doing to which they are exposed. While "there is no guarantee that the observer [student] would express or reproduce the behaviour" (Bahn, 2001, p. 111), it was felt that unless the practice observed violated the students moral principals, it was likely that they would base their practice on that which was role modeled. The influence of role modeling unsafe practice is a concern and was reported to be a point of debate when student's competency assessments are non achieved (Betz, 1985). Students would argue that they were doing what they were taught (Fontaine & Pullon, 2000). This issue, and how nurses manage conflicting opinion, is discussed further in Chapters 8 (*judging*) and 9 (m*oderating*).

6.4 Letting out the leash

While teaching students and allowing them to provide care and practice the art of nursing provides a means of *gathering* information to inform assessment decisions,

this may place patients at risk. The concept *letting out the leash* is about managing this risk. It is comprised of a combination of strategies nurses employ to control the process of teaching and learning in the practice environment. These activities and the properties imbedded in this concept interrelate with those described in the concept of *creating opportunities*. Together these enable nurses to fulfill the theoretical propositions and outcomes associated with this aspect of CNNA. In doing so, the need for the student to develop practice and have opportunities to demonstrate this need to be balanced to ensure that public safety is maintained (Brykczynski, 1999).

Nurses recognise the importance of monitoring student practice development as part of their moral duty to care (Benner et al., 1996; Stokes, 2005). To protect patients, nurses incorporate practices that make provision for *supervising, monitoring* and *controlling* student's practice development (Lyth, 2000). In this study, these strategies include the use of *comparative analysis* to identify practice that contradicts accepted standards, anticipate unsafe practice and situations where students will require support, assess the patient's condition and suitability for student involvement in care, assess the demands of the environment which may influence the provision of safe care, continually *gather* information to assess student practice development and identify their strengths and limitations, and implement strategies to reinforce teaching and to help students learn and achieve competency standards.

6.4.1 Supervising practice

Supervising practice is a property of the concept *letting out the leash*. This supports the theoretical propositions underpinning the category of *gathering*, in that, by working alongside students and supervising their practice, preceptors are able to

place themselves in a position to *gather* information about the student's ability and address this through *teaching competence*. At the same time, they can intervene when patient safety is questioned.

Supervising practice is a condition of *gathering*. This means that, in order to *gather* information, assess student practice and make decisions about competence, nurses are to a large degree reliant on direct contact with students. Lack of supervision limits the nurses ability to *gather* information. Supervision of student practice is dependent on the availability of appropriately prepared preceptors.

In recent years, the role of the preceptor has changed from that of a 'buddy' (where the nurse assisted with orientation and was a friendly face in practice) to that of facilitating and supporting the practice development of others (Chow & Suen, 2001; Lyth, 2000; Spouse, 2001). Issues relating to casualisation of the work force and nursing shortages are believed to have had a major impact on the availability of nurses to perform this role (White, 2001). There has been little acknowledgement of the skills required for preceptorship or the workload associated with managing a full patient load, and supervising and teaching students or those being preceptored (Chow & Suen, 2001). Where there is a lack of preceptors, nurses involved in this research expressed concerned that both of these issues had the potential to have a significant impact on the process of *gathering* information and the assessment of competence.

In situations where there is little planning or preparation made for students, nurses are often unaware that students are reporting for practical experience. The nurse may have no time to prepare for students, and may not have been asked if they will

precept students. In the current environment, workloads are high (White, 2001) and while having a student may be perceived as having another pair of hands, the responsibility of supervising a student and the amount of time required to teach and assess practice is not acknowledged (Hunt, 1997; Tilley & Watson, 2005). As a result, nurses involved in this study reported that they felt the role of a preceptor was a burden and contributed to nurses becoming burnt out. Several instances were quoted where preceptors

> *'lack[ed] knowledge surrounding the outcomes for students. Their competencies and the responsibility for supervising and assessing students is quite often - just thrust upon them' (I3-110-114).*

In these situations there is an increased likelihood that nurses will decline to precept students (Gidman, 2001). The consequences of this situation occurring are that students may not be adequately supervised, and the ability to *gather* information, and therefore public safety may be compromised. This reinforces the need to *establish relationships* and for practice and education to work together to facilitate the development of the students by employing strategies to *monitor and control practice*

6.4.2 Monitoring and controlling practice

As previously identified, *gathering* information is a continuous process. The result of this activity informs the nurse about the student's knowledge, ability and progress made toward achieving competence. Inherently, this provides a means for monitoring practice development and is used to control the scope of student practice. *Controlling*

practice is achieved by determining boundaries that limit the scope of what students can do. Boundaries identify

> *'…which practice tasks the student are able to complete…independently, which require supervision and what procedures students should not be allowed to attempt'*
> *(I4-685-687).*

To a large extent, boundaries are determined by the student's status and legal requirements associated with guidelines identified for health professionals. The student's scope of practice may also be constrained by policy within the clinical practice area. Selected procedures require the caregiver to be a registered nurse, who has undertaken further education in a particular area of practice. For example, canulation and intravenous drug administration are prohibited activities for students.

For nurses in this research, the primary reason for *controlling practice* was the maintenance of patient safety. The number of restrictions that nurses place on student's practice is dependent upon the individual nurse's practice experience, knowledge of practice expectations for students, and experience working with and assessing students. Nurses who are new to preceptorship, or who lack knowledge of the expectations surrounding student practice, or are not confident in their own ability, are more likely to set strict boundaries that limit the scope of student practice and reflected their personal expectations. This is exemplified by the following nurses who said

'I always set boundaries first and say its really important…this is the way I

need you to practice with me' (I4-22-23).

'Until I know and I am happy with where they are at, I'm not going to let

them have a patient because I actually have to know if they are ok'

(I2-600-601).

The term *letting out the leash* is used by nurses in this research to describe the way in which they maintain control of the student's practice while they ascertain the extent of the student's knowledge and skill base. While boundaries are revised frequently, the concept of *controlling* practice is a strategy that nurses continue to employ throughout the placement to maintain safety. This also provides a means of *gathering* information, which in turn contributes to the identification of *learning needs* and *supervision* requirements. The interrelationship between properties and concepts within the category of *gathering* are evident and reveal the complexity of nurses' practice when they are engaged in *gathering* information to facilitate and assess the practice development of students.

As students demonstrate their ability and nurses are satisfied that the student's practice is safe, boundaries are extended to allow practice development to move to the next level. The process of allowing the student more responsibility as their skills base develops is described as giving the students 'a bit of rope'.

'I like to see them doing it [when] I have that trust [then] I give them a bit

more of that rope' (I4-380-381).

'Then we let them go...letting the leash out... A bit more everyday [based] on what your observations are of the job they are doing... they are fine... they feel safe' (I2-602-604).

Maintaining boundaries and continuing to *gather* information provides the means for determining whether the student is able to cope with the extension of practice offered. This informs perceptions of what the student can do safety and is a significant aspect of *controlling* and *monitoring* student practice development.

The analytical process underpinning how nurses determine when to either 'let' or 'hold' the leash, to maintain *control* of the student's practice, or facilitate its advancement, is the BSPP *comparing*. The assessment of similarities and differences resulting in the identification of practice contradiction, determines when practice needs to be controlled and intervention is required. The nurse's responsiveness is directed by decisions that are informed by information *gathered* about student practice. This is *compared* to known practice benchmarks, the nurse's knowledge, and the memory of past experience. Interpreting similarities or differences between student practice and benchmarks verifies or falsifies ideas (Sartori, 1991) about competence. Where contradictions are associated with risk, *controlling* and *monitoring* student practice is more intensive.

Once the student's ability is determined, nurses allow them to engage in practice. Determining practice knowledge and ability requires an opportunity to work with the student and time to *gather* information. During this period, nurses keep students close and carefully monitor their practice.

'We work with the student for a couple of days and keep them quite

close' (I2-600-601).

Lack of continuity of preceptors and the time required for *gathering* information impact on the nurse's ability to determine the student's knowledge base and capability (Gidman, 2001). The consequence being that as students moved from one preceptor to another, the mechanisms of *controlling* practice and keeping students close, restricting delegation of care, resulted in the student's practice development being arrested. Here students are required to repeatedly perform tasks in order to prove that they have mastered a skill and are safe. This impedes the amount of information that can be *gathered* about the student's level of practice and may adversely affect the decision making processes of CCNA. In these circumstances, the limited amount of information may not be sufficient for the nurse to undertake *comparative* analysis and feel confident that they are able to determine the level of practice competence.

According to Saul (2001), imagining consequences, using memory and knowledge results in the ability to predict events. In CCNA, monitoring student practice and knowing when to intervene is guided by *comparing* practice to accepted standards that benchmark practice requirements. By watching student behaviour and identifying contradictions, nurses use knowledge and memory of past experience to imagine the consequences of the student actions. In situations where nurses talk about 'feeling' uncomfortable, unsure or not confident, their perceptual awareness has been raised. According to Benner, Tanner and Chesla (1996), perceptual awareness arising from emotional responses like this is a reflection of unconscious

identification of similarities and differences. This is central to problem identification and is described as being the impetus for nurses responding even when the situation is unclear. This emotional response activates the unconscious, creating a situation of '*knowing*' and results in the nurse intervening in a 'moment of practice'. While the student has yet to act, nurses are able to use this skill to predict student's actions, intervene where student practice is likely to contravene patient safety, and avoid what they refer to as 'near miss ' situations. The following nurse explains

> '*You can actually have near miss situations. I can think of one where the student was almost about to take a verbal order for Panadol and I said no, she picked up the phone, and you could see that was where it was heading and I intervened*' (I2-900-903).

Here, the nurse senses impending risk as a critical point in this aspect of CCNA. By intervening, nurses attempt to *control* the teaching and learning environment. This nurse summarises *letting out the leash* and controlling practice saying

> '*I always set boundaries...I orientate them [students] to the way I work...all the safety issues first, see what they are about – what they come up with. Then I give them a bit of rope and if I feel that their practice isn't safe and they are about to do something that's not appropriate, then I'll step in*' (I4-22-27).

The supervision of practice, *gathering* information and constantly *comparing* students actions and responses, guide nurse's decision making about *controlling* the

leash. The number of times intervention is required influences the nurse's decision about practice competence. The more frequently the intervention is required, the more likely that this will influence the nurses professional judgment and result in failing a student, as the perception is that the student is not safe (Stokes, 2005). Similarly, the number of times a student asks the same question or requires repeated teaching raises the nurses perceptual awareness about the student's capability and identifies risk. These situations determine how much latitude nurses will afford the student. This practice is evidenced in nurses knowing when to *let out the leash* and when to 'haul' students in.

> *'Sometimes you have to say hang on. Lets get the basics sorted...'*
> *(I2-455).*

Controlling practice by *letting out the leash* supports and sustains the theoretical proposition of maintaining patient safety. *Letting out the leash* is a cyclic process that is dependant on information *gathering* and *comparative* analysis. The complex nature of this aspect of CCNA is depicted in Figure 6.4. This illustrates a process where *gathering*, the outcome of assessment, and the existence or non-existence of contradictions facilitate either *controlling* (holding) or *letting out the leash.*

Figure 6.4 Letting out the leash – controlling practice development

Embedded in this process is the *identification of learning needs* and *teaching competence*, which work in unison to manage and control the practice development of students. Each time a contradiction is identified, the leash is held and controlling and teaching activities are engaged. These continue until the nurse is satisfied that the student's practice is safe. At which time, they *let out the leash*, re-expose student to practice by giving them a little bit more rope, and re-embark on *gathering* information.

While the primary focus of *letting out the leash* is to control practice development and ensure safety, nurses also describe this as a method of weaning students. As students become more and more proficient, the preceptor allows them to take more responsibility. As a result of constant feedback and *comparative analysis,* the processes inherent in this concept manage practice development. The greater the degree of feedback that affirms accepted ways of knowing and doing, the greater the degree of latitude is afforded to the student. This confirms competence and instills in

students confidence to exercise and develop practice wisdom. According to Musinski (1999), while *monitoring and controlling* student's practice, nurses become aware of student's level of practice maturity. Evidence arising from *monitoring and controlling* student practice facilitates the managing and *letting out of the leash* and promotes the development of independent practice, so that students gradually become less dependant on the preceptor for direction and advice. The practice of weaning students is seen frequently during transition practice experiences, where completing third year BN students prepare for new graduate roles. This situation and the processes inherent in *controlling* the development of practice are reliant on *tracking practice* progress toward competence.

6.4.3 Tracking practice development

As previously identified *letting out the leash* is reliant on information *gathering,* the results of which confirm or dispel notions of competence. The property *tracking practice development* is another facet of this. It is a mediating factor that is implemented in tandem with the property of *monitoring and controlling practice* and provides the feedback mechanism to determine the degree to which practice development is allowed to progress. Nurses use the strategy *tracking practice development* to provide a continuous flow of information about the student's performance and ability, which is used to guide decisions.

The length of time that a nurse works with a student and how many preceptors the student has influences information *gathering* and *tracking practice development*. In this research, interviews revealed that in some areas of practice, students were reported to have a different preceptor every shift. If a means of capturing and

transferring information is not implemented, the flow of information about students and *gathering* become disrupted. Here preceptors find themselves starting afresh, nurse educators have difficulty *tracking practice development* and student's practice is continually arrested due to preceptors not releasing the leash until they have had an opportunity to assess the student's capability. When combined, these factors are considered by nurses to have a significant impact on their ability to *gather* information to inform decisions about competence.

Where practice areas appoint a coordinator to oversee the student's experience and facilitate the collection and transfer of information, making decisions about competence is easier.

> *'Having one person coordinate student practice is really important, not only from being able to facilitate the learning experience in terms of teaching and all the rest of it, it's the coordinating the feedback for the assessment as well…its like pulling it all together' (I2-1099-1104).*

This is of particular assistance to nurse educators, who are charged with the responsibility for completing competency assessments and yet, due to the numbers of students that could be accommodated in one area, found themselves unable to spend an extended period of time with individual students.

The importance of *establishing relationships* previously discussed in the concept of *creating opportunities* is again highlighted in relation to this aspect of

gathering. Here the successfulness of relationships influences the flow of information. Where trusting relationships are established and nurses work together; there is a higher likelihood that complete and accurate feedback will be *gathered*. The reliability of information and its completeness influences the nurse's ability to *moderate* perceptions of competence and *construct a picture of competence*. While these aspects of CCNA are later explored in detail in the categories of *weighing up* and *moderating,* it is important to note the significance of *gathering* information and the importance of *tracking practice* in this process. If information is either unavailable, incomplete or inaccurate, the nurse's ability to track the student's practice development and 'work', the properties embodied in the category of *gathering* may be inhibited. Should this occur, nurses are more likely to experience difficulty determining the level of the student's knowledge base and practice competence. As a result the nurse's ability to manage 'the leash', control practice and maintain public safety may also be compromised.

The way in which *tracking practice* inter-relates with the properties in the concept of *letting out the leash* and other concepts connected with *gathering*, demonstrates the interconnectedness of properties and categories, and the complexity of the CCNA model. It highlights the importance of *tracking practice development* and methods of capturing information about the students.

While *tracking* practice provides a means for determining practice boundaries, it is also a means of collecting evidence. Without this, *comparisons* cannot be made and notions about practice competence cannot be confirmed.

6.5 Collecting the evidence

Collecting the evidence is an aspect of assessment practice that is interconnected with other concepts in the category of *gathering*. Like these, the focus of *collecting the evidence* is that of obtaining information to inform decisions about competence. Evidence establishes the parameters of the student's knowledge and practice ability. Collecting information about this is integral to *identifying learning needs*, *teaching competence, supervising, monitoring* and *tracking practice*. The focus of the concept *collecting the evidence* relates to the source and type of evidence or practice situations nurses target to *gather* the information required to inform decisions about competence. This includes the ways in which nurses *facilitate and manage feedback.*

The process of *gathering* information and *collecting the evidence* to inform decisions occurs by both informal and formal means and includes sourcing objective and subjective data (Shapiro & Drivever, 2004). Informal collection of information occurs throughout the clinical placement and is used to guide the day-to-day management of student practice as described in the concept *letting out the leash*. This may include direct observation, talking with other nurses, asking students questions, reviewing documentation and listening to comments made by patients. An example of questioning is giving by one nurse who said

> *' …questions like "show me what you've done…tell me…define…what do you mean…is it ok to do things that way"? That way you can get a clear understanding of their [student] ability and background knowledge' (I1-283-317).*

Formal collection of information, however, is a deliberate act, whereby nurses purposely seek out information from others or pay particular attention to a specific aspect of practice in order to facilitate the assessment of competence. This generally occurs in two situations. Firstly, in the process of *comparison*, when a practice contradiction is identified. This generally signals concern and suggests the identification of unsafe practice. It is likely that the assessing nurse will need to collect further evidence to confirm or dispel perceptions of incompetence. In this situation, nurses deliberately follow or *track practice* related to the concern. Secondly, when nurses make decisions about practice competence and engage in *moderating*. This involves nurses deliberately consulting with colleagues to confirm professional judgment and is another form of *collecting evidence*. In this situation, talking with other nurses and sharing information provides another source of evidence. Consulting others and plays an important role in confirming or dispelling perceptions of incompetence and contributes to the formulation of professional judgment. The processes associated with this aspect of CCNA are detailed in the category of *moderating* (Chapter 9).

Information sharing plays an important role in *collecting evidence* and assisting nurses to formulate perceptions about student's practice competence. According to Dreyfus and Dreyfus (1996), information is shared by nurses in informal unstructured exchanges that occur during the course of the duty, for example during meal breaks. While these exchanges may not be deliberately sought by nurses for the purposes of *gathering* information to make decisions, they provide valuable insights into student practice of which the assessing nurse may not have been aware. Here other nurses' perspectives become evidence and provide another dimension to the

assessment of practice. These contributions of professional opinion may be treated as reliable evidence that is used in the assessment of student practice, or a means for *moderating* the assessing nurse's perceptions. Like other strategies associated with *gathering*, *collecting evidence* in these circumstances is reliant on *establishing relationships*, communicating and *trusting* the professional judgment of others.

Information *gathering* for the purpose of assessment is context specific. This means that nurses working in specialty practice areas can have set ideas about what knowledge and skills they think are required for safe practice. These ideas are often based on the patient conditions treated and procedures that are most frequently performed within the practice area. Unrealistic expectations of student practice may influence the information sought and the type of nursing activity used to *benchmark* best practice. Individual nurse's ideas about what constitutes safe practice can influence the types of practice activities constructed to facilitate opportunities for *collecting evidence* and how this is used. If these are inappropriate for students, they may impact on the validity of data *gathered* to inform the assessment of competence. The influence of nurse's perceptions and use of benchmarks is explored in more detail in the category *weighing up* (Chapter 7).

Knowing what information to collect and the contribution this has to the assessment process is a factor that may influence the process of *collecting evidence*. In order to use the assessment framework and assess competence, nurses need to know what sort of activities students need to undertake to demonstrate competence. Not understanding the competency framework impacts on *creating opportunities* and *collecting evidence*. Being familiar with the competency assessment framework and

expectations of student scope of practice is important. This prevents situations where students may be expected to work outside their scope and facilitates a more accurate and fairer assessment outcome.

Nurses are very aware of the need for assessment to be based on objective information. This motivates nurses to *gather* evidence that is reliable and that is recognisable to other nurses as either competent or unsafe. Information is purposefully collected to substantiate perceptions. In situations where practice is questioned, it is common for nurses to *gather* multiple snap shots of particular aspects of practice from a variety of different sources to confirm suspicions of incompetence. The outcome triangulates perceptions and confirms notions of competence or incompetence.

6.5.1 Sourcing evidence

Nurses collect evidence of the student's performance via a wide variety of methods. The most common sources of evidence include direct observation, assessing knowledge by means of questioning, and discussing the student's performance with others. Of these, nurses involved in this study believed that direct observation was the most reliable and objective method of *gathering*. While this perception was held, nurses acknowledged that, more often than not, they rely on others to provide information about the student's performance. This is a consequence of either lack of access to students in the course of their work (for example nurse educators being unable to observe student practice in operating theatre or in the community), or because of rostering and the lack of continuity of preceptors. These factors impact on *gathering* and issues associated with *facilitating and managing feedback*, and

influence the nurse's ability to make judgments. This is discussed in more detail in the category of *judging* (Chapter 8).

In relation to observation, nurses in this study talked about 'listening with their eyes'. Gladwell (2005) refers to listening with the eyes as a situation where people are able to pick up on "fleeting cues from the expressions on peoples faces" (p. 195) and associates this with the military term 'coup d' oeil'. In French this means the 'power of the glance'. This term is used to summarise the capability that commanding officers have to immediately see and make sense of the battlefield. There is a resonance between this and nurse's ability to comprehend a patient's condition and sum up or diagnose problems in seconds. Gladwell (2005) describes this ability as being able to comprehend and cognitively manage a "flurry of visual facts" (p. 50). Here, visual and other sensory cues combine and formulate an impression. While this may possibly explain in some way intuitive thought (Benner, 1984) and practice in the care of patients, it may also explain how nurses look, see and know if a student's practice is competent. Nurses used this skill when collecting evidence. They referred to this as the nursing gaze. When used the nurse is often situated a considerable distance from the student and is not involved in the situation observed.

> ' *I have watched and listened' (I3-192).*

This form of *gathering* has also been cited in the literature as 'watchful listening' (Rittman & Osburn, 1995) and 'critically noticing' (Paul & Heaslip, 1995). In these circumstances, nurses believed that they were able to *gather* information about student performance without any interaction with the student. This method of

collecting evidence is connected to *knowing* discussed later in the category of *judging*. Nurses *gather* up a collection of perceptions through the act of observation, and although unable to explain or articulate these, the nurse has a sense that they know and understand what they are observing. In this aspect of CCNA, this means that nurses felt they could assess the student's competence based on their observation, *knowing* and the connection this had for them and their understanding of competent practice. It is important to note that this activity is not the same as *collecting evidence* through direct observation that involves interaction with the student in the form of questioning, guidance and teaching, or observational techniques involving thinking out loud (Aitken & Mardegan, 2000).

Although not all-inclusive, Table 6.1 (page 144) identifies the sources of evidence used by nurses in this study to *gather* information and inform decisions about competence. The outcomes of accessing and *gathering* information by these methods constitute evidence of practice, and present as multiple snapshots, which portray a picture of performance. This evidence is used by nurses to *construct a picture of competence* and assists them to determine if the student's practice meets the level of competence required. This process is discussed in the category of *weighing up* (Chapter 7).

The process of *sourcing evidence* is influenced by the nurse's practice philosophy and what aspects of practice are deemed essential for patient safety. The aspect of practice targeted and the type information collected represents the nurse's values and ideas about competence, and what is necessary in order to meet practice standards. Differences in collection methods, the type of evidence sourced and the weighting

given to this were observed in nurses in this study who worked in specialty areas. Here, knowledge and skills specific to the area of practice that are associated with patient safety, and are considered to be markers of competent practice, are targeted as sources of evidence. These may differ from practice area to practice area and be indicative of the focus of the service provided. For example, the student's ability to conduct suicide risk assessment is a source of evidence of competence targeted in mental health practice settings.

Table 6.1 Sources of evidence of student performance.

Direct observation of interaction with patients and relatives

Assessment of dexterity and ability to perform tasks

Assessing ability to use equipment

Questioning student and assessing knowledge underpinning practice

Reviewing nursing care plans

Testing critical thinking and assessing clinical reasoning

Discussing student performance with other nurses and other members of the health care team

Gathering patient perceptions about student performance

Listening to the way in which the student communicates

Considering attitude and professional behaviour

Listening to stories about performance

Evaluating record keeping and documentation

Evaluating adherence to protocols

Assessing ability to manage a patient load (time management)

Considering the student contribution to tutorials

Considering student reflections on practice and self assessment

The type of evidence *gathered* and how this occurs indicates the nurse's sensitivity to the student's stage of practice development, knowing what is expected and consequently what information will provide the appropriate evidence to assess this. Where there is limited understanding of the competency framework, and the assessment criteria and level of practice required, the nurse's limited ability to determine sources of evidence impacts on the assessment outcome. The consequence of this may be the emergence of a narrow perspective of practice, and an inability to assess practice comprehensively. These circumstances become apparent when nurses enter the next phase of the decision making process and enter into *weighing up* the evidence gathered. Where the evidence is insufficient, nurses need to return to the *gathering* phase and explore other sources of evidence. This issue is explored further in the category *weighing up* (Chapter 7).

The nature of practice may influence the ability to *gather* data, for example, confidentiality issues. This, and situations where it may be inappropriate for the educator to become 'the third person' and 'sit in' while the student engages with a patient, directly impacts on the nurse's ability to *source evidence*.

> '...*first of all you compromise the client and secondly the minute you put a third person in you change the dynamics of the interaction quite significantly' (I1-115-119).*

Here, the nurse completing the assessment is forced to rely on others and second hand information. *Relying on others* and issues concerning the validity of assessment are addressed in the concept of *knowing,* in the category *judging* (Chapter 8).

While *establishing relationships* has previously been discussed in this category in the concept of *creating opportunities*, it is also essential for *sourcing evidence*. Information from others is a form of evidence. Due to limited time in direct contact with students, educators need to converse with preceptors in order to *gather* information to confirm or disconfirm perceptions related to practice competence.

> *'The area that the student is practicing in makes a difference. For example, emergency department or operating theatre. You have difficulties trying to access some areas...its almost a gamble as to whether they [student] are competent or not' (I5-50-55).*

The lack of continuity of preceptors highlights the need for good communication and an effective *trusting* working relationships between nursing education and practice if information about student practice is to be *gathered* successfully. Failure to do this may result in incomplete data and inaccurate assessment. While *gathering* information, nurses engage in a process of *moderating* perceptions about practice competency. This in itself provides a further source of evidence from which *comparisons* can be made. Nurses' rely on each other to provide accurate and honest feedback to confirm or dispel perceptions of practice that contradict accepted standards.

> *'...I haven't actually seen you do it. I'm going to have to rely on your RN preceptors' (I5- 77-78).*

Failure to establish trusting relationships and communicate effectively impacts on the reliability and validity of judgments. These issues are drawn together and discussed in detail in Chapter 9 in the concept of *moderating*.

6.5.2 Facilitating and managing feedback

As previously discussed in the concept *creating opportunities,* the property *establishing relationships* is an important aspect of *gathering*. The importance of this in CCNA is again highlighted in *facilitating and managing feedback* between nurses, and influences the successfulness of *gathering*. The property of *facilitating and managing feedback* represents a collection of strategies that nurses use to manage the process of *collecting the evidence* needed to inform decisions.

Organising and facilitating meetings with students and preceptors are the primary means used by nurse educators in this study to *facilitate and manage feedback*. This strategy provides the opportunity to discuss performance, evaluate learning outcomes and *identify learning needs*. These meetings are designed to ensure that expectations of performance and assessment requirements are clear. Further to this, developing documents designed to collect information about student activities and performance, and arranging for these to be passed from one nurse to another augment the transfer of information and facilitate feedback. While students are often charged with the responsibility of ensuring preceptors complete these documents, nurse educators are very clear about the NCNZ requirements for competency assessments to be completed in conjunction with practice, and therefore make provision for preceptors to formally make comments on assessment forms.

The nature of the practice environment was found to influence the nurse's ability to *facilitate and manage feedback*. Workload and the busyness of a work area impacted on the ability of preceptors to attend meetings to review student performance.

> *'Getting access to the preceptor to gather information when areas are so busy, or in the community where preceptors are out and about makes it difficult to gauge how the placement is going and if there are concerns' (I1-186-188).*

How interested preceptors were in student practice and development, and the attitude in the work area to students also influenced the amount and quality of feedback provided. Where nurses were not interested in supporting the practice development of students, there was a tendency to *abdicate* responsibility for providing feedback and to *rely on others* to do this. While this behaviour has a significant impact on *gathering* information to inform decisions about student practice, its also impacts on *gathering* processes where nurses seek out opportunities to check their professional judgments by moderating this with other nurses. These behaviours, their impact on CCNA and the implications for the validity of competency assessment are explored in detail in the category of *moderating* (Chapter 9).

While the preferred method of *gathering* and source of evidence of nurses involved in this study was direct observation, nurses acknowledge that more often than not they rely on others to provide information about the student's performance.

> *'...you're actually depending upon...the preceptors that are actually*
>
> *working with students'(I1-62-64).*

Relying on others is a consequence of either lack of access to students or the continuity of preceptors. In these circumstances nurse educators have to rely on other nurses for information. Where information is not available this influences the nurse's to make judgments. The influence this aspect of *gathering* has on decision making is discussed in further detail in the category of *judging*.

The notion of listening with their eyes (Gladwell, 2005) previously discussed in the property *sourcing evidence*, is also used when nurses *facilitate and manage feedback*. Nurses use this strategy to gauge responses about student performance and monitor the accuracy of the feedback being provided.

> *'I pick up on the body language of preceptors. You ask "what have*
>
> *they [student] done today"? The moment you mention the student's*
>
> *name and there's a shudder or...there's a smile, that always says a lot*
>
> *to me' (I1-239-241).*

> *'If there is a shudder or a roll of the eyes, or "that one", then you*
>
> *have to find out what reasons they [the student] are not performing'*
>
> *(I1-263-264).*

Ekman (1995) refers to these cues as micro expressions and suggests that detecting these assists in the identification of incongruent responses that raise questions about

the accuracy and reliability of the feedback. Here body language and facial expressions may suggest that what is said, and how the storyteller really feels are not the same. Gladwell (2005) refers to the ability as thin slicing which is another form of the appraisal of micro expressions. In this research, nurses use similar strategies when collecting evidence for competency assessment. Identification of similarities and differences detect contradiction and raise questions about the reliability of the feedback provided. Incomplete or dishonest feedback has a significant impact on the process of *facilitating and managing feedback* and is of particular significance where nurses are hesitant to provide feedback about unsatisfactory performance. The impact this has on CCNA is discussed further in the concept *being professional* (Chapter 8).

Nurses who feel that feedback is not genuine or is incongruent with the perceptions they have about the student's performance, will be motivated to *gather* information from other nurses. This aspect of CCNA interconnects with the strategies of *truth seeking, judging truth* and *trusting* described in the category *moderating* (Chapter 9). These are helpful for dealing with incomplete or dishonest feedback and are used to *moderate* professional judgment. Nurses describe this as *being aware*. The significance of this is described in more detail in the category *judging* (Chapter 8) and further highlights the interconnectedness of the CCNA model.

6.6 Conclusion

The category *gathering* represents the first stage of the CCNA model. Without this, and the concepts within it, the decision making process would be inhibited due to the absence of information. The category *gathering* is comprised of the concepts of *creating opportunities*, *letting out the leash* and *collecting the evidence*. While

interdependent, these concepts provide the means for managing and assessing practice development by determining student learning needs and teaching requirements, and predicting when intervention is required to maintain patient safety. They support the theoretical propositions underpinning the competency assessment process, by providing information about the student's knowledge base, directing teaching and employing strategies to monitor and control the practice development of students to maintain public safety.

Information *gathering* is a continuous process that occurs from the outset of the placement and continues until the assessment is complete. The quality of decisions is dependant on the successfulness of *gathering* and on nurses *establishing relationships* with students and others, and *facilitating and managing feedback*. Where the professional opinion of others is valued and a *trusting* relationship exists, there is a greater likelihood that open and honest communication will occur that will positively influence feedback and contribute to the construction of an accurate and balanced perspective of the student's practice.

In CCNA, the information *gathered* by nurses is critically *compared* with benchmarks, which represent the foundations of accepted safe nursing practice. This process provides the means for analysing information and *calculating the value, merit and worth* of the student's practice. Considering the information *gathered* in this way assists the nurse to construct a picture of practice that clarifies the level of practice and reflects the degree of competence achieved. How this occurs and the contribution that *gathering* has in determining competence to practice will be further explored in Chapter 7 in the category *weighing up*.

Chapter 7: Weighing up

7.1 Introduction

The category *'weighing up'* represents the second stage of the Critical Comparative Nursing Assessment (CCNA) model. During this phase of the process of assessing and determining competence, nurses focus on analysing the evidence of student performance that has been *gathered*. This chapter commences by outlining the theoretical propositions of *weighing up* and the relationship of these to the BSPP of *comparing* to determine competence. The second part of the chapter will present the concepts of *benchmarking* and *constructing a picture of competence* that comprise the category *weighing up*. The properties embedded in these concepts detail the strategies used by nurses to manage the decision-making processes. The context in which these occur and the complexity of decision making in this phase of CCNA will be explored. This will explain how nurses apply the principles of *benchmarking* to calculate the *value, merit and worth* of the student's performance and determine competence in relation to known measures (standards of practice), and how the outcome of this assists the nurse to *construct a picture* of practice, that indicates whether practice standards have been met. The influence of the individual nurse's experience, beliefs, values and perceptions of competence, how these impact on decision-making, and the process of *weighing up* and determining competence will be discussed.

7.2 Weighing up, comparing and determining competence

The category *weighing up* explains how nurses utilise the processes inherent in *comparative analysis* to manage information, *make sense* of this and calculate the *value, merit and worth* of the student's practice. In order to successfully engage in

weighing up, make *comparative* judgments and formulate accurate perceptions about practice, the theoretical propositions and outcomes underpinning the category *weighing up* need to be fulfilled. These are that nurses know what competence means to them and that they use nursing knowledge (benchmarks) to measure (calculate) the student's performance and determine competence. The interrelationship of concepts and properties in this category and their connection to the theoretical propositions supporting *weighing up* as an integral component of CCNA are shown in Figure 7.1.
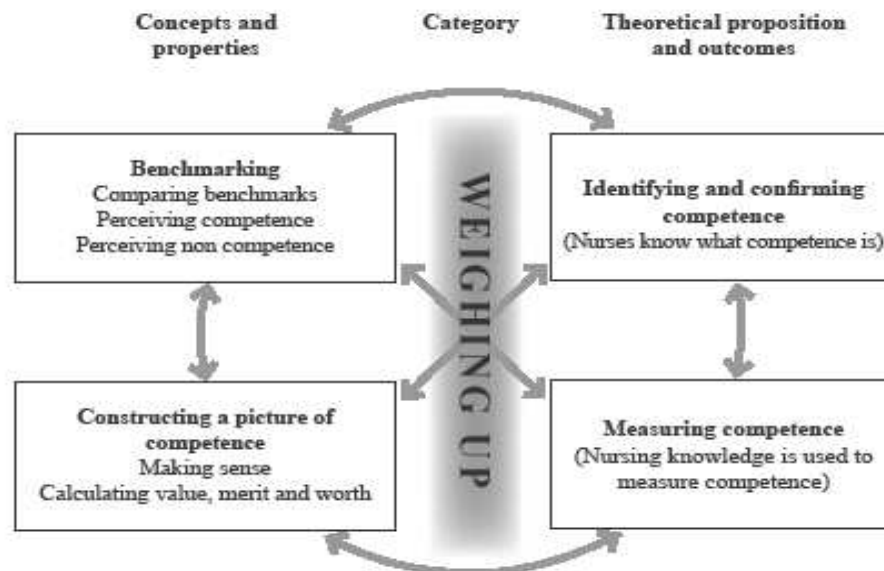
Figure 7.1 Interrelationship between concepts and properties of weighing and theoretical propositions and outcomes

These concepts and properties involve the nurse considering multiple snapshots of the student's practice that they have *gathered* by means previously explored in Chapter 6 (*gathering*). The effectiveness of *gathering* and the amount of information available influences the ability of the nurse to *weigh up*, *make sense* of the student's

practice and *construct a picture of competence*. Lack of evidence impedes the nurse's ability to consider practice wholistically and is obstructive to *comparing*, the process of *weighing up,* and formulating perceptions about competence. Due to the interaction between *weighing up* and *judging* (Chapter 8), lack of information and an inability to weigh up (measure) the student's performance will impact on professional judgment. In these circumstances, the nurse may identify the need to purposefully return to *gathering* more information in order to progress the process of *weighing up*, to confirm or disconfirm perceptions of competence. This may also initiate *moderating* processes where the nurse consults peers to confirm or dispel perceptions of unsafe practice. *Moderating* is a strategy used by nurses to facilitate *making sense*. This aspect of CCNA is discussed in depth in Chapter 9. The interconnectedness of *weighing up* with the other categories of the CCNA model is illustrated in Figure 7.2.
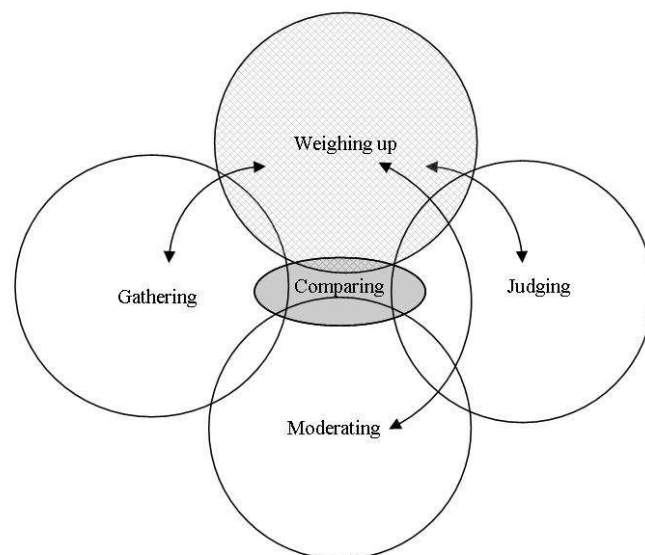
Figure 7.2 The relationship of weighing up to other categories in the CCNA model

Central to this is the BSPP *comparing,* which connects all aspects of CCNA to form a dynamic model, where information is *gathered*, processed (*weighed up*) and checked (*moderated*). *Comparison* provides the means for comprehending, explaining and interpreting phenomena (Ragin, 1987), the outcome of which assists the nurse to formulate and confirm perceptions of competence, measure this and come to conclusions that will inform professional judgment (*judging).*

> *'Weighing up and comparing practice using benchmarks, checks and*
>
> *balances perception' (I7- 7).*

Making *comparisons* and *weighing up* evidence to facilitate decision-making and determining competence in this way involves confirming or rejecting hypothesis. This assists in clarifying the picture of competence and helps the nurse to *make sense* of the student's practice. This suggests that *weighing up* employs hypodeductive reasoning (Buckingham & Adams, 2000; Manias, Aitken & Dunning, 2004; Offredy, 1998) to facilitate decision-making. Here deductive reasoning, pattern recognition and intuition (Benner, Hooper-Kyriakidis, & Stannard, 1999; Brykczynski, 1999; Buckingham & Adams, 2000; Dreyfus & Dreyfus, 1986) are employed to facilitate data analysis (*weighing up*) and formulate preliminary hypotheses about the practice (Manias, Aitken & Dunning, 2004). Testing hypotheses necessitates the *gathering* of more data and results in nurses *gathering* multiple snapshots of practice. The new data obtained is *compared* against known benchmarks. This identifies similarities and differences, which are juxtaposed against existing ideas. Buckingham and Adams (2000) describe this as matching activities observed with previous experience. The outcome of comparison between these confirms or rejects the

hypothesis. In CCNA, the process of *weighing up, comparing*, and confirming or rejecting ideas about competence is a continuous process and occurs at an unconscious level. This results in the formulation of perceptions that inform professional judgment.

In order for *weighing up* to be successful, a diverse range of benchmarks underpinned by substantial nursing knowledge and experience is required. The influence this has on the process of *weighing up* and the outcome of the assessment of competence is discussed in the concepts embedded in this category. These include *benchmarking* and *constructing a picture of competence*.

7.3 Benchmarking

A mark is a sign or typical feature of something (Soanes & Stevenson, 2003). A benchmark provides a point of reference or measure from which the typical features of something can be compared (Vartiainen, 2002). In nursing, benchmarks portray typical features of practice that illustrate ways of knowing and doing. Practice benchmarks are created as the nurse's knowledge and practice develop, and their understanding of practice increases. With increased knowledge and understanding, nurses learn what is acceptable practice and what is not. This is facilitated by the nurse *comparing* experiences, remembering previous situations and reflecting on these (Benner, 1984). In doing so, nurses *compare* current situations (e.g. patient signs and symptoms) with past experiences. Based on their previous experience, and by using *critical comparative* analysis to identify similarities and differences, nurses can identify health concerns and predict what will happen next, what intervention would be appropriate and when this is best implemented. Where difference is

detected that contradicts expectations, nurses consult. This process utilises peer knowledge to confirm contradictions and determine intervention. The process of consulting and *moderating* contradictions, also provides opportunities for new learning and practice development. The outcome of this results in the development of nursing knowledge.

The process of *comparing*, constructing knowledge and developing benchmarks makes an important contribution to the way nurses learn what nursing competence is. With increasing knowledge and experience, benchmarks are adapted or modified. In this sense benchmarks are not static. The process of *comparison*, identifying contradictions, learning and adjustment, allow for modification of benchmarks. This process takes into account practice innovation, developing knowledge and new technology. The implication being that benchmarks used twenty years ago may not be appropriate to the use as benchmarks today.

Nursing knowledge and practice experience inform understanding of benchmarks that signify both safe and professional practice (Eraut, 1998). Benchmarks underpin standards of practice and denote professional corner stones that represent quality provision of care. *Benchmarking* involves *comparing* evidence of practice to known measures or standards that denote best practice. According to Vartiainen (2000) this is a systematic process utilised for legitimising perception and provides a means of controlling variables. In these circumstance, comparison is made specifically for the purpose of confirming evidence supporting or contradicting the accuracy of perceptions (Sartori, 1991).

7.3.1 Comparing benchmarks

When used as a point of reference, benchmarks provide nurses with a mark (position) from which they can *compare* and measure practice. Here the indicators of practice embedded within benchmarks form criteria that practice can be assessed *(compared)* against. *Critically comparing* the practice under assessment to benchmarks results in the identification of similarities and differences, which either confirm or contradict practice standards, thus distinguishing between practice that is safe, and that which is not.

The more closely aligned the practice is with the benchmark, the more likely this is to be determined as meeting the standard and considered safe. Conversely, where practice does not align with expectations and contradictions (discrepancies) are identified, there is an increased likelihood that the nurse will question the practice. Questioning practice by employing critical thinking and by *comparing* practice contradictions with variables in the context in which practice takes place, determines conditions of practice and establishes boundaries that identify a continuum of practice acceptability. When all of these factors are combined, these processes crystallise to form conceptual comprehension from which perceptions of competence emerge. This assists the nurses to *weigh* the *value, merit and worth* of the practice.

Here the nurse is discriminating in the synthesis of the evidence. The results of *benchmarking* resonate with the individual's perceptions of what constitutes safe or unsafe practice. Similarity between the student's practice and the benchmark, and lack of evidence that contradicts best practice, confirms competence. Where both affirmations and contradictions are present nurses 'weigh' the evidence. Indicators

that determine unsafe practice are scrutinised and carefully considered. The seriousness and frequency of unsafe practice helps the nurse to decide if the practice is safe 'overall' or not. Where a number of contradictions are identified, there is a higher likelihood that the student will be deemed unsafe.

Weighing up practice in this way takes into account the individual circumstances, and assists the nurse to refine thinking by determining whether the practice falls within the acceptable practice boundaries or not. This process is further assisted by considering and *comparing* practice against indicators that nurses perceive to be unsafe practice. If *comparison* confirms a match between the student practice and identified unsafe behaviours, this will negatively influence the outcome of the *weighing up* process.

The process of using *benchmarking* engages the nurse in a continual process of testing hypotheses they have about the student's practice against what they perceive as safe and acceptable nursing practice.

> *'Its like the mental ticking off' (I2-150).*

In CCNA, nurses use benchmarks as a framework from which perceptions of competence can be constructed and tested.

> *'Its comparing…I think nurses actually do that all of the time. We*
> *constantly compare and then try to analyse…so we have a student that*
> *we don't think is competent or we do think is competent and you are*

*constantly weighing that up against …yes that's what I would have
done, yes I expect that – yes and you take the student to the patient
and they do all the things that you expect them to do and you kind of
mentally ticking that off in your head and when you can't tick it off –
you like start thinking, ok well where does this fit' (I2-155-175).*

W*eighing up* involves the process of questioning performance and can be likened to
a form of decision analysis, which provides a framework to consider practice and aid
the formulation of a judgment. This process includes conditional logic (Buckingham
& Adams, 2000). Here, the 'if then' type of questioning underpins decision-making,
guides the formation of professional judgment, and increases the nurse's
perceptiveness of influencing factors. This is discussed further in Chapter 8 (*judging*)
in the concept *being aware*.

The creation of benchmarks, and how these are applied, is influenced by the nurse's
education, experience, exposure to role modeling, expectations of key personnel
within the practice area, and individual beliefs and values. Just as practice
benchmarks are created to provide a point of reference for patient assessment,
benchmarks are also created especially for assessing student practice. Nurses in this
study identified a number of different benchmarks against which they *compare*
student practice to assist the process of *weighing up*, make sense of practice and
inform professional judgment.

'Policy...law...procedures and protocols set boundaries. Personal experience, beliefs and values, knowledge and research findings – all those sorts of things are our benchmarks. They sort of set boundaries for what you would expect' (I5-332-340).

'Competencies are handy to use – they certainly give me a benchmark' (I5-710-712).

The theoretical propositions underpinning the category of *weighing up* assume that all nurses know what competence means to them and that they evaluate student's practice by using nursing knowledge (benchmarks), to measure (calculate) student's performance and determine competence in the same way.

'Benchmarking uses standards to measure performance. You expect other nurses to have similar standards' (I8-43-44).

These propositions are challenged if nurses do not know the competency standards underpinning the assessment of competence, or do not use the same benchmarks to assess these. The influence of individual beliefs and values, difference in knowledge level and experience were acknowledged by nurses in this study, who recognised that these variables may impact on the validity and reliability of assessment.

'We're judging them against our own standards in our own unit. We've produced our own student workbook' (I4-649-655).

'More often than not, evaluation is undertaken where our own experience and knowledge is compared against the actions of the student and involves subjective comparison...the benchmark is what I expect' (I8-37-38).

Where 'what I expect' is not consistent with accepted ways of *knowing* and doing reflected in practice standards, there is a risk that the application of benchmarks underpinned by differing expectations may not result in a reliable assessment outcome. This was recognised by nurses participating in this study who identified that some benchmarks are considered more reliable than others. For example, the reliability of using intuition to inform professional judgment was overshadowed by the reliability of basing professional judgment on scientific research. The perceived reliability of a benchmark influences the *weighing up* process and the extent to which this is valued when it is used to inform decisions. This aspect of the CCNA process is explored in further detail in Chapter 8 in the property of *knowing*.

Having confidence that benchmarks will provide a reliable point of reference from which comparison can be made is further highlighted by the use of specific procedures being used as benchmarks. Unlike practice standards that provide overarching statements about practice (Eraut, 1994), these are descriptive and detail the actions to be taken. In this sense, procedures, by nature of the way they are written, provide very clear expectations for performance. Medication administration was given as an example of a reliable benchmark. This was considered a critical component of safe practice which would be consistently applied.

'A common standard [benchmark] would be medication. It's quite clear that in order to meet the standard, you've got to be seen to be able to follow the policies and protocols and give your patient's medication safely' (I5-456-458).

'There are certain polices and procedures that are set in concrete that are not negotiable. Those are benchmarks' (I2-345-356).

Hunt (1997) believes the attraction to use procedures as benchmarks, is because they are perceived as providing objective measure of performance and are there for reductionist. Procedures however, do not take into account extenuating circumstances. In these situations nurses need to have the confidence to use discretion and accept that having weighed up the evidence and considered the complexity of the situation, that under normal circumstances the student would have met requirements. Making discretionary judgments like this gives nurses the freedom to exercise wisdom. In doing so discretion appeases the professional conscious and in doing so addresses the moral concern of *gate-keeping* and supporting students. This aspect of *benchmarking* and *weighing up* is connected with *judging* and is discussed further in Chapter 8.

While common benchmarks such as procedures may exist, the consistency in which these are applied may vary and have consequences for the validity of assessment. Bradshaw (2000) argues that inconsistency and conflicting expectations in applying benchmarks and assessing competence may relate to too much freedom in defining and interpreting competence. Understanding the competency framework used to

assess competence and an ability to relate this to practice is an important influence impacting on the use of benchmarks and assessment outcomes.

In New Zealand, the NCNZ competency framework outlines generic domains of practice and details competencies. These are used as benchmarks to guide the assessment of student competency to practice, and students are expected to demonstrate achievement of all competencies before being able to register as a nurse. The assumption underpinning the assessment of competence is that all nurses know the competencies, are able to relate these to practice and use them to guide decision making about student competence. While some nurses (primarily educators) used the NCNZ competency framework and the individual competencies within this as benchmarks against which to make *comparison*, the majority of nurses involved in this study openly confessed that they did not know or understand the competency framework.

> *'Benchmarking against competency standards is an issue when nurses*
>
> *don't know the standards' (I8-89-90).*

As benchmarks provide a point of reference against which *comparison* can be made, they play an important role in assisting the nurse to interpret the competency framework. Benchmarks that underpin the nurse's understanding of practice competency are context dependant (Neary, 2001). This means that the benchmarks used to assess practice will reflect the expectations of practice for the context in which the nurse works. This includes specific nursing knowledge and skills required for the area of practice and the individual variations in protocol of employers. The

implication is that despite the notion that there are common elements in practice that denote competent nursing, benchmarks have been constructed according to the context in which learning has occurred and will be used to assess practice accordingly. This may result in discrepancy in interpretation of competency requirements and result in a significant difference or variation in what is accepted to be competent practice.

'When you are trying to manage someone's performance, whose competencies are you judging against? Is it the unit's expectations or the CNL's [Clinical Nurse Leaders] expectations or your own personal expectations of what competency is and what the minimum of the competence is' (I4-143-147).

'You could use the same form and still come up with a different answer because each of us interpret things differently' (I4-678-679).

The consequences of differing benchmarks and interpretation of these is that they may not provide a reliable point of reference against which comparison can be made. If the benchmark for one practice area differs from that of another, students may be deemed safe in one practice area but not in the other. This raises questions about making assumptions that a student assessed as competent in one area of practice will automatically be safe to practice in another. Questions were raised by the participants in this research related to this aspect of *benchmarking,* the influence of nurse's individual perceptions of competence and the demands of specialty areas of practice. They highlight the potential pitfall in using benchmarking as an assessment process,

where benchmarks are not the same or are inconsistently applied. It also brings into question the adequacy of using generic competencies to determine competence in all areas of practice.

Variation in *benchmarking* may explain conflicting opinions about what constitutes safe practice. It may also explain why nurses in specific areas of practice have difficulty interpreting the competency framework (Neary, 2001). Differences in the nurse's knowledge, perceptions of what constitutes competent practice and of the competency framework result in nurses perceiving the competency framework as being abstract and unrelated to the real world of practice (Cassie, 2006; Neary, 2001). These issues were raised by nurses in this study who explained

> *'It's the way the competencies are formatted...I guess it needs to be tailored to different areas' (I4-563-569).*

> *'we are actually assuming a lot with these forms, its not just, its not just the real world' (I4-634-635).*

The greater the perceived difference between the nurse's benchmark(s) and the competency framework, the greater the level of abstraction required to make *comparisons*. The increasing level of abstraction impacts on the assessment process making it difficult to identify similarities (Vartiainen, 2002).

> *'The book from the educational institution doesn't focus on clinical application as much. It's written in a different way. It focuses on the*

knowledge and interaction the student has with the patient in the unit

and the staff, and not specifically on the activity of hygiene'

(I4-649-699).

'What's happening as far as the ward environment is concerned is the

best way of doing things' (I5-14-26).

In relation to competency assessment, this means that it is difficult for nurses to relate what they know and do to the framework, and to be able to use this as a method of assessing competence. The benchmarks embedded in the competency framework become difficult to identify and interpret. The more abstract the framework is perceived to be, the more difficult it becomes for nurses to relate to criteria to which *comparison* can be made. Adapted from the work of Vartiainen (2002), Figure 7.3 (page 168) illustrates how the level of abstraction arising from differences in practice benchmarks influences the nurse's ability to use a generic competency assessment framework and undertake comparative analysis. The level of abstraction (A) is represented by the vertical axis, where the indicator A1 stands for lower levels of abstraction and A3 for higher levels of abstraction. The horizontal axis represents different areas of nursing practice (P), which, with increasing distance, represent degrees of difference according to specialty areas of nursing practice and the nurse's comprehension of this. Here, the degree of difference is illustrated by the indicators P1 to P3. P may also represent differences between the nurse's benchmark and that specified within competency standards. The use of a generic competency framework is illustrated by the axis G. The further G is from P,

the greater the level of abstraction and difficulty in applying the generic framework
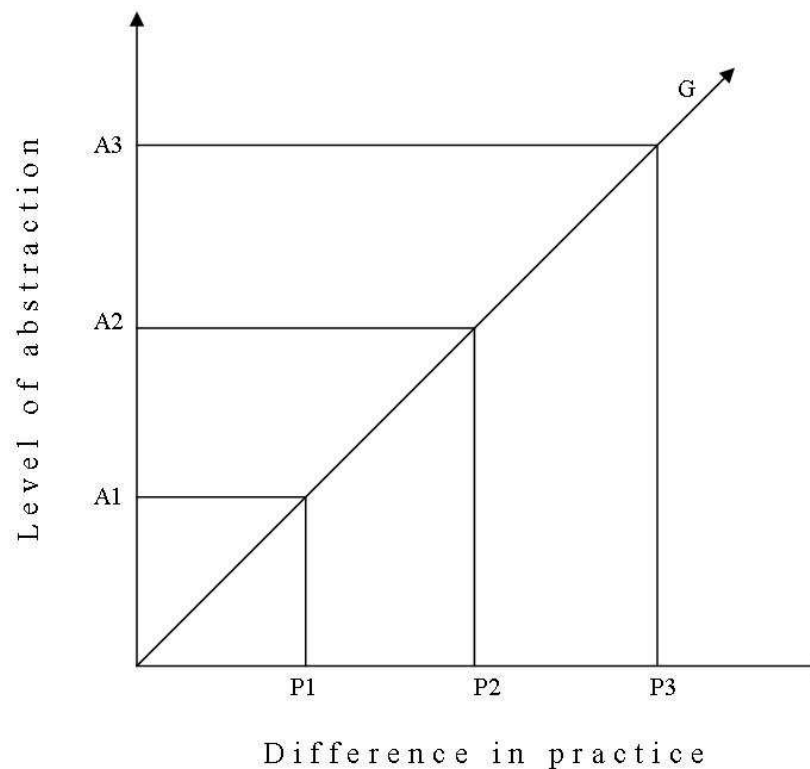
Figure 7.3 Differences in practice and levels of abstraction in comparative analysis

Based on Vartiainen's (2002) ideas, the assumption is that, the more specialised the practice area, the perception of difference increases. Where difference in practice increases, it becomes more difficult to find criteria applicable to make *comparison* to. This difficulty occurs as a result of the increasing level of abstraction. As abstraction increases, the concreteness of the nurse's practice dissipates. When this occurs, the nurse has more difficulty relating the practice being assessed to the competency framework or what they know. The lack of alignment of the competency framework with the nurse's benchmarks impedes the nurse's ability to make *comparison* and assess practice. The contradiction(s) in practice that would normally

assist the nurses to recognise similarities and differences in practice is so significant, that it appears that there are no similarities. As a result, it may be difficult for nurses to understand how the practice they relate to as being competent is reflected in the competency framework. Significant difference may result in the nurse perceiving that either the competency standard doesn't relate to or reflect the practice in the area in which they work, or that the student practice doesn't meet the requirements of the standard. The consequence of this and the incidence of increasing abstraction is that, if the nurse either does not know the competency framework well, or is very inexperienced, the process of CCNA may become unmanageable. As a result, the nurses may not be able to *weigh up* the evidence or draw conclusions to inform decisions about competence.

Using generic competencies to assess competence requires nurses to employ high-level conceptual comprehension. This is needed in order to manage the degree of abstraction, conceptualise practice and *make sense* of this. While the use of generic competencies are advocated by Nursing Councils internationally (Australian Nursing Council, 2003; International Council of Nurses, 2003; NCNZ, 2004; United Kingdom Central Council for Midwifery & Health Visiting, 1992), many have questioned the notion that a generic set of competencies can exist (Gonczi, 1994; Watson, Stimpson, Topping & Porock, 2002). Figure 7.3 highlights how differences in the construction of nurse's benchmarks and the influence of the context of practice may have on the assessment of competence. If benchmarks are constructed according to the context in which learning takes place and are therefore context dependant, the notion that competencies are generic and that nurses apply these in a consistent manner to demonstrate competent practice is challenged. Assumptions about the

transferability of benchmarks from practice area to practice area need to be considered, as if these are not the same or are used inconsistently, there are implications for the validity and reliability of the assessment. Benner, Tanner & Chesla (1996) determined that the degree of competence in nursing practice is experienced based and context specific and that nurses that are competent in one setting may be incompetent in another. Many nurses involved in this study identified the need for assessment frameworks and standards that were specific to their area of practice

> *'I think it's important that there should be different competencies for*
>
> *various areas of practice' (I4-572-573).*

> *'to be able to understand what you are measuring you need guidelines*
>
> *that are unit specific rather than very generic' (I4-594-596).*

In order to address the complication of abstraction, the criteria detailed in generic competencies would need to be extensive and encompass all aspects of practice for all areas of nursing. Even if this were possible, there would be nurses who, because of the way in which their benchmarks had been constructed, would continue to experience difficulty using generic competency frameworks.

Where nurses do not have an established benchmark to guide the *weighing up* of student performance, they implement one of three strategies. They use their own student or practice experience as a benchmark, another student's performance as a benchmark, or abdicate responsibility for undertaking the assessment. In situations

where nurses default to using their own student or past experience as a benchmark, they apply the expectations placed on them in training or what they now know as a registered nurses to guide decisions about what students should be able do in practice.

> *'I returned to practice and was involved with students, I had nothing to compare with apart from my own practice a long time ago, which is no comparison. I think that having worked with students for the last two years that it is obvious that there is a clear difference in expectations' (I2-341-352).*

The risk here is that, where there are differences in the type of education programme, or where time has changed expectations of practice, these benchmarks may no longer be appropriate to the assessment of student practice. Likewise, the appropriateness of *benchmarking* student practice against that of an experienced registered nurse brings into question the fairness of the assessment and its reliability to determine accurately the ability of a student. Here, the learning process is not acknowledged.

> *'Often nurses assess at beginning practitioner level and not as a student' (I8-94-96).*

> *'Some people would say that's one of the problems with the competencies. That's the fact that they are designed for registered nurses. How do you measure a student against standards used for RN's'?(I3-1091-1094).*

Using the practice of one student as a benchmark for assessing another is problematic. The risk is that, if the previous student's practice is exemplary and above expected requirements, the benchmark may be too high. This may adversely affect judgments made and result in other students failing when they should not. Conversely, where practice requirements are misinterpreted and the practice expectations embedded in benchmarks are low, a student may be deemed safe when they are not. Both situations have the potential to adversely affect the assessment outcome and highlight the danger in benchmarking one student's performance against another.

> *'Comparing on student against another. It's human nature and its*
>
> *part of you weighing up…whether you think that person is ok'*
>
> *(I2-1041-1047).*

If nurses are unclear about the competency standards or have little experience in undertaking competency assessment, coming to conclusions that will inform professional judgment may prove difficult. This situation may also be influenced by the adequacy of *gathering* and the amount of evidence available against which to benchmark. The consequences of these circumstances may affect the nurse's ability to *weigh up*. It may lead to decisions being placed in the 'too hard basket'. If this is so, and there is insufficient support for the nurse, they may abdicate responsibility to assess students. This notion is explored further in the category of *moderating* (Chapter 9).

While some benchmarks can be used in isolation, this research has found that they are often used in combination with others to *make sense* of the evidence gathered. A secondary benchmark is used to triangulate the data (evidence) and provide a more comprehensive picture of the *value, merit* and *worth* of the student's practice. The most common secondary benchmark used in assessment is that of the level of practice. In this case, the assessment of competence takes into account the aspect of practice being performed, the benchmark for this and the level of practice expected of a student. The level (year) of the student's education and limited practice experience is factored in when making *comparative* assessment. This has a moderating effect, influencing perceptions about competence and where appropriate, allowances can be made. This aspect of *weighing up* is presented in more detail in the concept of *constructing a picture of competence* and the decision-making processes explored in Chapter 8 (*Judging*) in the property of *making allowances*.

7.3.2 Perceiving competence

Benchmarks are made up of a set of indicators that detail the conditions of a specific aspect of practice. The core of these, contain notions about competence, that shape and inform the nurse's perception of what is safe practice and what is not. Indicators play a key role in enabling the nurses to *compare* practice and detect contradictions. This facilitates the *weighing up* process, and contributes conceptual comprehension and the formulation of judgments about competence.

For the nurses in clinical practice who participated in this research, indicators of competency tended to relate to the ability to perform skills frequently carried out within the practice area. The ideology of competence was underpinned by the notion

that competence is the ability to complete tasks and manage a workload. This perception aligns with the philosophy that performance is required to demonstrate competence (Eraut, 1994). According to Watson, Stimpson, Topping and Porock, (2002) this means "competence merely represents the potential to perform" (p. 422). The skills and abilities that reflect competence identified by nurses in practice involved in this research are detailed in Table 7.1.

Table 7.1 Nursing skills and attributes that reflect competent practice

Following orders

Effective communication

Safe medication administration

Basic maths and drug knowledge

Aseptic dressing technique

Accurate vital signs observations

Affective time management and management of patient care

Respect for patients and other staff

Team work

Accurate assessment of patient health status

Appropriate professional behaviour and presentation

Knowing professional boundaries

Being honest and trustworthy

Taking responsibility and owning up to mistakes

Using initiative

Comprehensive and accurate documentation

While using tasks to benchmark practice was a common theme in interviews, differences in perceptions and the indicators used to determine competence differed between nurses in clinical practice and those in education. The educators agreed that

the items in table 7.1 were of importance, and that they used these. However, they expanded the list of competent practice indicators to include: knowledge base, reflection, critical thinking, clinical reasoning, ability to detect unsafe practice and intervene, insight and knowing practice limitations, engaging in practice, utilising opportunities to learn, and being able to give rationale for practice.

> *'We need to look more wholistically at their problem solving, their critical thinking' (I2-996-998).*

While indicators of competence were similar for nurse educators and clinicians involved in this research, these were not easily described. When asked "what do you perceive as being competent practice"? both groups of nurses tended to describe activity that demonstrated issues related to unsafe or incompetent practice. They appeared to work from the negative, applying the principle of falsification (Woolman, 2006). When applied to assessing practice, this means that the nurse establishes competence by ascertaining that there is no evidence that unsafe practice exists. The assumption is that lack of evidence of unsafe practice infers that the practice is safe. This results in the emergence of perceptions of competence.

7.3.3 Perceiving non-competence

A clear definition of what constitutes unsafe behaviour is difficult to find in the literature (Scanlan, Care & Gessler 2001; Stokes, 2005). While the NCNZ Code of Conduct (1999) gives examples of behaviour that could initiate a complaint about a nurses' behaviour, this provides guidelines only and does not provide a specific definition of unsafe practice. Stokes (2005) contends that the lack of a specific definition of unsafe practice has contributed to the debate about what features of

practice are acceptable (safe) or not (unsafe). Stokes argues that uncertainty surrounding the concept of unsafeness contributes to the nurses "need for certainty and consensus the need to get it right, and to find the truth" (p. 113). In CCNA tensions surrounding making the right decision and being objective and fair are characterised in the concepts *being sure* and *being professional* in the category *judging* and this is also evidenced in the in nurses engaging in, *truth seeking* and *moderating* activities.

In the absence of a specific definition of what constitutes unsafe practice, it appears that the nurse's personal beliefs and values, practice experience and role modeling influence the formation of perceptions of competence. Here, the circumstances under which the nurse learnt practice informs perception and influences what is considered safe or unsafe. This is reflected in the standard of care they provide (Howie, 1998). If this is so, variation in practice standards and what nurses perceive as safe and competent care can be expected.

Where the process of *comparing* practice with benchmarks include indicators of unsafe practice, the identification of similarity adversely affects the outcome of the assessment of competency. Here the lack of the identification of contradiction confirms the presence of unsafe indicators and incompetence. When making *comparison,* the identification of contradictions that align with benchmarks containing indicators of unsafe practice, influence the process of *weighing up*. For nurses in this research, indicators of non-competence fell into one of two categories. These were knowledge and /or actions, that when applied had the potential to

adversely affect the patient's well being, and attitude and behaviour that was considered to be unbecoming of a nurse.

In this research, the perceptions of indicators that were perceived to demonstrate unsafe practice were similar for nurses in clinical practice and those in education. These are detailed in Table 7.2.

Table 7.2 Indicators of unsafe practice

Abuse of patients (physical and emotional)

Abandoning patients including sleeping on duty

Professional judgment that compromised patient safety

Working outside scope of practice

Failing to take responsibility for actions and being accountable

Failing to pass on information including inadequate documentation

Engaging in unethical or immoral practice

Untrustworthy behaviour, including lying or falsifying information and stealing

Transgression of privacy and confidentiality

Not following orders

Non-adherence to protocol

Being unreliable, including being late for duty

Presenting in an unprofessional manner, including: dirty uniform, drunk on duty and the consumption of drugs

Failure to recognise professional boundaries

Inappropriate communication including swearing

Inappropriate relationships with patients

While there was congruency between what nurses in practice and educators considered unsafe, nurse educators expanded the items in table 7.2 to include: avoiding contact with patients, inadequate knowledge base, over confident, lack of

insight, arguing with staff when they [student] were wrong, an inability to provide a rationale for actions, repetition of transgressions of professional behaviour, repeatedly making mistakes and not demonstrating improvement.

For nurses involved in this study, some practice indicators are considered to have more influence or 'weight' than others when decisions about practice competence are made. For example, physical abuse of patients is considered more serious than being seen to be unreliable because of lateness in reporting for duty. The greater the perception that practice (actual or future) will adversely affect the patient's well being, the more likely that judgment of incompetence will result. The seriousness of the contradiction and how this *compares* with unsafe practice influences the assessment and the process of *weighing up*.

A number of the indicators in table 7.2 are perceived by nurses to be unwritten rules or expectations of practice. For example, some nurses involved in this research believed that these are not clearly identified within the competency framework.

> *'...I want something clearer. I like things more defined...that's where the whole thing [competency assessment] falls down because we haven't got that at the moment' (I4-182-193).*

Nurses, who are unfamiliar with the NCNZ competencies and the type of nursing behaviours associated within these, have difficulty finding a place within the assessment framework to identify unsafe practice. This may explain the perception that the competency framework is inadequate, does not relate to real practice and

does not provide an adequate framework for assessing practice. As previously discussed, perceptions like these highlight that there is an assumption that all nurses know what safe and professional nursing practice is, that the benchmarks they use in practice to determine this are the same and that they are able to interpret the competency framework in differing practice contexts and to differing patient scenarios as these arise. The influence that this has on the assessment of competence is addressed further in Chapter 8 (*Judging*). Inability to match the nurse's perceptions of student behaviour with the assessment framework and criteria influences the nurse's ability to *weigh up* and formulate judgments about competence. This in turn impacts on their ability to complete the assessment.

Having difficulty *weighing up* and making decisions may also arise as a result of conflict between the nurse's beliefs and values and the inability to make a direct correlation between these, the benchmarks they use and the competency framework. In these circumstances, completing the assessment and filling out the assessment form may be difficult. This was highlighted by some nurses who indicated that there was a perception that in order to non-achieve a student there needed to be a clear correlation between what was written in the competency standard and the student's behaviour. If the behaviour could not be matched with a competency, then it didn't count. Where there was conflict between perceptions of unsafe or unacceptable professional behaviour and perceived notions that they could not fail the students, nurses were very uncomfortable.

Nurses had a clear understanding based on their beliefs and values of what was acceptable professionally and what was not. The frustration and perceptions, relating to the way in which competencies are written, is voiced by these nurses, who said

> *'It's a professional standard and it's not written in black and white. It's like you wouldn't work with your belly button hanging out with a stud in it' (I5-491-495).*

> *'It's difficult weighing up social standards v's expectations. I'd rather have a nurse with 75 body piercing and green hair who was first class than someone who looks professional but without a clue' (I1-738-742).*

Variation in degrees of acceptability of behaviour, and understanding of what constitutes safe or unsafe practice, introduces variables that may influence the assessment outcome and the validity of this. In situations where the standard of practice of the assessor is inconsistent with the professional expectations of the group, students practice may be assessed as either safe or unsafe when general opinion would suggest the opposite. This may lead to disagreement between nurses and manifest in lack of trust and respect in colleagues. The impact of this on the assessment process is explored further in Chapter 9 (*Moderating*).

Nursing knowledge and practice experience shape benchmarks. The greater the number of benchmarks the nurse has to measure performance against, the greater their ability to test hypotheses and make *comparison*. The process of confirming or

rejecting these clarifies the picture of competence and helps the nurse to *construct a picture of competence* and *make sense* of the student's practice.

7.4 Constructing a picture of competence

During the course of working with students, nurses are exposed to scattered images of practice. These arise as a result of the process of *gathering* (Chapter 6). These images provide evidence against which *comparisons* can be made, and the assessment of competence completed. In order to do this, nurses' need to be able to *construct of picture of competence.*

Constructing a picture of competence requires nurses to comprehend, interpret and translate the evidence of practice that has been *gathered*. This is a continuous process that takes place over the period of the student's placement. The outcomes of *comparison* of the student's practice with benchmarks formulate perceptions of practice. When these are pulled together, they produce an image of practice. This picture is modified with continued exposure to student practice. According to Chenoweth (1998) the process of construction and reconstruction congruent with *constructing a picture of competence* explained here, is essential to the development of knowledge in nursing. Unless there has been an incident where practice is perceived to have contravened a standard and the nurses are specifically looking for patterns in behaviour that confirm or dispel perceptions of unsafe practice, the process of *constructing a picture of competence* occurs without thought.

As previously discussed in Chapter 6, the amount of time the nurse works in direct contact with the student has bearing on the ability of the nurse to *gather* information.

Limited exposure to student practice inhibits the generation of images and influences the nurse's ability to *gather* evidence. The fewer the number of images, the more difficult it is for nurses to engage in *weighing up*, formulate perceptions and construct of picture that is representative of the student's practice. As a result, the nurse's contribution to the assessment of competence may be limited by the number of practice images *gathered*. These may not be sufficient to establish patterns of behaviour and formulate perceptions that indicate safe or unsafe practice. The casualisation of the workforce (White, 2001) and inconsistency in preceptorship (Neary, 2001) may contribute to the occurrence of these circumstances and explain why nurses are uncomfortable passing judgment on students with whom they have had little working experience. Issues related to this and the notion of nurses abdicating responsibility to assess competence is discussed in detail in Chapter 9.

Constructing a picture of competence is illustrated by the properties *making sense* of the information gathered and *calculating the value, merit and worth* of practice. Both of these strategies employ the use of *critical comparative analysis* to identify contradictions in practice. This helps the nurse to recognise practice and assess its congruency with accepted ways of knowing and doing. In doing so, a picture of practice is constructed that assists the nurse to recognise patterns of behaviour (Buckingham & Adams, 2000). In order to be able to achieve this and calculate competency, nurses need to be able to *make sense* of this information.

7.4.1 Making sense

Making sense of the images *gathered* (evidence) and formulating perceptions about the student's ability to practice is the first phase of *constructing a picture of*

competence. This employs a wholistic approach that is underpinned by *benchmarking*.

> *'Weighing up is not just looking at one thing. Assessment is complex and involves many things. You can look at them individually. But you need to look at the overall – is this person, their actions, competent. It involves pulling together all the strands and weaving them together to look at the whole picture to see if it fits with expectations. Imperfections might be ok' (I8-68-76).*

This means that all aspects of practice are considered. For example, the student's understanding of knowledge informing practice, legislation are as important as being able to complete a task. Here, each piece of evidence or image of practice is *weighed up*.

By noting similarities and differences, a picture of behaviour is constructed that resonates with the nurse's perceptions of safe or unsafe practice. *Making sense* enables the nurse to informally tally up confirmations and/or contradictions, and construct a picture that reflects the student's practice. As the student's responses are examined and *compared*, practice that contradicts accepted ways of *knowing* and doing in nursing is identified. The more contradictions, the more likely the outcome of *making sense* and *weighing up* will result in a perception of unsafe practice. This process provides a means of comprehending the student's practice, which can then be weighed and measured.

Making sense of practice in this way "demands a level of thinking that is creative, clear, ethical, responsible and insightful" (Chenoweth, 1998, p. 283). Glaser (1985) asserts that this requires practitioners to engage in critical thinking, and that abstract reasoning assists the practitioner to *make sense* of complex situations. While largely a cognitive process, it enables nurses to judge the soundness of information and inferences drawn from it. This aspect of the decision making process assists the nurse to *calculate the value, merit* and *worth* of student practice. The connection between this, *constructing a picture of competence*, *making sense* and the concept of *judging* is explored further in Chapter 8.

The time it takes to *make sense* of practice and *construct a picture of competence* is dependant on a multitude of factors. It may occur in seconds, where nurses report that they instantly know. Conversely, it may take multiple exposures to student's practice and episodes of *gathering* to reach a point where the nurse has adequate evidence, which is sufficient to inform decision-making.

Making sense is influenced by the nurse's knowledge of the practice expectations of students and previous experience of working with them. Where the nurse has little knowledge of the practice requirements of students (including level), unrealistic expectations, or a lack of knowledge of the competency framework, may adversely affect their perception of student practice and may result in them drawing inappropriate conclusions (Neary, 2001). This may result in the nurse *constructing a picture of competence* that is not congruent with that accepted by other nurses.

As previously discussed, nursing knowledge and practice experience facilitate *making sense.* They shape benchmarks and have a bearing on the ability of the nurse to make comparisons. The greater the number of benchmarks against which the nurse has to measure performance, the greater their ability to test hypotheses and engage in comparative analysis. This process is influenced by the nurse's beliefs and values about what constitutes competent practice, and the weighting placed on practice indicators embedded in benchmarks. This affects the way in which the nurse *makes sense* of practice and how they *construct a picture of competence*. Part of constructing the picture and *making sense* of the data involves measurement (weighing) of practice. This is achieved by *calculating value, merit and worth*.

7.4.2 Calculating value, merit and worth

According to Neary (2001), the identification of merit illustrates appreciation, and recognises practice that is respected and admired. Merit acknowledges the sequence of action, the appropriateness of this, and recognises the value of practice (Soanes & Stevenson, 2003). The value of practice identifies the worth of this. The quality of the care provided, its importance and usefulness, or worth, in addressing the patient's needs are acknowledged (Neary, 2001). The property *calculating value, merit and worth* is a strategy nurses use in conjunction with *benchmarking* to *make sense* of practice and measure it. This involves making value judgments about the student's contribution to patient care and juxtaposing this to benchmarks. *Comparison* between aspects of practice and the value of these to the patient are considered.

While this may be perceived as being subjective (Neary, 2001), *calculating value, merit and worth* clarifies the contribution of the student's practice to nursing care and

is an important aspect of determining whether this meets accepted conventions. By assessing how the student responds to the patient and *calculating value, merit and worth,* nurses are able to determine whether the student practice demonstrates imperative to care and is professional, ethical and moral. In doing so, insights are elucidated into the student's attitude and whether care is appropriate and culturally safe.

Judgments about value, merit and worth arise from interactions between students and patients. In CCNA, *calculating value, merit and worth* assists the nurse to determine if the criteria embedded in benchmarks have been achieved. This takes into account situational and contextual variables and the level of the student's education, enhances the nurse's ability to interpret and measure the evidence *gathered,* and come to conclusions about competence.

As previously identified, the process of *calculating value, merit and worth* calls on the use of benchmarks. By *comparing* practice behaviours to benchmarks, the nurse is able to identify similarities and differences. This aids the process of identifying features of practice and facilitates the consideration of the 'worthiness' of these. Identifying similarities and differences disaggregates the character of the behaviour. It illuminates contradictions of practice and helps the nurse to recognise and weigh the qualities within this. As a result of gathering multiple snapshots of practice and evaluating these in this manner, the value, merit and worth of practice become apparent and patterns of behaviour become evident.

In order to *make sense* of the practice behaviour observed and measure this, the processes of deconstruction and reconstruction of practice events are employed.

Deconstruction of events uses *benchmarking* to breakdown the practice observed into discrete features. This facilitates the identification of ambiguous practice (Brykczynski, 1999), and in doing so, highlights of points of difference. By employing the process of *comparing,* this strategy enables the nurse to scrutinise individual aspects of practice and identify contradictions that resonate with perceived indicators of safe or unsafe practice. Reconstruction involves pulling the features of deconstructed practice back together. To reconstruct a picture of practice, it is necessary to consider, the *merit, value* and *worth* of the features of practice, the practice context, circumstances in which these have occurred, and the nurse's understanding of the patient's needs (Neary, 2001).

> *'pulling it all together with your own knowledge...and you collate*
>
> *that whole together to make a judgment and bring in benchmarks'*
>
> *(I5-278-284).*

Crucial pieces of information and nursing knowledge are drawn together and used to critically evaluate cues arising from the practice (Buckingham & Adams, 2000; Hedberg & Larsson, 2003). Behaviour that is observed often is recognised and contributes to the formulation of an impression about practice. In CCNA, this process employs *comparing* and creates a cognitive representation of practice that results in the formation of perception. This results in the nurse recognising whether the student's practice is safe or unsafe. According to Buckingham and Adams (2000), this is a cognitive process that occurs as a result of the brain building a network of connections between cues and categories of knowledge that the nurse has built up as a result of experience. They contend that this process occurs unconsciously, and is the basis for the development of intuitive expertise described

by Dreyfus and Dreyfus (1986), and in nursing by Agan (1987) and Benner et al., (1999). Pattern recognition (Benner, 1984; Benner, Tanner, & Chesla, 1992; Hedberg & Larsson, 2003) pays an important role in this process. In CCNA, identifying patterns of practice that align with either safe or unsafe practice enable nurses to *make sense* of the evidence *gathered* and facilitates the process of formulating a picture that represents the degree of competence. The notion that *comparing* facilitates this process extends ideas about experienced-based recognition described by others (Agan, 1987; Benner, 1984; Benner et al., 1999; Brykczynski 1999), informs decisions and determines action, if it is required.

The interconnectedness between the concepts of *benchmarking* and *constructing a picture of competence* is illustrated in Figure 7.4 This depicts the processes of deconstruction, reconstruction and pattern recognition previously discussed, their influence on decision outcomes and nursing actions, and demonstrates how judgments of *merit, value* and *worth* contribute to decisions about practice competence.
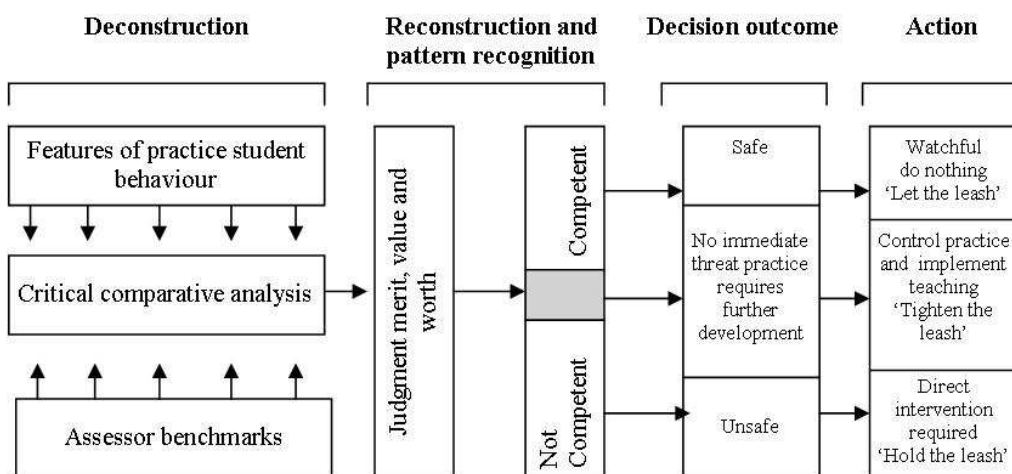
Figure 7.4 Constructing a picture of competence

Calculating merit, value, and *worth* is pivotal in assessing the level of performance and determining whether this meets the standard of practice required. The ability to determine the level of practice arises as a consequence of reconstructing practice, considering qualitative contributions of practice and *comparing* these to indicators embedded in benchmarks. The significance of the practice and the degree to which this matches the benchmark provides an indicator of level and signifies the extent to which the criteria (standards) have been achieved. When *compared* to competency standards, course learning outcomes and expectations of practice, this in turn provides a measure that indicates whether the student's practice meets the appropriate level. This process is enhanced by nurses using their nursing knowledge, experience and imagination to identify consequences of practice, enabling them to predict events. Where predictions indicate adverse outcomes for the patient, nurses are able to identify practice that is unsafe. Insights arising as a result of this provide another means of *weighing up,* determining the level of practice and whether standards have been met. This assists the nurse to confirm its *merit, value* and *worth.* The determination of the level of practice comes about as a result of the interaction between *benchmarking*, and the process of *calculating merit, value and worth* is illustrated in Figure 7.5. This provides another illustration of the interconnectedness between concepts and their properties in the category of *weighing up*.
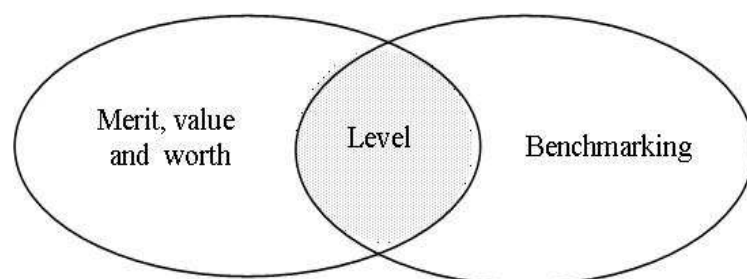
Figure 7.5 Interaction between merit, value and worth and benchmarking to determine the level of student practice

The identification of practice contradictions is influenced by the perception of *merit, worth* and *value* and level of achievement. Where the number of contradictions is high, the level of practice will be perceived as low. In addition, the severity (scale) of the contradiction and the weighting or importance of the benchmark that practice is *compared* against, will impact on the determination of *merit, value* and *worth* and affect the assessment outcome.

While it is acknowledged that students are engaged in a process of learning, nurses have expectations about what a student should and should not be able to do at varying levels of nursing programmes. Contradictions in practice assist nurses to determine the student's learning needs scope the level at which the student is practicing, and how much they can safely be allowed to undertake (Chapter 6),

> *'You kinda develop an awareness of the student's practice between years one and three' (II-531-532).*

Nurses with limited knowledge, experience in practice and experience in undertaking competency assessment will have limited benchmarks to use as measures to assist them in *calculating the value, merit and worth* of students practice, and to arrive at a point where their perceptions of competence can be considered in the context of the practice and judge whether the student is competent.

7.5 Conclusion

The strategies embedded in the category of *weighing up* make an important contribution in determining practice competence, and explain how nurses come to

conclusions about whether a student's practice is safe or not. The successfulness of *weighing up* is determined by the nurse's ability to *benchmark*, *make sense* of the evidence that has been *gathered,* and *construct a picture of competence*. The process of *weighing up* is reliant on the activity of *benchmarking.* The cognitive and analytical processes of *critical comparative analysis* underpin this. This assists the nurse to *calculate the value, merit and worth* of student practice and assess the level of performance. When the outcomes of these processes combine, they crystallise to form conceptual comprehension from which perceptions of competence emerge. The nurse's beliefs and values, and indicators that signify unsafe practice, guide perceptions arising from *weighing up*. The lack of contradictions in practice or identified unsafe indicators, will *weigh* in favour of supporting a conclusion of competence. The outcome of *weighing up* and the degree in which the nurse's assessment reflects professionally accepted standards of practice, is influenced by the nurse's ability to think critically, their breadth of nursing knowledge, amount of practice experience, repertoire of benchmarks, and knowledge of the practice expectations of students and the assessment requirements. These and the outcome of the *weighing up* process contribute to the formation of professional judgment and cement the concepts of *being aware, being professional,* and *being sure.* These concepts underpin the category *Judging*. This is the third phase of CNNA and is described in the next chapter.

Chapter 8: Judging

8.1 Introduction

The category *judging* explains the third stage of the Critical Comparative Nursing Assessment (CCNA) model. During this phase of the process of assessing and determining competence, nurses focus on using the evidence of practice that has been *gathered* and *weighed up* to inform and make judgments about competence. This chapter commences by outlining the theoretical propositions of *judging* and the relationship of these to the BSPP of *comparing* to determine competence. The second part of the chapter will present the concepts of *being aware, being professional* and *being sure* that comprise the category *judging.* The properties embedded in these concepts explain how the nurse judges perceptions arising from *weighing up* and makes a decision about competence that they believe is accurate, fair, and reflects professional standards. In doing so, the tensions associated with making professional judgments about practice competence are highlighted, and the strategies used by nurses to manage the decision-making process are detailed. This explains nurses *knowing*, what constitutes *the bottom line* when determining competence, and brings into focus the burden of undertaking competency assessment and the professional responsibility for ensuring public safety.

8.2 Judging, comparing and determining competence

The interconnectedness of *judging* to other phases of CCNA means that *judging* provides a feedback mechanism for both *gathering* (Chapter 6) and *weighing up* (Chapter 7). In *gathering, judging* determines the 'what next' in *creating opportunities*, it is the mechanism for determining *letting out the leash,* and the 'where next' in *collecting the evidence.* The nurse's ability to *benchmark*, *weigh up* the *value, merit and worth* of the practice observed, *make sense* of this, and *construct*

a picture of competence is reliant on judgments being made in *weighing up.* The outcomes of the judgments made in *gathering* and *weighing up* assist the nurse on a day to day basis to extend the student practice development by teaching and assessing competence. The nurse considers the perceptions of competence generated by the *weighing up* process, *reflects* on the overall performance of the student, and decides whether the student's practice behaviour demonstrates provision of care that meets the requirements of professional standards.

There are two primary instances when judging occurs. These are on a daily basis associated with the supervision of student experience and practice development, and at the completion of clinical experience, where final judgments are generally formulated and competency to practice is formally assessed.

When competence is formally assessed at the end of the student's clinical placement, the formulation of judgment takes into account all of the perceptions and outcomes that have been generated throughout the student's experience, and uses these to inform and construct a professional judgment about the student's overall level of competence. *Judging* at this time differs from that which occurs during *gathering* and *weighing up,* in that, while making a judgment requires analysis of a situation, this aspect of the category *judging* takes into account the students performance over the entire experience.

'You've seen written work, maybe a care plan or whatever. You've seen them [student] caring for patients, performing procedures, writing reports. Professional judgment is collating all of that, all the data – your observations, the feedback, and you are pulling it all together with your knowledge and experiences…you are not just using your own professional judgment, you are using other people's, the preceptor's, possibly feedback from patients and you are collating that whole together and bringing in benchmarks' (I5-273-284).

The focus moves from concentrating on the intricacies of analysing the features of practice, to considering professional implications of practice, ensuring that the analysis reflects an objective picture of performance, and that the assessment outcome is accurate and fair. Here a wholistic approach is applied in which the moral and ethical aspects of making professional judgments are considered (Benner, Tanner, & Chesla, 1996). The way in which the nurse manages the formulation of professional judgment is illustrated in Figure 8.1.
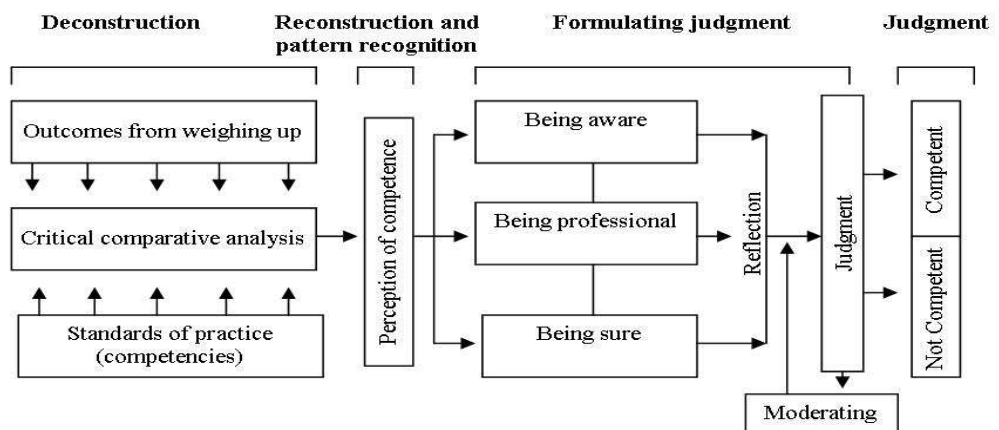
Figure 8.1: Formulating judgments about competence

This shows how previous impressions about student competence arrived at through *weighing up* are drawn together and collectively *critically compared* with the assessment framework (competency standards). The same process underpinning *critical comparison* explained in previous chapters applies. This identifies similarities and differences and the degree in which competency standards have been achieved. Where contradiction exists, this signals aspects of practice where competency requirements have not been met. This analysis contributes to the recognition of patterns (Benner, Tanner & Chesla, 1996) of student behaviours that resonate with the nurse's knowledge of either safe or unsafe practice, and results in the formation of an overall perception of competence. Before judgment is passed this perception is examined. This deliberation takes the form of *reflecting*. The outcome of reflection results in a judgment of either competent or not competent practice.

In the event that a judgment cannot be reached, the nurse may find it necessary to return to *gathering* more information. Just as in *weighing up,* the greater the evidence, the easier it is to distinguish contradictions that expose practice that does not conform to conventional ideas about competence. By *gathering* more information and weighing this up, notions about competence can be confirmed or dispelled, and a clearer picture of the student's practice obtained. Seeking the opinion of other nurses and *moderating* judgments assist the nurse to come to conclusions and make judgments about competence. This involves the nurses *comparing* perceptions to validate judgments about competence. This aspect of CCNA provides a means of ensuring that the judgments made are accurate and fair, are acceptable to the group, and in keeping with professional standards. While this feature of CCNA is discussed in depth in Chapter 9 (*moderating*), it is important to note that, for some nurses,

making a judgment is dependant on *moderating*. In other words, they are unable to or will not make judgments without consulting their peers. Conversely, some nurses may formulate judgments independently of others, and may not engage in *moderating* activities. This generally occurs where the nurse is confident in their professional judgment. According to Dreyfus and Dreyfus cited in Benner, Tanner and Chesla (1996), this behaviour is typical of expert nurses.

The activities underpinning the formulation of judgment are embedded in the category of *judging,* and are described in the concepts *being aware*, *being sure* and *being professional*. These support the theoretical propositions and outcomes underpinning *judging* and are based on the premise that when assessing competence, nurses utilise nursing knowledge, reflection and critical thinking to formulate professional judgment about a student's practice. The interrelationship between the theoretical propositions and outcomes of *judging* and the concepts and properties imbedded in this category are shown in Figure 8.2 (page 197).

Figure 8.2 illustrates the connection between the process of formulating professional judgment outlined in figure 8.1 and the theoretical underpinnings of the category *judging*. It demonstrates that nurses are mindful of the need to make judgments that are accurate and fair, and ensure that public safety and professional standards are maintained. To ensure that judgments are made that are objective and fair, nurses consider the context of practice and how this might affect the student's ability to perform. *Being aware* of this and *reflecting* on circumstances provide the nurse with the opportunity to moderate judgments and *make allowances* where appropriate. Careful consideration is given to ensure that professional standards are maintained

and that judgments are in keeping with these. The protection of professional standards and making judgments that are objective and fair is a reflection of *being professional.* This demonstrates the nurse's acceptance of accountability to protect public safety (Hunt, 1997). Making judgments in this way employs a measure of *gate keeping* (Mahara, 1998), and ensures that only those students who demonstrate practice that is safe and acceptable to nurses, are deemed competent, and are put forward to enter the profession. This reinforces the need to ensure that the foundations of judgment are accurate and fair.
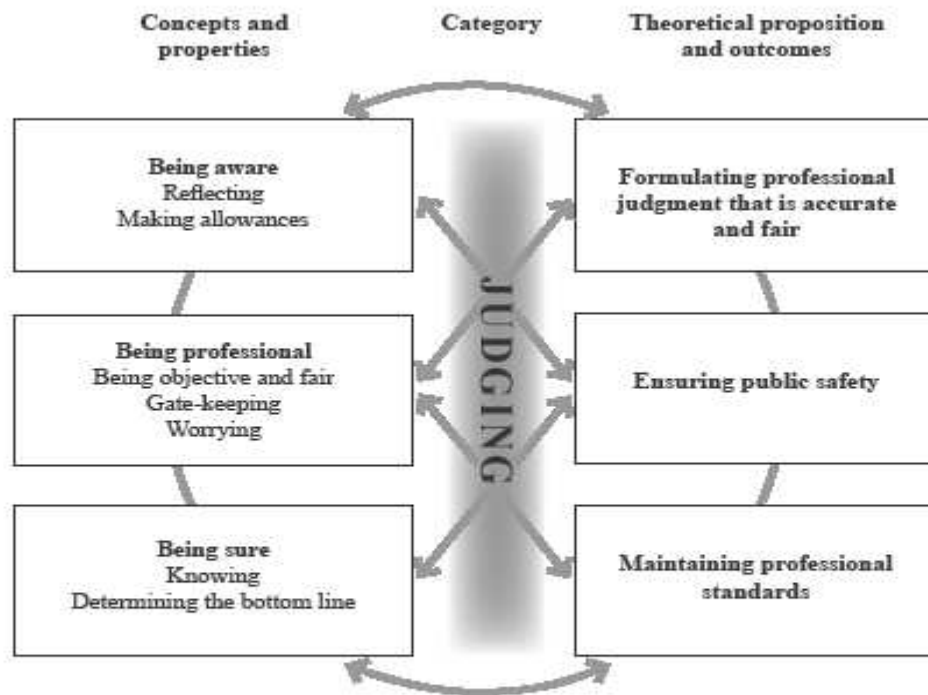
Figure 8.2 Interrelationship between concepts and properties of judging and theoretical propositions

The connections that *judging* has with the other phases of the CCNA model are illustrated in Figure 8.3. Central to this is the BSPP *comparing*.
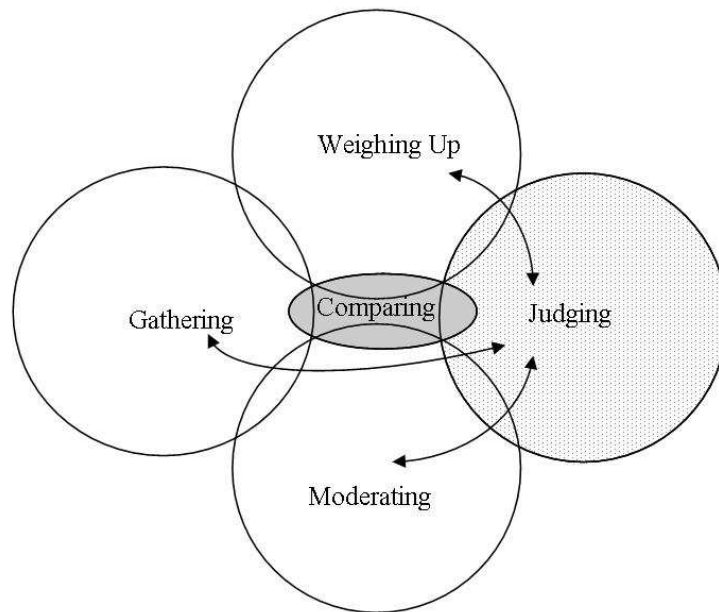
Figure 8.3 The relationship of judging to other categories in the CCNA model

In relation to *judging*, *comparison* assists the nurse to critically evaluate the outcomes of the analysis (*weighing up*) and confirms if the student's actions are safe and appropriate. Using *comparison* at this stage of the decision-making further advances the analysis of student practice. While *comparing* has been described previously in the category of *weighing up*, it is important to note that in the phase of *judging* the focus of *comparison* concentrates on making an assessment of overall performance rather than on individual features of practice (i.e. micro aspects of nursing work). While the identification of similarities and differences remains important, in order to identify contradictions, and make distinctions between safe and unsafe practice, technical errors are considered, and may be rationalised. This process is described in more detail later in this chapter in the concept of *being aware*. The influence *comparing* has on the process of *judging* and the outcome of the

assessment of competence is discussed in the concepts embedded in this category. These are *being aware, being professional* and *being sure.*

8.3 Being aware

The concept of *being aware* emerged from the category *judging*. It recognises that nurses have a responsibility to safeguard standards of practice and that judgments should reflect these and support the principles of professional care to reduce risk to public safety. *Being aware* provides a means for ensuring that judgments are congruent with and uphold standards of practice. In doing so, *being aware* supports the concepts of *being sure* and *being professional* that comprise the category of *judging* and makes provision to ensure that professional standards of practice are maintained.

In *being aware,* nurses use reflective practice to consider perceptions arising from *weighing up*. This process is underpinned by critical thinking (Woolley, 1990) and assists the nurse to distinguish factors that may adversely influence or prejudice judgments. It acknowledges the complexity and unpredictability of the practice environment, and that nurses use differing benchmarks to analyse practice. *Being aware* recognises that these factors may impact on the formulation of professional judgment. In doing so, it acknowledges the potential for bias resulting from internal and external factors, and prejudice that may influence the assessment outcome.

Internal factors included the personal beliefs, values and knowledge of the assessor, failure to acknowledge learning, unrealistic expectations, getting too close, personality clashes with students, pre-judging, and factors that influence *knowing*.

The issues related to *knowing* and *judging* are explored in more detail in the concept of *being sure*. External factors that may bias or influence the assessment judgment may arise as a result of feedback from other nurses, which may reflect their internal factors, and other issues influencing practice development within the learning environment (Paterson, 1997; Spouse, 2001). These include issues related to the context in which the practice took place, situational events such as patient equity, unexpected events and horizontal violence. Both internal and external factors may impact on the *judging* process and result in students passing or failing competency assessment when they should not. The way in which nurses take these issues into account when making judgment is detailed in the property of *making allowances*.

Judging is a complex activity that requires a combination of abilities that distinguish features of practice, confirm contradiction and formulate perceptions of competence. In order to do this, the nurse needs to be able to interpret student behaviour and feedback provided by others about this. The ability to interpret and problem solve is interlinked with clinical reasoning and professional judgment (Boychuk & Duchscher, 1999; Brown, 1999; Buckingham & Adams, 2000). These activities are supported by critical reflection (Johns, 1995).

8.3.1 Reflecting

Benner, Hooper-Kyriakidis and Stannard (1999) contend that by identifying ambiguity and exploring tensions, reflection can be helpful in developing understanding and lead to more informed reasoning and clinical judgment. Reflection provides a practical means for understanding situations and assists in resolving contradiction and confusion (Farrell, 2004; Tanner, Padrick, Westfall & Putzier,

1987; Tolich & Davidson, 1999). R*eflecting* involves thinking about an event and dialoguing with self with the intention of *making sense* of the situation and drawing insights, that will inform decisions (Johns, 2004). This process is self-directed, self-disciplined, self-monitoring and self-correcting (Schön, 1987), and focuses upon deciding what to believe or do (Norris & Ennis, 1990). Reflection assists the nurse to promote understanding and reconstructs ideas, makes them aware of values and how these can influence the process of determining competence. Further to this, reflective thinking is considered to reduce error, and clarify scope of practice (Schön, 1987).

Reflecting allows the nurse to see both the value and limitations of their thinking in decision-making. In *gathering,* reflection is used to guide decisions about *creating opportunities, letting out the leash* and *collecting the evidence.* It also has a role to play in *determining the value, merit and worth* of practice when engaged in *benchmarking* and *weighing up*. In *moderating* nurses use reflection to consider the contribution others make by way of feedback and weigh this against their judgment. It is also utilised in *truth seeking, judging truth* and *trusting*. The category *moderating* and these concepts are explored in depth in Chapter 9.

While reflective thinking is associated with most activities that comprise the CCNA model, nurses in this research spoke more of this in relation to the role of clinical reasoning and the formulation of professional judgments about competence. Reflection arose as a result of the nurse's need to make sense of the student's practice and make the right decision in relation to a particular set of circumstances.

'...reflection. That's when you actually go back and unpick what they

are doing' (I3-267-269).

'Judgment is informed by being thoughtful. Critical thinking is needed

and also reflection. You need to be able to ask yourself what is the

basis of this – where does it come from – what will be the

consequences?'(I8-27-33).

By consciously *reflecting* on feedback about the student's practice and asking questions of their understanding of this, the nurse can use reflection to come to a point of realisation about what they know, and how they know, to inform decisions about competence. In this way, reflection is important for *making sense* of the complexity of practice, assists the nurse to resolve contradictions between what they and other nurses perceive, and to unravel contextual factors that may influence their perception. The outcome of reflection provides the linkages that facilitate information processing in decision-making and is an important factor in critical thinking and reasoning (Baker, 1996; Benner, Tanner & Chesla, 1996; Farrell, 2004). Reflection helps the nurse to reconceptualise perceptions, problem solve, arrive at conclusions, and make decisions that are reasonable (Norris & Ennis, 1990).

Engagement in reflection reveals patterns of knowing and acting that help the nurse to recognise situations and respond appropriately. Over time recognition of patterns facilitates knowing that becomes embodied in practice. Reflection is considered to contribute significantly to the development of nursing knowledge and decision-making (Benner, 1984; Benner, Tanner & Chesla, 1996; Chenoweth, 1998; Manias,

Aitken & Dunning, 2004), and practice development (Walsh, McAllister & Morgan, 2002). In CCNA, it contributes to *being sure*, nurses knowing whether the student has demonstrated competent practice and assists in determining the practice development needs of students in the property *teaching competence*.

In this research, pattern recognition emerged as an important factor contributing to nurses recognising safe and unsafe behaviour and determining competence. This was especially so in the stages of *weighing up* and *judging* where perceptions of competence play an important role in the formulation of professional judgment. Reflection facilitates these aspects of CCNA by pulling scattered images together, and providing the means for thoughtfully exploring the implications of the student's actions. Being attentive in this way provides an opportunity to imagine possible outcomes of student practice and explore implications of this. According to Saul (2001) imagination is a human quality that, like reflection, allows people to think laterally and consider probabilities. As cognitive functions, imagination and reflection provide internal regulatory systems, which, when combined with common sense, knowledge, memory and ethics, "protects people from the temptation of premature conclusion" (p. 116), and help refine perception. In this way, both qualities enhance sensitivity to contradiction and facilitate the *weighing up* and *judging* process and enhance *knowing*.

Using reflection to contemplate incidents and the frequency in which these occur further assists in the formulation of perceptions about competence. Reflection promotes a sense of awareness (*being aware)* and facilitates the nurse's sensitivity to

similarities and differences in practice. Thus, it facilitates the process of *comparing* to determine competency to practice.

Nurses involved in this research reported that there were times when they deliberately reflected on the student's performance. Examples of the types of issues/ questions that nurses considered when making decisions about student practice competence are detailed in Table 8.1 (page 205). *Reflecting* on these issues and the questions that arise from them leads to enlightenment and promotes the filtering of perceptions about the student's performance that have arisen over the duration of the clinical experience.

Being aware of issues that impact on student performance and *reflecting* on these, acts as a means for self monitoring perceptions. It also facilitates managing the day to day thinking that occurs for the nurses as they *gather, weigh up, judge* and *moderate* student practice. It assists nurses to manage decision-making in such a way as to be less judgmental and emotive, and to use a more reasoned approach (Tanner, 1983). Here, thoughtfulness assists interpretation and understanding and heightens the awareness needed to make judgments (Beveridge, 2003; Jay & Johnson, 2001; Johns, 2004). By facilitating a reasoned approach to decision making, reflection assists the nurse to determine if judgments are fair and provides the space for considering discretionary judgment and the appropriateness of *making allowances*. This is guided by what Jay and Johnson (2001) refer to this as comparative reflection, when the interpretations arising from reflection are compared with the perspectives of others. Contradictions arising from comparative reflection illuminate the limitations of thinking and may become a catalyst for *truth seeking* and

understanding of others. This aspect of reflection is evident in *moderating* (Chapter 9).

Table 8.1 Issues reflected on when making competency decisions

Stories about student practice

Nurse's relationship with student

The student's performance as a whole

The degree to which the student's practice aligned with the competency standards

Was the student trustworthy and reliable?

Did the student follow orders?

The student's relationship with other team members – how well did they fit in?

Were there patterns of behaviour that were a concern?

Quality of feedback from preceptors – was it fair?

Feedback from patients and families

The student's performance in challenging situations

Were there 'near misses'- if so, how serious could these have been?

The student's knowledge

Issues related to professional behavior

The student's insight of ability – did they know when to seek help from others?

The student's ability to assess clients and critically think through problem

What did others think – am I being objective and fair?

How would I feel if this person was looking after 'me and mine'?

8.3.2 Making allowances

As a property of *being aware, making allowances* explains the factors that nurses are aware of that can influence *judging*. *Making allowances* demonstrates how nurses employ reflection, critical thinking and reasoning to moderate and adjust perception. The result of *making allowances* ensures judgments about competence are fair and

are made in a professional manner (Hunt, 1997). In this sense, *being aware* and *making allowances* contribute to the success of the other concepts in *judging*.

Making allowances and modifying judgments generally occurs when there is reasonable doubt about the fairness of a judgment, or when feedback from other nurses is incongruent with overall perceptions of the nurse assessing competence. These situations often become apparent when *moderating* perceptions about competence with other nurses, and presents in two ways. Firstly, nurses may discover that their ideas about the student's practice are in contrast to that of their peers. The incongruence in perception becomes the catalyst for nurses revisiting their thoughts about the student's practice and *reflecting* on these. If it is identified that the nurse was either unfair, had failed to take into account extenuating circumstances, or that their expectations of student performance were inconsistent, resulting in the student being disadvantaged, allowances will be made. Feeling guilty about failing to support a student to reach competency and *worrying* about making the right decision (Hunt, 1997) may also lead to allowances being made, and lead to 'letting students through'. This is discussed further in the concept of *being professional*. Secondly, *moderating* may lead the assessing nurse to question the accuracy of feedback about the student's performance. If the nurse believes that they are correct and others are not, they need to decide whether they adhere to their own perspective or accept that of the group. This will determine whether allowances are made or not, and highlights the tension between *making allowances* and *moderating*. This issue is explored further in the category *moderating* in Chapter 9.

The process of *making allowances* entails *reflecting* on circumstances surrounding the student's performance and factoring into the assessment circumstances that are outside the control of the student. This takes into account extenuating circumstances, and the context in which practice takes place, and provides some flexibility, permitting judgment to be modified, so that it is fair (Neary, 2001). According to Chenoweth (1998), this provides a means of combating bias and prejudice by correcting false assumptions. For example, allowances are made for unanticipated events and situations that the nurses themselves found challenging, and first time experiences. Consequently, learning is acknowledged and allowance is made for practice that is

> *'...a little awkward...and where the student is worried about you watching them'(I2-552-536).*

> *'They're alright, they're safe, they just haven't grown enough yet. They might not be where some of the others are, but they're going to get there and you could see that happening' (I3-560-562).*

Here, technical errors are rationalised, concessions are made for lack of experience, the stress associated with first time events, students anxiety about being watched, and / or emotional factors triggered by events such as unexpected death.

Additionally, allowances are made where assessors perceive that there are unrealistic expectations about student performance.

'Many of them [preceptors] have forgotten what its like to be a learner, so they've really forgotten what its like to be a student or new graduate and what level they should be performing at' (I1-843-845).

'I have often found that nurses here have had unrealistic expectations of students' (I2-657-659).

'Some nurses judge people differently and will have much higher expectations of what is expected, compared to what is generally perceived as what you need for competency' (I4-140-143).

The type of placement is also considered when *making allowances* about whether the student demonstrates an acceptable level of practice. Some placement areas require advanced levels of practice. Where this is so, students placed in specialty areas are sometimes thought to be disadvantaged. For example

'Sometimes the student organises their own elective placement in a highly specialist area, where beginner nurses do not go, and that's an issue. So, sometimes when competency is being assessed, it's not at the appropriate level and that influences the assessment' (I1-790-795).

Personality clashes were additionally cited as situations where nurses would consider *making allowances.* Nurses acknowledged, 'how they feel' about a student could

impact on assessment and freely admitted that personality issues may cloud judgment and result in a student either passing or failing when they should not.

> *'The weakness of the assessment is that there's an awful lot of personality stuff that comes into it' (I1-170-172).*

> *'Sometimes a student and preceptor might clash. It might be that the preceptor takes a more extreme view…you have to look at the conflict and why it's there' (I3-689-694).*

Inappropriate *making of allowances* may arise due to the closeness of the relationship between the student and the assessor. Liking students is perceived to initiate bias (Norman, Watson, Murrells, Calman & Redfern, 2002). Brown (2000) believes that this and the "personal characteristics of students exert a great influence on judgments about clinical performance" (p. 407).

> *'If the preceptor likes the student you have to consider is this swaying the judgment about their [student] ability' (I1-235-238).*

Nurses involved in this research perceived that students, who are liked and fit into the team, are more likely to receive positive feedback regardless of whether or not competence is demonstrated. Conversely, if a student is not liked, it is not uncommon for a student to receive negative feedback. In both situations, careful consideration is given to actual practice, and perceptions moderated by *making allowances* if this was thought necessary.

Perceived racial prejudice is another example where it is considered that judgments about students are unfair. It is believed that students who speak with an accent influence people's perceptions of their competence to speak English, and inferences are made about the students knowledge and ability based on this. Where it was believed that cultural bias and racism impacted on decision making, nurses involved in this research believed that, if the feedback provided did not reflect the student's ability, it is appropriate to make allowances in these circumstances

While *making allowances* is a corrective action utilised where students are perceived to be disadvantaged, this may also be employed when feedback is overly positive. Nurse educators are particularly aware of this, acknowledging what they termed the 'halo effect'. Here, the student had impressed the preceptor to such an extent in one aspect of their practice, that they [preceptor] were likely to excuse behaviour during the placement that under normal circumstances would be questioned.

> *'I had a student in a paediatric ward. This was long ago. It was when they used oxygen tents on beds. A child came in with acute broncialitis He was about 18mths old and very short of breath. He was being cared for by myself and a student. While the mother was with the child he was settled. When she left all hell broke loose and the child started to scream blue murder. The student looked at me and looked at the baby, she looked at me again and very deliberately unzipped the oxygen tent, took off her shoes and climbed into the baby's bed and cuddled him in her arms. She zipped the tent down and sat there rocking the baby and looking at me. Sort of saying "well what are you*

going to do about it?" My heart was bursting with pride. Now from

that moment on that girl could do no wrong. That's the halo effect.

She could have been doing terrible things the next week and I would

still have seen the halo around her head. It can happen the other way

too. It can happen in reverse' (I3-1219-1246).

The antithesis of the 'halo effect' is where students make mistakes and allowances are not made when they should. This may result in situations where a student makes a mistake and is labelled incompetent. Once this perception is fixed, the perception is that the student can do no good. In both situations, nurses report that they are cautious when interpreting information and making professional judgment where, it is believed, others had made inappropriate comparison and used this as a discriminatory measure.

'You really need to be cautious in terms of how you interpret what is

being said because it's very easy for staff to use this a discriminatory

measure' (I1-805-808).

At other times, allowances are made when it is perceived that the practice environment limits the student's ability to extend their practice development, and demonstrate competence (Waddell, 2001).

'Sometimes students are in placements where there's limited hands

on...So you take that into consideration when you do the assessment.

You have to, you can't not' (I1-463-469).

In these circumstances, nurses said that while students had not been able to demonstrate competence in all areas of practice, they made allowances for this and signed them off as being competent. Reasons for using discretion and *making allowances* in these circumstances were two fold. Firstly, because competency assessment required that all criteria had to be achieved, and half measures or recording 'not applicable' on assessment forms was not acceptable, and secondly, while indeterminacy existed, it made no sense to fail a student if there was no reason. This is an example of exercising discretion and the use of professional conscience, which according to Hunt (1997) is used to address moral concern. Where there is lack of evidence and nurses feel that the student is or would be safe, they make allowances by applying *the bottom line*. This strategy is discussed in the concept of *being sure*.

Making allowances is also employed in this way when assessors perceived that the culture of the learning environment and the actions of other nurses impacted on the student's ability to perform (Spouse, 2001). This included situations where the student is not welcome, preceptorship is not available, and learning experiences are not offered. Failure to support students, horizontal violence within the workplace and bulling are recognised as impacting on the student's ability to achieve (Hurley, 2006; Paterson, 1997; Spouse, 2001).

> *'I had a student who was instructed to take a client who was under the Mental Health Act downtown. She said "no I'm not allowed to do that" and they [ward staff] said "you will go...its ok. We have given you permission". The student refused to take the client again stating,*

"no I'm not allowed to do that". In the end, she was literally bullied

into going and, knowing her behaviour would impact on her

assessment, was powerless. She did her very best to maintain safe

boundaries and was pushed outside of them by other nurses' (I1 1231-

1247).

Poor role-modeling (previously discussed in the category *gathering)*, and practice environments that are unsupportive of the student, can lead to allowances being made. In these circumstances some nurses "feel they [have] no choice but to pass the student" (Duffy, 2004, p. 9), and that in these situations students are given the benefit of the doubt. Nurses need to be aware that giving students the benefit of the doubt has effects that ultimately may have professional consequences.

The risk of *making allowances*, making assumptions and drawing conclusions that practice is safe is acknowledged as posing a risk to public safety. This, however, for some nurses, is outweighed by the need to be professional and ensure that the assessment process is fair and the student is not disadvantaged because of inappropriate actions of other nurses (Hunt, 1997). How much leniency is given, the degree to which rationalising errors and *making allowances* occurs, and the frequency in which a student is given the benefit of the doubt, varies. According to Duffy (1999) common reasons for giving the student the benefit of the doubt include the assessor leaving it too late to address practice concerns and feeling that the student has been let down, acknowledging the student's personal situation, not wanting to jeopardise the student's future, being unable to fail a student and feeling

guilty. The misconception of the assessor, that they are being kind, poses a threat to both professional standards and public safety.

The nurse's awareness of the student's knowledge base, and perceptions about this, influence the degree to which rationalising errors and *making allowances* occurs. Nurses involved in this research thought that allowances are more likely to be made if it is perceived that the student has a sound knowledge base on which to base practice, they are motivated and demonstrate interest and willingness to learn about practice, have a good work ethic, and appear to be committed to becoming a nurse. Conversely, allowances are not made when there is evidence that the student demonstrates no insight, or has failed to make progress toward achieving a level of practice that is acceptable and errors are repeated. A student's inability to grasp underlying concepts involved in practice, make adjustments to practice and lack of insight are believed to indicate unsafe practice.

While *making allowances* takes into consideration the student's experience over the time of the placement and what has happened before, some nurses are fearful of *making allowances*. They perceive that this practice condones unacceptable behaviour and gives license to others to act in a similar manner (Hunt, 1997). Issues surrounding what is acceptable, and what isn't, are questioned.

> *'Where do you draw the line?'(I2-297).*

While *making allowances* provides opportunities for nurses to address the complexities of the practice environment and human nature, it can be abused. While

abuse is not engaged in consciously, this situation can occur when a nurse is unwilling to fail a student and uses the license for *making allowances* to absolve themself of the responsibility of telling the student that they have not passed. This aspect of CCNA is a facet of *abdicating* professional responsibility and is discussed in the concept of *defaulting* in the category of *moderating* (Chapter 9).

Using discretion and *making allowances* does not mean making judgments without reference to rules. According to Hunt (1997), it means interpreting the rules and exercising wisdom to address mitigating circumstances. As a strategy to address bias, *making allowances* is generally exercised in situations that the nurse perceives as being extenuating, and judgment is made *knowing* that 'on balance' the student's practice is safe, and that in differing circumstances, it would have met the standards required (Hunt 1997). If there is no indication that these factors can be assured and if there is doubt, the assessor is more likely to err on the side of caution and fail a student.

Making allowances demonstrates that nurses carefully consider variables impacting on student performance and weigh these in order to reach a fair judgment about the student's level of practice competence. It demonstrates a moral ethic to care (Benner, et al., 1996) and is an acknowledgement of not only a professional responsibility to ensure safe patient care, but also the professional responsibility of nurses to grow their young, to be professional in the way in which they execute judgments about competence, and determine who should be allowed to enter the profession (Chasens, DePew, Goudreau & Pierce, 2000; Marrs & Alley, 2004). Aspects related to these

features of *judging* are discussed further in *being professional* and in the property of *gate-keeping*.

8.4 Being professional

According to Mahara (1998) claims about subjectivity and incomparability of clinical evaluation have fueled the "search for objective, reliable and valid assessment methods" (p. 1339). While evaluation methods such as simulation based assessment, checklist and rating scales (Bondy, 1983; Schoening, Sittner & Todd, 2006) have resulted in more standardised assessment of student performance, these continue to fail to address the complex and contextual nature of the clinical environment (Benner, 1982; De Vore, 1993; Duke, 1996; Field, 1991; Friedman & Mennin, 1991; Mahara, 1998; McGaghie, 1991). This includes issues related to the dual role of preceptors and educators as both teachers and assessors, where they "fulfill multiple and seemingly incompatible roles [of] mentor, participant observer and judge/ gatekeeper" (Mahara, 1998, p. 1340). These circumstances have raised concerns about the validity of assessment (Andre, 2000; Girot, 1993; Lenburg & Mitchell, 1991; Mahara, 1998; Smith, 1997; Watson, Calman, Redfern & Murrells, 2000; Wolf, 1996). This concern, coupled with the need for the recognition of nursing as a profession and academic discipline (Benner, 2005; MacDonald, 1995; Mahara, 1998, Redmond, 2004), and public demand for professional accountability (Hunt, 1994; Tilley & Watson, 2005), have resulted in nurses becoming sensitised to the need for objective and fair assessment methods that result in accurate assessment of student performance. In this research, these matters emerged in the concepts of *being professional* and the properties of *being objective and fair, gate-keeping* and *worrying*.

8.4.1 Being objective and fair

As previously discussed, *judging* takes into account situational events and in doing so makes provision for allowances, outside of the control of the student, to be factored into the decision making process. The property of *being objective and fair* sits beside *making allowances*. It acknowledges that there is distress for both the student and the nurse undertaking competency assessment. This is especially so when a student does not meet the assessment requirements, and "is congruent with notions of a 'caring profession' that students should be treated fairly" (McSherry & Marland, 1999, p. 578), and "in respectful ways" (Benner, Tanner, & Chesla, 1999, p. 160). The interaction between the properties embedded in *judging* facilitate *being objective and fair,* factor into the analysis the effects of the social and cultural context of the learning environment (Chenoweth, 1998), and address issues related to moral agency. In this way, being *objective and fair* is a catalyst for *making allowances,* the results of which facilitate the formulation of judgments that are *objective and fair*.

Nurses involved in this research were very concerned about the decision-making process and the tensions surrounding subjectivity. While it cannot be expected that every student will pass competency assessment, they do have a right to expect fairness and consistency (Duffy, 2004; McSherry & Marland, 1999). This notion encourages a strong desire to ensure that assessments are objective and subjectivity is minimised (Stokes, 2005).

'As an assessor I try to be objective. Straight up, black and white, that sort of thing...and you've got to have something substantive to back up what you are saying' (I5-414-423).

'I start off thinking where does this fit then you go back to the core thing you are looking for and make it objective, so what are the subjective clues...and one of them is comparing what you would do or what you know others staff do' (I2-167-173).

Gut feelings and intuitive thoughts about student level of competence are acknowledged as ways of *knowing* for nurses involved in this research. While these factors are discussed further in the concept *being sure,* the interactive nature of concepts and properties in the category of *judging*, bring attention to the influence of intuition on the validity of assessment. While nurses acknowledged that these aspects of *knowing* have a place in contributing to the formulation of perception and the assessment of competence, concern is expressed that the nature of this form of *knowing* is often unable to be substantiated and is considered to be subjective.

'I think measuring competence is subjective, and if I was really honest, it's probably knowing that this person is ok' (I3-259-261).

Using gut feelings and intuition in summative assessment to substantiate perceptions of competence is considered to be neither objective nor fair and there is a perceived need for evidence of performance that is objective and reliable.

'Gut feelings need to be made objective...have evidence...it seems that unless you have clear evidence they [assessors] let them through and put aside their knowing' (I2-147-149).

'It's [assessment] got to be more than subjective. You have to have objective material to support decisions even if it's subjective in a gut feeling. It's better for not only your own professional judgment but also for the other person [student], because their career is on the line' (I2-151-154).

'Its grossly unfair to put forward a I feel' (I2-155).

Interaction between the properties of *making allowances* and *being objective and fair* also bring attention to the issue of discretionary judgment and the bearing this may have on the validity and reliability of assessment (Hunt, 1997). Matters addressed in *making allowances*, including beliefs and values of the assessor, and the extent to which the relationship between the assessor and student is developed, is believed to have a potential impact on objectivity. This may compromise the validity and reliability of competency assessment (Gonczi, 1995; Norman, Watson, Murrells, Calman & Redfern, 2002). These challenge the theoretical propositions underpinning *judging* by compromising the assessment process. As a result, the nurse is mindful of the implications of decisions for students and their responsibility to uphold public safety (Marrs & Alley, 2004). Because of this, nurses are careful about *being objective and fair*, *being professional* and *being sure* that the judgments they make

are accurate, congruent with professional standards, and are acceptable to other members of the profession.

> *'I have gone to colleagues with issues – its part of the process of maintaining integrity...being objective...being fair and justice' (I7-20-23).*

Moderating occurs not only with other nurses as described in Chapter 9, it also occurs between assessors and students. During the assessment interview, the assessor discusses the student's performance with the student and considers the student's perspective concerning their ability to demonstrate competence. The assessor *compares* the student perception of practice to theirs, and may take into account previously unconsidered circumstances that may result in *making allowances*.

> *'I always find it helpful to get the student to make notes about themselves...you come together to write up the assessment and compare notes' (I5-88-91).*

These circumstances provide further evidence of *reflecting* and acceptance of responsibility to ensure assessment outcomes reflect a balanced and fair perspective. To *be objective and fair*, nurses seldom made judgments about competence based on one instance of practice. In order to obtain a balanced perspective, the student's written work, and involvement in tutorials are also considered.

> *'While written competence doesn't equal ability to perform and vice versa' (I3-351)*

Some assessors believed they could rationalise their judgment and were happy to make allowances, if the student demonstrated they had a sound knowledge base. *Gathering* evidence by means of written work is reported to be helpful in 'filling the gaps' when there is not a lot of evidence about the students practice to hand. Multiple perspectives generated from using a variety of assessment methods is advocated as providing a more reliable and objective assessment of competence (Mahara, 1998; Neary, 2000b).

The consumer status of the student, appeals and concern regarding the potential for litigation by students dissatisfied with the outcomes of clinical assessment, and situations where the professional judgment of nurses have been challenged, and / or over turned, are of concern to assessors (Stokes, 2005). This, and literature (Chasens, DePew, Goudreau & Pierce, 2000; Drake & Stokes, 2004; Marrs & Alley, 2004; Orchard, 1994), concerning competence, moral turpitude, eligibility to register as a nurse, and legal action taken by students against educational institutions, reinforces the perception that objective and reliable evidence is needed in order to justify non-achievement of a student (Andre, 2000). For nurses involved in this research, there was a general feeling that professional judgment about educational matters, including assessment, is not valued by people outside of the profession. They believed that professional judgment would not be supported if there was a lack of hard evidence to support assessment outcomes where a student had failed a competency assessment. This, and issues surrounding increased accountability, were cited as contributing to nurses choosing not to precept students, and / or distancing themselves from the assessment process. These matters have an influence on *relying on others, abdicating, defaulting* and *losing faith,* which are discussed in Chapter 9.

Nurses involved in this research were sensitised to the occurrence of what they referred to as 'pre-judging'. Here, judgments are prematurely made about the student's ability to perform. This may occur before the student's placement commences and is primarily a result of gossip and preconceived ideas arising from stories that have been relayed about the student. Stories may relate to previous performance in other practice areas or personal information concerning the student's private life. A student may also be categorised according to the institution in which they are enrolled. Perceptions that some educational institutions produce poor quality graduates can influence how the student is perceived and the level of support they receive in practice from preceptors. Perceptions arising from pre-judging may influence ideas about performance and impact on the opportunities and support offered students, and the outcomes of competency assessment.

Pre-judging is considered to be neither objective nor fair and in some instances is believed to affect the relationship between the student, educators and nurses in the practice environment. If this is so, this may give rise to issues surrounding trust and impact on relationships between educators and preceptors. These factors are explored in further detail in *gate-keeping* and the concept *trusting* in Chapter 9 (*moderating*).

8.4.2 Gate-keeping

Assessment of student practice has two purposes. Firstly, as part of the educative process, which should provide students with feedback about learning. The educative process provides information about practice development requirements of students for the nurses assuming precepting roles, and in CCNA is linked to *teaching competence* and *letting out the leash* in the category of *gathering*. The second

purpose of assessment is *gate-keeping*. Here, the focus of assessment is on ensuring that professional standards are maintained and public safety is protected. *Gate-keeping* highlights the professional responsibility of nurses to ensure only those students, who demonstrate they have the knowledge and practice skills to be a nurse, are allowed entry to the profession (Diekelmann & McGregor, 2003; Mahara, 1998; Marrs & Alley, 2004). This view is echoed in participant interviews in this research, is reflected in the theoretical propositions underpinning the CCNA model, and is a driving force behind the need to formulate judgments about competence that are conducted professionally, and that are accurate and fair. This position also provides rationale as to why *making allowances* should be undertaken with caution, and highlights the tension between ensuring patient safety and fostering student success.

Gate-keeping is influenced by the casualisation of the nursing workforce and poor skill mix. In the current environment, the lack of experienced nurses (Cobden-Grainge & Walker, 2002) to undertake preceptor roles and assess students results in this role being assigned to inexperienced nurses. In some areas in which the participants involved in this research worked, new graduates with less than 12 months post-registration experience were expected to take on this role. Benner, Tanner and Chesla (1996) contend that nurses undertaking peer assessment, and who are also responsible for students, need to have attained a level of practice congruent with what they describe as 'expert'. This, they believe, requires nurses to have had a minimum of two years post-registration experience. Where expert status has not been achieved, variables such as lack of nursing experience, professional immaturity, lack of knowledge of issues associated with performance management, limited experience working with students, and undertaking competency assessment, may impact on the

reliability and validity of assessments, and contribute to a failure of *gate-keeping*. The issue of concern, is that in CCNA, *weighing up* and *judging* rely on *benchmarking* and ability to *construct a picture of competence.* These factors are dependant on the nurse having a wealth of knowledge and practice experience. For new gradates, both of these issues are constrained by limited time working as a registered nurse. If judgments are not moderated with appropriately experienced nurses, this may affect the accuracy of assessment outcomes and result in a student being deemed either competent, or not competent, when they should not be.

When a student does not meet competency requirements, and a fail grade is warranted, managing the students and dealing with the emotional aftermath of a failed assessment can be stressful for nurses. In these situations, nurses can find the conflicting situation of acting as mentor, teacher, support person, and assuming a formal role of assessor difficult to manage (Duffy, 2004). For inexperienced nurses, the pressure associated with completing competency assessment may increase the likelihood of *abdicating* or *defaulting* behaviours described in Chapter 9 (*moderating*). Both of these situations may result in inaccurate assessment outcomes. This poses a risk to public safety, undermines professional standards, and challenges the theoretical propositions underpinning *judging.*

Gate-keeping may also fail as a consequence of over-rationalising practice and making inappropriate allowances. Again, this may result in a student passing competency assessment when they should not. Reasons for these circumstances occurring include

'...people want to be nice, they don't want to hurt the student. They

think this is a nice person and maybe one day they will make a really

good nurse' (I5-117-119).

'You don't want to fail them' (I5-170).

This can lead to what nurses involved in this research termed 'letting them through'. This is where students who should fail are allowed to progress. According to Benner, Tanner and Chesla (1996), this occurs as a result of a conflict between a moral ethic to care, the inherent disposition associated with doing good, and nurses feeling guilty. Feeling guilty or sorry for students often occurs where the relationship between the assessor and the student has become too close and the professional boundaries of the relationship compromised (Duffy, 2004). This undermines the notion of *being professional* and brings into question the reliability and validity of assessment.

Feeling bad and / or guilty may occur as a result of the nurses self-acknowledgement of failure to judge appropriately and indicate acceptance of responsibility (Hunt 1997), or manifest as a result of recognition that failing a student is a bad thing. It acknowledges that, while it is of concern that students do not fail when they should, nurses may also feel bad and guilty about failing students appropriately, and demonstrates that doing good while upholding professional standards and public safety are equally distressing.

While guilt is associated with doing wrong, Hunt (1997) argues that "as a caring profession we should be suspicious of those who feel no guilt or anxiety as they may be really following the procedure to protect themselves and don't really care as much as they should" (p. 525). Where nurses do care, there is a higher likelihood of inner conflict. This may perpetuate failure of *gate-keeping* with students being given further, inappropriate opportunities to demonstrate competence.

> *'People feel sorry for the student. They understand they have problems and just keep on giving people another chance and another chance and excuse sometimes quite unprofessional behaviour' (I1-172-174).*

It was the perception of nurses involved in this research, that *gate-keeping* was more likely to be compromised in situations where nurses knew of students who had to work as well as undertake study, had financial and family hardship, were mature students with dependants trying to get a new start. There was a tendency to give these students more time and latitude to demonstrate competence if they were struggling, as opposed to those students who did not have these demands or students who didn't seem to care. This made it more difficult to fail some students. These issues are also apparent in the property of *worrying*. The interaction between this and feeling guilty perpetuates the likelihood of the failure of *gate-keeping*.

Evidence of unacceptable practice positively influences the occurrence of *gate-keeping*. Here, *gate-keeping* arises in response to student behaviour that is perceived to have transgressed the boundaries of practice. The nature and severity of the

transgression will determine the position that the assessor will hold. In these circumstances, a student may fail competency when they have a sound knowledge base and are technically competent in undertaking nursing procedures. Acting in a manner that is unbecoming of a nurse and transgressing professional boundaries is perceived to outweigh all other attributes.

> *'Its much easier to fail a student when boundaries have been clearly transgressed' (I2-301).*

In this instance, the nurse's perception of unsafe practice positively influences *gate-keeping* and the interaction between *being professional*, *gate-keeping* and *weighing up* become evident. In situations where the student's technical ability is competent, nurses *worry* about the perceived subjective nature of professional boundaries, especially when what is acceptable behaviour and what is not, is not clearly documented in competency standards. Nurses acknowledge that what they perceive as unacceptable may be acceptable for another. As a consequence, they *worry* about failing students and often do not do so unless their judgment can be substantiated, is confirmed by peers, and they perceive that they will be supported if challenged.

8.4.3 Worrying

Worrying is a property of the concept of *being professional*. This interrelates with the properties of *gate-keeping* and *being objective and fair*. *Worrying* highlights the nurse's awareness of *being professional* and their responsibility to ensure that professional standards and public safety are maintained. Nurses involved in this research reported that undertaking competency assessments and making professional

judgments about competence were both stressful and a burden for some nurses. Nurses described *worrying* about the assessment process, and potential outcomes for the students, themselves and the public.

> *'You worry about the fact that whilst they [student] have managed to demonstrate competence in these circumstances - would they do so if you just plonked them in an area that's perhaps a little more acute than another, would they respond in the right way?' (I5-625-629).*

While public safety is considered the bottom line, any potential to disadvantage students caused nurses to *worry* about the professional responsibility associated with making competency assessments. Because of this, nurses *worried* about whether their interpretation of the competencies and their expectations of students were accurate. They *worried* about the judgments that they made and whether these were objective and fair. Lack of knowledge about the expectations of student practice further legitimated concern and resulted in some nurses questioning whether their expectations of students were unrealistic.

Of greatest concern was the *worry* associated with either managing borderline students or failing students. Borderline students were those who nurses perceived as demonstrating both safe and unsafe practice. In these situations, nurses often perceived that there was no clear indicator that students had either met or not met the competencies. Nurses were uncomfortable with indecision and while they felt compelled to pass the student as there was no clear evidence of unsafe practice, they *worried* about passing students who had not clearly demonstrated that they were both

competent and confident in practice. Failing a student caused nurses a great deal of distress. As previously discussed in the property of *gate-keeping*, this was regardless of whether there was clear evidence to support the decision to fail a student or not. Here, there was concern about the implications of making the wrong judgment.

Preceptors befriending the students they worked with complicated the assessment process (Spouse, 2001). In some cases, these relationships extended outside of practice to their personal lives. In these situations, nurses became aware of the hopes and dreams that students had about becoming a nurse. They learnt about the financial difficulties associated with being a student, the need to work as well as study, and the sacrifice that family made to support the student over the three years of their enrolment. They were very aware that making the wrong decision and /or deciding to fail a student may end the student's future career as a nurse.

> *'It's a huge call. You almost have their lives in your hands. It's their future' (I2-975-977).*

> *'Their career is on the line' (I2-152).*

> *'...in the back of my mind it was like – this person has done this long amount of study and with much burden on them – the financial cost...some students have so much invested in a career in nursing' (I2-284-310).*

Nurses recognised that the impact of this would be devastating for the student. They were also aware that for some Maori students, there was considerable pressure to achieve from whanau and elders, who looked forward to students working as nurses in their communities. Pressure to make the right decision was compounded by the nurse's acknowledgment that judgment needed to ensure that professional standards were upheld and that public safety was protected.

> *'It's a hard professional judgment decision to make. You acknowledge*
> *that the students are in a learning role and the strongest way to learn*
> *is often from making mistakes. However, it comes down to safety'*
> *(I2-276-279).*

Conversely, some nurses said they *worried* about students not failing. They had observed practice that they believed was unsafe and yet the nurse responsible for the assessment had passed the student. This raised issues about *gate-keeping*, and *being professional* when poor professional judgment is perceived to have been made. Students who unexpectedly failed an assessment also caused concern.

> *'Something that worries me is the occasion where a student that we*
> *would have expected to pass failed' (I1-835-837).*

This was particularly so for nurse educators when students were undertaking their transition experience prior to sitting NCNZ state final examination and had essentially completed the Bachelor of Nursing. While these situations were rare, they caused concern about previous assessments and cast suspicion on the way in which

competency assessments had been conducted and their reliability. This was especially so where students were considered academically sound and who had previously received glowing reports from practice. It resulted in *worrying* about the assessment process used by others and raised issues related to trust. This issue is detailed in depth in the concept of *trusting* in Chapter 9 (*moderating*).

In situations where student practice was undertaken in small rural communities and where both the student and the preceptor were well known, nurses *worried* about the implications of passing judgments of incompetence and talked about being under pressure from student's families and friends to pass them [students]. These situations were difficult to manage

> *'Because the area we work in is very small, students often go back to areas that they live in, communities that they are well known in and are supported' (I1-909-911).*

> *'Its really difficult. If you stood out there and said this person is not competent and they are going to fail, you're going to end up in major conflict. Because the student is well known the preceptor would support the student passing' (I1-924-928).*

Some nurses said that they *worried* about their own well-being personally and professional. The weight of professional accountability was a burden for some nurses who said that they were so concerned about making the right judgment that they lost sleep over this. Others revealed that the stress associated with this role was such that

they didn't want the responsibility of assessing students. Neary (2001) contends that this is a reason for some nurses being afraid to make adverse comments on assessment forms, or avoiding being involved in assessment. Additionally, concern was expressed about what their colleagues would think if they made the wrong decision. As a result, *being sure* about the students ability and *being professional* in the way that assessments were conducted are important.

When it came to failing students, nurses addressed *worrying* thoughts by *moderating* their professional judgment with peers. This behaviour is described by Gordon, Murphy, Candee and Hiltunen (1994), who argue that *moderating* judgments increases the reliability of decision-making. Confirmation of judgment gave the nurse confidence in making decisions and they worried less about judgments where there was consensus within the peer group. When they decided on making a judgment that was incongruent with other nurse's opinions, it increased their anxiety. In these situations, nurses *worried* about whether their professional standing would be affected if they did not fail or pass a students when this was expected. In some cases nurses reported that when this happened, they *worried* about their knowledge base, practice, and ability to make professional judgments. Some nurses said that where there was overwhelming pressure to make a decision that was contrary to their belief, they conceded by putting their own opinion aside and accepting what others wanted and expected. These circumstances resulted in them either *relying on others'* judgment or *abdicating* their responsibility for precepting and assessing students. These issues are explored in further detail in the concept *defaulting* in Chapter 9 (*moderating*). Feeling overwhelmed is also associated with workload. The stress of managing a full patient load, teaching, and assessing students is not often

acknowledged by management and is a contributor to preceptors becoming burnt out and choosing not to be involved with students (Fontaine & Pullon, 2000; Spouse, 2001).

'Preceptors get over burdened...they may need a break. One of the nurses that I spoke to said to me "I really want to be a good preceptor but the energy it takes on top of a huge workload is too much"(I2-749-753).

While the negative effects of *worrying* were prominent in interviews, it also emerged that this behaviour was a catalyst for evoking professional behaviour that encouraged nurses to take action to ensure that their decisions are accurate, fair, reliable and professionally acceptable. This was achieved by *moderating* judgment, consulting, and clarifying the expectations for student practice and competency standards where necessary. These actions provided some security in *knowing* that judgments were made appropriately and the issues related to *gate-keeping* and professional accountability were addressed. It also highlights the tension associated with failing students and *being sure* and *being professional* when making competency judgments.

8.5. Being sure

As another facet of the category *judging,* this concept addresses issues related to the nurse's confidence in their judgment and explains factors that promote or hinder *knowing*, how they know that competence has been demonstrated, the type of evidence that nurses perceive as being reliable, and how they *determine the bottom line* when they are not sure. In doing so, the properties in this concept interact with

being aware and *being professional*, and are interconnected with the categories *gathering*, *weighing up* and *moderating*.

8.5.1 Knowing

Carper (1978) argues that there is a common body of knowledge underpinning nursing *knowing* and ways of doing in practice, and that nurses use this to guide their clinical judgment. Having knowledge implies *knowing* when and how to act, and as a result of this knowledge, practice will be safe. With regard to competency assessment, it is assumed that nurses know what competence is, they have the knowledge to make judgments about whether practice is safe, and possess the skill to manage situations where unsafe practice is identified. While nurses in this research acknowledged this, they identified that *knowing* how to assess and manage care for patients, and *knowing* how to assess the competence of peers, and manage this was different. They were not always confident about making judgments about the practice of others stating

> *'while we learn about patient health problems, how to assess and manage these, we are not taught how to assess the practice of peers and are not well prepared for the role of performance managing staff. This includes overseeing the practice development of students and assessing competence'* (I6-207-209).

While assessing competence and formulating judgments about student practice utilises similar assessment skills as those used by nurses to assess the health status of patients, it is not the same. Learning to assess competence takes time and requires substantial nursing knowledge, practice experience and preparation, including

knowledge of the principals of adult teaching, learning and assessment (Spouse, 2001). It also requires experience working with students and the development of professional confidence.

According to Lober Aquilino (1997), knowledge is a necessary component of diagnostic reasoning. In competency assessment, the accuracy of judgment is reliant on this and being able to use this appropriately. Knowledge serves as rationale for nursing practice and explains nurses thinking about phenomena. Many writers have explored the underpinnings of nursing knowledge and the concept of *knowing* (Benner, 1984; Benner, et al., 1996; Carper, 1978). Others have examined theoretical perspectives of decision-making and their relevance to practice (Harbison, 2001; Thompson, 1999). Thompson (1999) drew upon Hammond's Cognitive Continuum Theory to explore the quality of nursing decisions and adapted this to develop a six tiered model explaining clinical decision-making in nursing, and how this might be used in research. Harbison (2001) acknowledges the virtues of Thompson's model claiming that there is a need for nurses to cease "debating the merits of descriptive models in decision making" (p. 126), and adopt a middle ground position. In doing so, the logical calculating theories of those who support a cognitivist approach to explain decision making (Bowles, 2000; Buckingham & Adams, 2000; Jones, 1988; Loving, 1993; Offredy, 1998) and those who draw on the nurse's understanding of a situation and the sense of salience associated with expert practice (Benner,1984; Benner & Tanner, 1987; Benner, Tanner & Chesla, 1996) can be combined. This includes notions of expert clinical reasoning and the place of intuition in clinical decision-making. Taking an eclectic approach and acknowledging the contribution of

differing perspectives may assist nurses in understanding this aspect of practice more clearly (Harbison, 2001).

Commonalities were found between the literature concerning knowledge and processes underpinning clinical reasoning identified above, and concepts in this research. It emerged that in CCNA, nurses use a wide range of forms of knowledge, and that there is some congruence between these and the Thompson continuum. Considering a situation wholistically and using differing forms of knowledge as benchmarks, appears to assist nurses to make the best judgment possible given the circumstances, and may have some bearing on the nurse's ability to predict outcomes (Mahara, 1998). This includes outcomes of student actions. It draws attention to the importance that knowledge and *knowing* has on the nurse's ability to perceive the practice development needs in *teaching competence,* and actions required when *letting out the leash.* The form of knowledge used to aid comparative analysis is dependent on the quality of evidence arising from *gathering,* and reflects the quality of judgments and the probability of nurses having confidence in these. This is illustrated in Figure 8.4 (page 237) which has been adapted from ideas underpinning the work of Thompson (1999), and has been modified to reflect and explain this aspect of *knowing*.

In the Figure 8.4 Modes 1 - 4 illustrate forms of knowledge that nurses draw on to facilitate *judging*. These are presented on a continuum that demonstrates where each of these aspects of *knowing* are situated in relation to the strength of evidence of practice, the complexity of comparative analysis, the quality of judgments, and the probability of the nurse having confidence in these.

Mode 1 is *knowing* assisted by scientific knowledge (Evidenced Based Practice - EBP). This is considered to provide the highest quality of decision-making, as it is perceived to be objective, *knowing* which has been validated, and which is valued by others as being scientific (French, 2002; Retsas, 2000). This form of knowledge is underpinned by detailed facts that "may not conform to best practice" (Spouse, 2001, p. 513). While these facts assist *benchmarking,* the level of cognitive effort required to interpret salient points and relate these to practice standards, complicate the analysis of practice. As previously discussed in *weighing up*, this influences the level of abstraction. It has an impact on the ability of the nurse to make a connection between the practice observed and the benchmark, and the interpretation of this. The greater the number of facts to be considered, the greater the degree of complexity of comparative analysis.
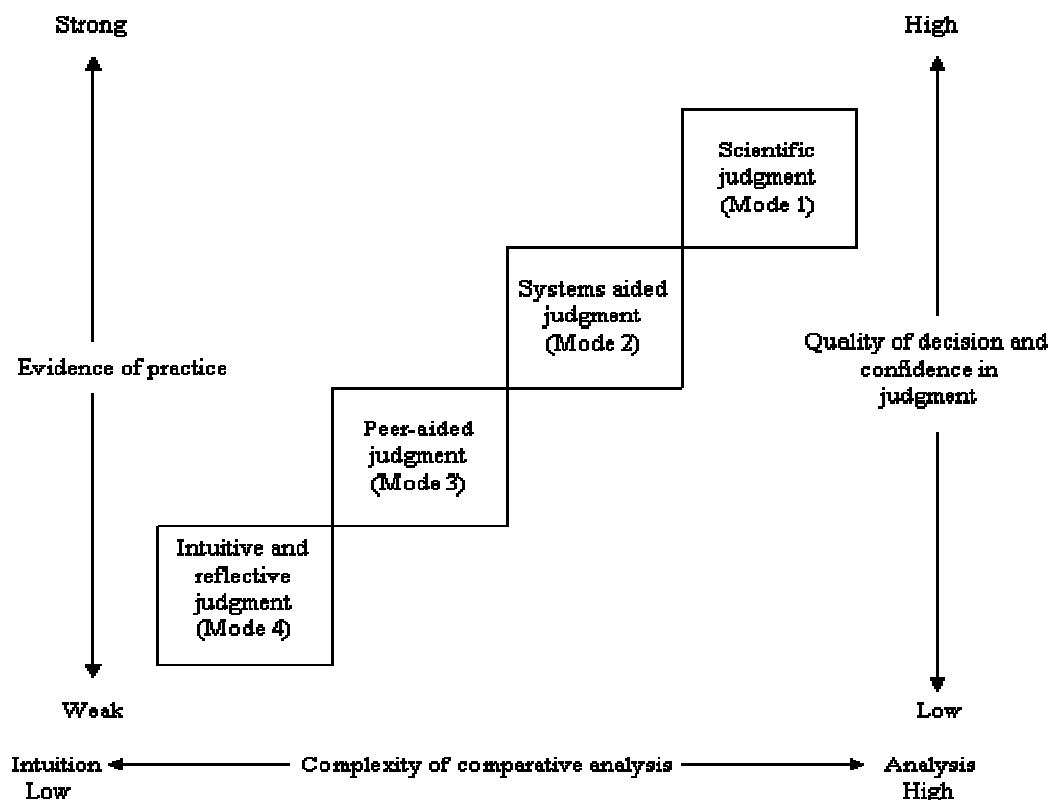
Figure 8.4 Forms of knowing, complexity of analysis and confidence in Judgment - Adapted from the work of Thompson (1999).

Mode 2 is *knowing* assisted by systems designed to aid the formulation of competency judgments. It includes methods of assessing competency such as competency checklists and the use of standards of practice. These guide *knowing* arising from nursing knowledge and experience in decision-making. The direct connection between knowledge, system aided tools, observed practice and assessment criteria, makes it more helpful and easier to use than *knowing* arising from scientific studies. This is because while research is used by nurses, it may not be directly related to nursing practice (Spouse, 2001), and while EBP is the catch cry of the moment, the degree to which nurses are engaging in research, and utilising findings in practice, is still developing (French, 2002). The complexity of comparative analysis however remains high due to factors influencing levels of abstraction that have been previously discussed in *weighing up* (Chapter 7). Consequently, the level of confidence in *judging* using this mode remains relatively high.

Mode 3 consists of peer-aided ways of *knowing*. It relies on using the knowledge of other nurses to confirm expectations of practice and benchmark student performance (Gordon, Murphy, Candee & Hiltunen, 1994). This form of *knowing* is most commonly used to moderate the nurse's perceptions of competence and is employed when engaged in *moderating* activities. It is helpful in situation where nurses are unable to formulate judgments, and it positively influences the reliability of competency assessment (Mahara, 1998). Peer-aided *knowing* is helpful to nurses learning to assess competence, and in the long term may decrease the incidence of *confirming, relying on others*, *abdicating* and *defaulting* behaviours, which are discussed in *moderating* (Chapter 9). Confirmation from the group increases the

likelihood of confidence in *judging* (Gordon, Murphy, Candee, & Hiltunen, 1994).

The nature of perception reflects the level of abstraction and as a result this form of

knowing requires less cognitive effort.

Mode 4 consists of *knowing* that arises from intuitive and reflective practice. Nurses

value these qualities. Hansten and Washburn (2000) describe intuition as clinical

sensing that is based on knowledge and experience, that is not always supported by

logical evidence. Reflective practice described earlier in this chapter, attracts similar

criticism about its ability to provide reliable evidence (Wilkinson, 1999). As both

intuition and reflection are concepts that are difficult to quantify, they are perceived

as being unreliable and unscientific. As a result, these qualities are often denigrated

(Truman, 2003). Nurses involved in this research expressed concerns related to this.

While notions associated with the lack of objectivity have been discussed in the

concept *being professional*, Figure 8.4 further reinforces the nurse's perceptions

about the use of intuition and reflection in competency assessment. It should,

however, not be overlooked that these are important tools in enhancing clinical

judgment (Benner, Tanner & Chesla, 1996; McCutcheon & Pincombe, 2001;

Truman, 2003). While concern is acknowledged, nurses involved in this research

revealed that intuition informed *judging* when *gathering* and *weighing up* are

compromised, and both intuition and *reflecting* are important factors in *weighing up*

and *judging* when resolving indeterminacy. Where the outcomes of Mode 4 are

validated by peers, and the nurse's intuition and reflective thoughts confirmed, there

is a higher likelihood that the nurse will have confidence in the competency

judgments.

The nurse's use of these forms of knowledge is situation dependant. In *judging,* the nurse's use of knowledge may move up and down the continuum, incorporating forms of knowledge ranging from the use of research and EBP, to using intuition and reflection. Nurses may use one or more methods to inform *knowing* at any given time (Winch, Creedy, & Chaboyer, 2002). For example, a nurse may use EBP to benchmark a systems-aided approach to determining competence, employ peer-aided *knowing* and reflection to confirm perception and formulate a judgment in relation to one aspect of practice. According to Mahara (1998), an eclectic approach, such as described here, adds depth of analysis increases the persuasiveness of the findings, and that "decisions about the quality of a student's practice are more trustworthy" (p. 1342). While it is acknowledged that further research is required, this model proposes that nurses use multiple methods to test hypotheses, confirm or dispel perceptions of competence, and suggests that a middle ground approach advocated by Thompson (1999) is being utilised. It may also provide evidence of nurses using triangulation. Redfern, Norman, Calman, Watson, and Murrells (2002), state that while the validity of the few examples of multi-method approaches cited in the literature as using triangulation have not been tested, "assessors can reduce bias from variation in judgments made by different assessors" by engaging "witness triangulation" (p. 68). This involves seeking the opinion of other assessors, clinical colleagues and the student, and entails nurses engaging in the same behaviours described in *moderating* in this research. Here, triangulation is an outcome of convergence between the different perspectives. Where this exists, it is believed to provide evidence of student competence (Redfern, Norman, Calman, Watson, & Murrells, 2002), by substantiating notions of competence, and assisting in the formulation of professional judgments about this. The model may also explain how

knowledge embedded in benchmarks is *compared* and used to manage the complexity of making judgments that utilise a wholistic approach. These notions and issues are explored further in Chapter 10.

As illustrated in Figure 8.4, there is a direct correlation between the perceived strength of the evidence of performance, mode of *knowing* and confidence in *judging*. Nurses with substantial knowledge and practice experience have more resources to draw upon than nurses who are newly graduated. This may explain why expert nurses appear to manage a wholistic approach of assessing competence more effectively; and produce more reliable decisions than inexperienced nurses.

The degree of sense of *knowing* influences the degree of confidence the nurse has in a decision. This is further facilitated by undertaking preparation for the role of assessor, having a clear understanding of the competency framework and criteria used to assess students (including expectations of performance and level), and experience working with and assessing students (Neary, 1999; 2001; Spouse, 2001).

Neary (2001) and Davies (1993) contend that the effectiveness of the assessment system is related to the quality of both mentor and assessor preparation. Nurses involved in this research openly disclosed concerns about preceptors involved in assessment not *knowing* competencies and / or having inadequate preparation for assessing competence. These factors and others listed in Table 8.2 (page 242) are perceived to contribute to compromising *knowing,* and *judging*. Concerns about this inter-relate with the properties of *being objective and fair* and *worrying* and result in questions being raised about the reliability of assessment decisions. This is also

perceived to contribute to nurses *losing faith* in the current competency assessment processes, and their ability to fulfill their role. These issues are explored further in the concept of *trusting* (Chapter 9).

Table 8.2 Factors perpetuating failure of knowing in the assessment competence

Lack of knowledge of the competency framework and assessment criteria

Lack of knowledge about practice expectations of students (including level)

Lack of practice opportunities for the student to demonstrate competence

Insufficient time working alongside the student

Short length of clinical placement

Insufficient evidence and / or feedback from other nurses

Conflicting perception about the student performance

Inexperience of the assessor

One or more of these factors may influence the nurse's confidence and ability to formulate a judgment. The greater the number of factors, the more likely the occurrence of not *knowing*. The greater the perception of not *knowing,* the more likely nurses would engage in either *gathering* to address the perceived need for information and / or *moderating*. Here, *moderating* is a method of *gathering* information and a means of checking the trustworthiness of expectations and perception about competence. Issues related to these activities are discussed in detail in Chapters 6 (*gathering*) and 9 (*moderating*).

As previously identified, of greatest concern was the perception that some nurses had difficulty understanding the competencies embedded in the competency assessment framework and / or do not know these.

'Preceptors working with students are not au fait with the competency standards...they are not...That's a reasonable statement...they are definitely not' (I1-694-697).

'I think the majority of preceptors don't really know what the criteria are – although they will have heard of competencies – they won't really be assessing the student against those competencies' (I5-245-247).

This raises questions about reliability. Educators are aware of their dependence on preceptors.

'Educators rely on clinicians for information. If the nurse doesn't know the competencies then feedback will be flawed' (I8-103-104).

In order to address concerns and achieve reliability of competency assessment outcomes, nurses involved in this research believed that it was imperative that only nurses who have undergone specialist training in competency assessment should precept students. The preceptorship programmes currently offered are not considered to be an adequate means of preparing nurses for undertaking competency assessments.

'...they [assessors & preceptors] need to have knowledge and experience to know what is acceptable. You couldn't get just any nurse off the floor doing some assessments' (I5-552-554).

In addition to experience, having a clear understanding of the competency standards and expectations of practice is essential for rigour in comparative evaluation (Rankin, 1989; Sartori, 1991; Vartiainen, 2002). This is also considered to be an important factor in promoting *knowing*. With *knowing,* there is a perception that *being aware*, *being professional* and *being su*re will contribute to more accurate and reliable assessments of competence.

Neary (2001) contends that difficulties contributing to nurses not *knowing* or understanding the competency standards included wording of standards, and the difficulties associated with making connections between the broad statements related to domains of practice and nursing tasks. It raised questions about how nurses know what they are supposed to be assessing.

> *'The competency framework is not clearly defined in a way that clinicians can relate to' (I4-191).*

> *'Identifying competency behaviors in practice are difficult'(I1-104).*

The absence of an explanation of how to use the assessment form, and the limited information detailing the level of performance expected from some schools of nursing, is considered to be unhelpful for nurses, who have a limited understanding and / or are struggling with the assessment process.

> *'With regard to expectations of level of practice, we rely heavily on the descriptions in the competency assessment form' (I1-529-530).*

In some areas of practice, nurses addressed uncertainty and facilitated *knowing* and understanding of competence by developing their own competency assessment form. This often took the form of a task checklist. According to Van der Vleuten, Norman and De Graaf (1991), checklists may be better than complex assessment forms because they define clearly what is expected, and in doing so provide more reliable feedback regarding student performance. Tzeng (2004) concurs with this position, arguing that nurses perceive a greater relationship between skills and on-the-job tasks than competency standards. Nurses involved in practice revealed that when they used their own checklist, they were then faced with the problem of matching the tasks with the competency form. Unless a nurse educator was available to interpret the competencies, nurses revealed that, if the student had met their perceived level of practice, they ticked all the boxes on the school's form as 'competent' whether or not they knew that the students had met these.

> *'We're judging them against our own standards in our own unit. We've produced our own student workbook' (I4-649-655).*

A strategy for determining whether a student's practice meets the level required, is to apply the benchmark of 'a predictable day'.

> *'The predictable day...without any undue circumstances, you've got an easy-ish set of patients, not many problems and then you get to the end of the shift and all the work is done. The patients are cared for and well looked after' (I2-205-207).*

The predicable day is also described by Wissmann, Hauck and Clawson (2002) and is used as a means of assessing leadership. In this research, nurses reported that they used the benchmark of a predictable day as a means of determining the degree to which students could manage a workload and for taking into account the challenges of the practice environment. Assessment of this contributed to decisions about whether or not *making allowances* for practice that did not meet the assessor's individual standards was appropriate. This aspect of assisting *knowing* interacts with *teaching competence, creating opportunities* and *letting out the leash*. Knowledge arising from assessment of the predictable day was helpful for *identifying learning needs* and is used to guide *teaching competence* previously discussed in *gathering* (Chapter 6).

While deliberate consideration and reflection is used to consider the student's practice by some nurses, others reported that they often knew if a student's practice aligned with competency standards, and whether intervention is required, without really thinking about this.

> *'Yes, you just seem to know. It's quite personal really, but …you*
> *just seem to pick up on how they are doing with their competencies'*
> *(I2-614-615).*

This demonstrates that while strategies such as the predictable day can be used to calculate student performance, intuitive perceptions contribute to *knowing* and contribute to the assessment of competence.

Record keeping and continuity of preceptors are other factors contributing to the successfulness of *knowing*. Where there are multiple nurses involved with the student and a lack of documentation and / or coordinated feedback, *gathering* is compromised and results in assessors experiencing difficulty *knowing* if students have demonstrated competence to practice.

Who knows and who should make judgments about competence is another aspect of *knowing* that emerged from interviews. Questions about who holds the knowledge, and who is qualified to make a judgment about competence were asked and revealed divergent views. Practitioners questioned the involvement of educators in decision-making and believed that educators did not have up-to-date clinical experience. Because of this, they questioned the educators nursing knowledge and ability to make competency judgments. Educators are very aware that they are dependant on preceptors for information and guidance in clinical matters. They are also aware that their knowledge of the programme, preparing students and the assessment requirements (including competency standards) is greater than nurses in practice. Differing perspectives between nurses on this point contribute to conflict between nurses in education and practice, and has an influence on *establishing relationships* (*gathering* Chapter 6) and *trusting* (*moderating* Chapter 9). Adopting a collaborative approach would utilise the expertise of both parties, address concerns about the reliability of assessment by strengthening the comparative method, and contribute to the formulation of accurate judgment.

Where *knowing* is compromised, *being sure* is undermined and the theoretical propositions underpinning *judging* are challenged. The consequence of this, and

indeterminacy, induces *worrying* about making the right decision, *being professional, being objective and fair*, and issues regarding upholding professional standards and maintaining public safety. Where nurses have to make a decision, they let their intuition guide them and applied what they termed the bottom line.

8.5.2 Determining the bottom line

Determining the bottom line is evidence of nurses utilising a Mode 4 form of knowledge to make decisions. While questions related to the validity and reliability of using this method are acknowledged, and challenge the concept of *being sure,* nurses also respect this form of *knowing* stating

> *'Intuition or gut feelings are sometimes how you know. You know something does or doesn't fit' (I8-78-80).*

> *'Expert nurses can't always articulate what they do. Even though they say it's intuition, it's not…it's expertise that has become so ingrained. They call it gut feelings…Sometimes you can sort of figure out in the first 5 minutes of someone coming in how they are going to do. Its like when I used to work in theatre, Within the first few moments of assessing the patient you would think watch out for this one, something's going to go wrong and something does. It's a gut feeling It's the unknown expertise' (I6-287-303).*

Stokes (2005), in her study about accountability and public safety, suggests that the lack of clear definitions about what constitutes safe or unsafe practice, is the impetus

for nurses posing hypothetical scenarios to assist moral reasoning and the formulation of professional judgments about practice competence. Stokes argues that the bottom line becomes the "litmus test to evaluate professional opinion" (p. 125). There are three primary themes underpinning perceptions of the bottom line; these are 'me and mine', 'perceptions about the student' and 'what other nurses think'. These present as questions that nurses reflect on to aid the decision making process.

'Me and mine' is about basing judgment on whether the nurse has confidence in the student's ability to practice in a safe and caring manner. The question nurses asked themselves and others is 'would I have this person look after me and my family'?

> *'The bottom line is that this individual [student] is looking after a member of your family and it might be a child or your partner. Would you be happy for them – hand on heart – to look after them...unless you can whole heartedly say "yes I am fine with that", then you have issues with their competence' (I1-247-254).*

The view 'me and mine' is influenced by nurses perceptions of the student, whether they are liked, and the nurse's individual beliefs and values. Information about the student's private life and perceptions of this may have a bearing on the decisions.

> *'I thought you are not in very good charge of your life and you want to become in charge of patients. When they come with these tremendous demands on their time and energy, are they doing nursing a service and are they doing patients a service, by giving what's left over? It's an issue*

I really struggle with, but the bottom line is that our safety, our neighbour's, our family's is in the hands of these people, and that needs to be taken really seriously and sometimes its not possible no matter how much you wish to do it [pass a student], but you can't do it' (I2-315-322).

The second basis for *determining the bottom line,* is perceptions of the student as a work colleague (peer). This may positively or negatively influenced determining the bottom line. If the student is not trusted and the nurse has concerns about work ethic and reliability, this may sway judging and result in the student failing an assessment.

'My outlook always is – they may well be working along side us, so are we doing them or us any favours by letting them through knowing that they'll either A) fail anyway or B) cause a lot of grief?' (I5-124-127).

'It's peer appraisal and it's subjective…If this nurse came back on the ward tomorrow would you be happy to work with them?' (I1-717-722).

'I was writing up an assessment and I thought why am I writing all of this when the comment from her preceptor summed it up. She said "she can come back and work here anytime. We will have her as a new graduate, we would love to have her as a new graduate". It was like please let us have her as a new graduate. Then you write down all this stuff in the assessment where as the real bottom line was that

other registered nurses, soon to be her colleagues, said yes. That

situation is the bottom line really' (I2-244-257).

Conversely, while evidence about competency to practice may not be available, if the student is liked, this may result in *making allowances*. In this situation, *making allowances* occurs as a result of lack of evidence and not the student's performance. Another perception that may present at this point and influence doubt when *judging* is

'…well if they [student] have got this far, they must be ok'(I6-221).

The third means of *determining the bottom line* bases judgment on the perceptions of other nurses. The ideas that others have about the student's capability and competence to practice are used to assist the formulation of a judgment. Engaging in this practice is congruent with the notion of comparative reflection promoted by Jay and Johnson (2001). This aspect of *being sure* interacts with the other concepts embedded in *judging* and with the category of *moderating* and uses a combination of peer aided and intuitive and reflective modes of *knowing* to assist decision-making.

'…if there are any doubts we definitely check with others'

(I6-180-182).

D*etermining the bottom line* helps the nurse to determine whether the student's practice is perceived to meet and uphold professional standards of practice. It supports the theoretical proposition of ensuring these, and that public safety is

maintained. The bottom line, however, does not appear to reflect the application of any universal principles of moral theory, and while *determining the bottom line* is helpful in the absence of clear definitions of safe or unsafe practice, it highlights the subjectivity of competency assessment, and provides some explanation as to why nurses perceive the need for *being professional* and *being sure*.

The degree in which *determining the bottom line* is employed correlates with the level of determinacy. This is demonstrated in Figure 8.4 and illustrates that where evidence is weak, there is an inclination to use more intuitive and reflective means of *knowing* to determine competence. It also highlights that where judgments are based on Mode 4 ways of *knowing,* nurses are aware of the subjective nature of assessment, and may have less confidence in decisions based on intuition.

8.6 Conclusion

The category *judging* explains how evidence of student practice, that has been *gathered* and *weighed up,* is used to inform and make judgments about practice competence. Nurses use comparative analysis to identify contradictions in practice to distinguish factors that may adversely influence or prejudice judgments and facilitate the process of *judging*. This highlights issues associated with the conflicting roles of mentor, teacher and assessor. It exposes the tension between *gate-keeping* and promoting moral agency. The properties embedded in the concepts of *being aware*, *being professional* and *being sure* that comprise *judging,* work to address these and the concerns regarding the subjective nature of decision-making. While some nurses may make judgments independently, others moderate judgments by *comparing* their perceptions with those of other nurses. This aspect of CCNA works to address issues

related to the reliability and validity of *judging* and highlights the interactive nature of CCNA. Like *judging,* the concepts embedded in *moderating* operate to uphold the theoretical propositions of ensuring that professional standards and public safety are safeguarded. Moderating is the fourth phase of CCNA and is described in detail in the following chapter.

Chapter 9: Moderating

9.1 Introduction

The category *'Moderating'* represents the final stage of the Critical Comparative Nursing Assessment (CCNA) model. Where *moderating* occurs in this stage of the process of assessing and determining competence, nurses focus on validating with peers the accuracy of their decisions about practice competence. This chapter commences by outlining the theoretical propositions of *moderating* professional judgment, and the relationship of these to the BSPP of *comparing* to determine competence. This brings the reader's attention to the dynamic nature of CCNA, which up until this point in this thesis has been presented in a linear format.

The second part of the chapter will present the concepts of *truth seeking*, *judging truth, trusting* and *defaulting* that comprise the category *moderating,* and will explore the context in which these and their embedded properties occur. It will explain how nurses facilitate the process of *moderating* by engaging in *truth seeking* and *judging truth* to ensure that their professional judgment is objective and fair, to manage conflicting opinion and to confirm decisions about competence. The influence of working relationships between nurses and conditions that facilitate, or impede the process of *moderating*, including the consequences of failing to make a decision or nurses removing themselves from the assessment process are also discussed. How the concepts and the properties embedded within this category and the influence these have on the outcome of the assessment of student competence will complete the chapter.

9.2 Moderating, comparing and determining competence

The category *moderating* describes what nurses in this study perceived to be an integral component of the competency decision-making process. Activities in this phase focus on validating judgment. *Moderating* is a strategy implemented to ensure that judgments are objective, fair, accurate and consistent with professional standards and the ideologies regarding practice requirements and competence that the nurse's peers have. Consequently this strategy sits beside the concepts and properties in *judging* and works with these to facilitate a rigorous decision-making process. Here, nurses work collaboratively to make the best use of experience and wisdom (Benner, 1984). This involves utilising the processes of *gathering*, *weighing up* and *judging* previously described in Chapters 6, 7 and 8. The focus of *moderating*, however, is diverted from the assessment of student practice to validating the nurse's own expectations and perceptions of practice.

Thomas, Wearing and Bennett (1991) claim that nurses debias decisions by continually testing and assessing the results of decisions. In CCNA, this is achieved by *critically comparing* how closely aligned the nurse's professional judgment is to that of their peers. Like all other aspects of the CCNA model, the BSPP of *comparing* provides the means of determining this. *Moderating* professional judgment, by *comparing* opinions about practice expectations in this way, is seen as a means to ensure that consistency in decision-making is achieved, judgments are objective and fair, standards are maintained, students completing nursing programmes are safe, and the nurse's responsibility to ensure public safety is upheld.

As previously discussed, *comparing* results in the identification of similarities and differences in practice expectations. Contradictions arising from comparison draw attention to the points of difference in perceptions about competence. The occurrence of contradiction, coupled with the weight of professional responsibility, and the compulsion to ensure assessments are accurate and fair, causes the nurse to revisit their judgment. *Reflecting* on this, and by employing the strategies previously detailed in the concepts *being aware*, *being professional* and *being sure*, the nurse takes action to resolve the contradiction by *moderating*. This involves engaging *truth seeking*, *judging truth,* and *trusting*. The outcome of this confirms or disconfirms perceptions informing decisions about the student's practice competence. By engaging in this process, nurses are able to determine whether their assessment of student practice is both fair and accurate and is congruent with that of other nurses. Judgments that align closely with that of others signify accuracy in perception and expectations related to practice standards and competence. In these circumstances, nurses feel more confident that their assessment is accurate and that the professional judgment made is valid.

While lack of similarity in expectations may highlight potential inaccuracy in decision-making, validating decisions about competence using *critical comparison* provides a means of realising practice expectations for students. The identification of difference provides a means of clarifying the expectations of student practice and allows for adjustment to be made to decisions. This ensures that decisions are consistent with professional expectations and are objective and fair. As a result *moderating* professional judgment is a consequence of *comparing*.

While *moderating* addresses different issues to *judging*, the theoretical propositions underpinning it echo those discussed previously. These are that nurses have a professional responsibility to ensure that standards of practice are maintained in order to ensure public safety and that decisions about practice competence need to be accurate and reliable. These and the concepts and properties embed in the category *moderating* are illustrated in Figure 9.1.
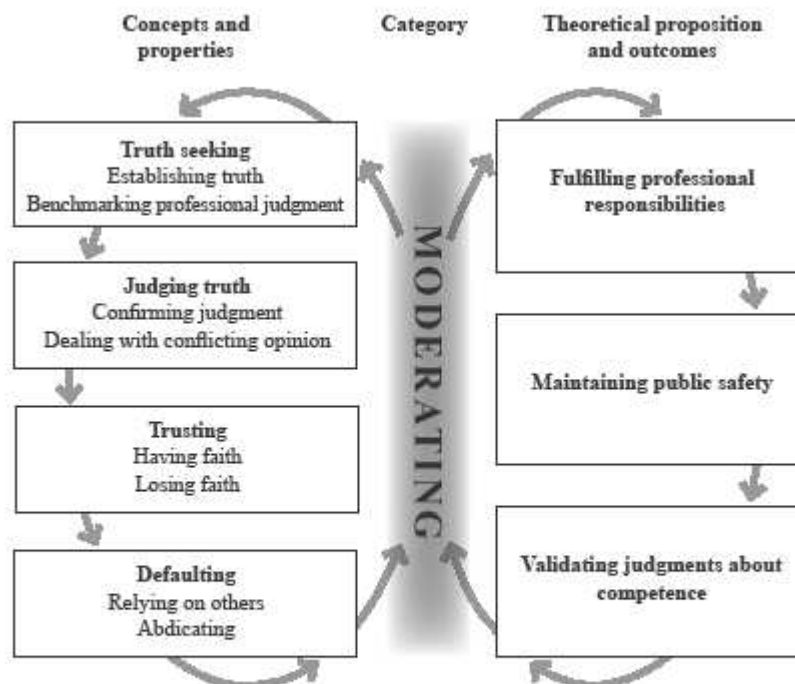
Figure 9.1 Interrelation ship between concepts and properties of moderating and theoretical propositions

On first evaluation, the commonality between the theoretical propositions underpinning *moderating* and those of other categories in CCNA may be misinterpreted as repetition. Three explanations account for the occurrence of this situation. These are the use of *moderating* activities utilised by nurses during the

various phases of CCNA (which have been identified in previous chapters), the existence of differing levels in which moderating occurs, and the interactive and cyclic nature of the CCNA model.

The two levels at which *moderating* occurs are in relation to *gathering* and determining practice development needs, and when nurses uses *moderating* as an internal regulatory process for confirming judgment. In relation to the first level nurses working along side students are constantly *moderating* (checking) perceptions arising as a result of *gathering, weighing up* and *judging*. When combined, these strategies assist the nurses to manage the supervision and teaching requirements of the student on a day-to-day basis. By acting as a feedback mechanism, *moderating* mediates between the activities in the other categories. This is of particular importance for the *determination of learning needs* and *letting out the leash*. When *moderating* becomes an internal regulatory process for nurses making decisions about student competence, the focus changes from acting as a feedback mechanism when managing student performance, to an internal system for arbitrating judgment. The focus of *moderating* moves from being external to internal with the nurses concentrating on validating judgments with peers. While the purpose of *moderating* is refocused in this phase of CCNA, the underlying principles remain the same.

The complexity of CCNA and the way in which the nurse uses the strategies in the model also accounts for what appears to be a repetitive process It is important to remember that interaction results in the presentation of differing facets of the phenomena. These are dependant on which strategies are employed at which point in the model. While this issue has been apparent in other phases (categories) of the model, it becomes more pronounced at this point. The reason for this is that the

model has been presented in a linear way to facilitate its understanding. While moderating is the last phase (category) to be presented, it is important to note that CCNA does not have an end, other than to say, a decision about competence will need to be made at some stage. This is usually when the formal summative practical assessment is undertaken. Until this time the processes inherent in CCNA interact as a dynamic model with the nurse's thoughts and actions working in unison to manage decision-making as moments of practice unfold, as they work with the student to teach and assess competence. This highlights the interactive and cyclic nature of the model which is illustrated in Figure 9.2.
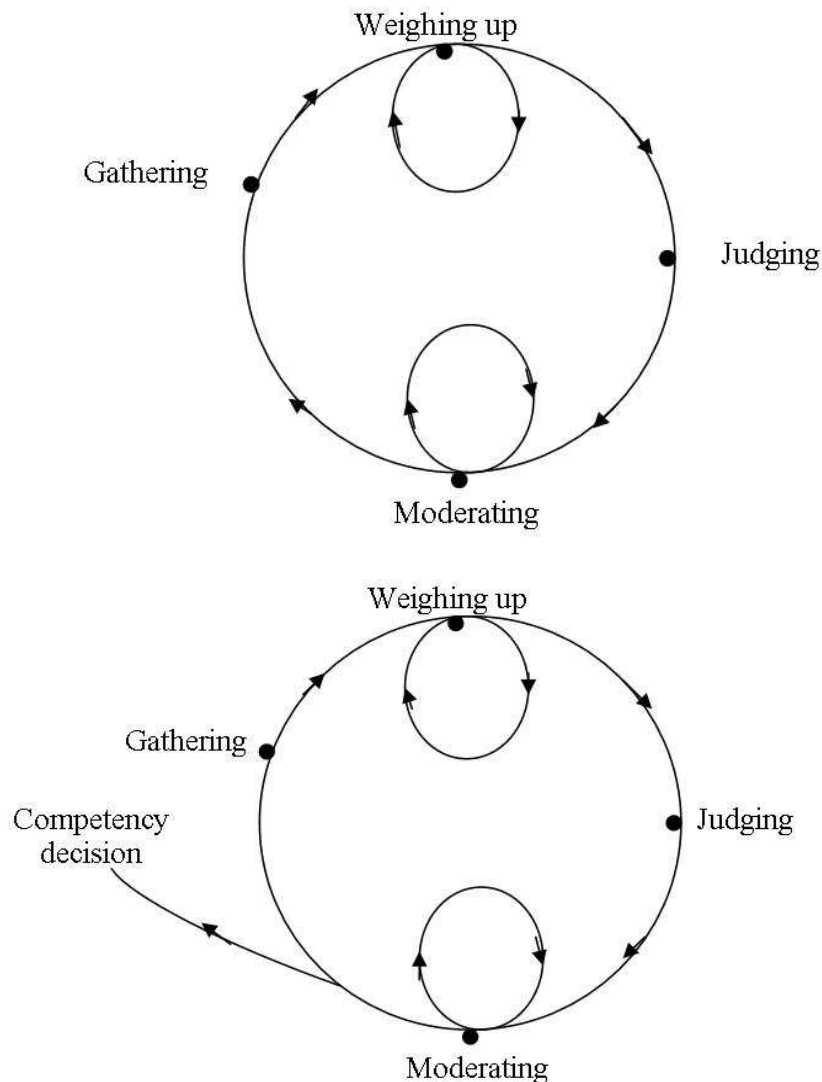
Figure 9.2 The cyclic nature of CCNA

In order for *moderating* to be successful, professional relationships with colleagues are vital. The influence relationships have on the process of *moderating* and the outcome of the assessment of competence is discussed in the concepts embedded in this category, which include *truth seeking*, *judging truth, trusting* and *defaulting*. The relationship of moderating to other aspects of CCNA is illustrated in Figure 9.3
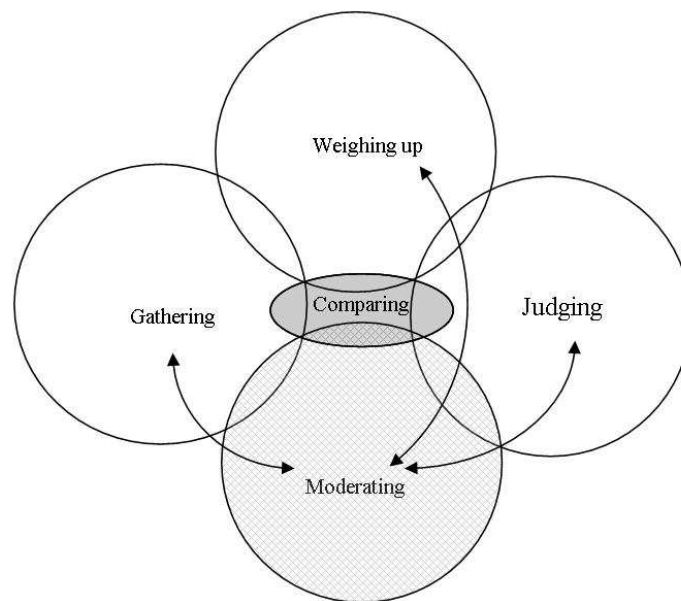
Figure 9.3 The relationship of moderating to other categories in the CNN model

9.3 Truth seeking

A truth (fact) is an idea or principal that is generally accepted to be true rather than imagined or made up (Soanes & Stevenson, 2003). For nurses, a truth is a fact that is accepted by the community of nursing as being true, and is a reflection of accepted nursing knowledge. Truth is also associated with honesty. As public safety is entrusted to nurses, there is a professional obligation to provide an honest assessment based on fact (truth). Here, honesty protects the integrity of professional judgment and ensures that judgments are reliable and trustworthy.

The concept *truth seeking* is about protecting public safety and ensuring that decisions about practice competence are valid and fair. *Truth seeking* is a strategy used by nurses to *moderate* (validate) their professional judgment. This behaviour is a form of *gathering* and is driven by the need to obtain information, which will establish the truth about the student's practice and determine if professional judgments made about competence are valid. Engaging in *truth seeking* is an open acknowledgement of uncertainty. It is about having the courage and desire for the best knowledge on which to make judgments, even if this fails to support, or undermines, one's preconceptions, beliefs or self-interests. It is about having concern, accepting professional responsibility, and caring that fair and reliable decisions are made.

When engaged in *truth seeking* nurses mimic member-checking activity associated with research methods. This provides a means of consensual validation of opinion through seeking the opinion of colleagues (Brykczynski, 1999), and is a means of debiasing decisions (Thomas, Wearing & Bennett, 1991). Here, validation of opinion within the group grants approval and discharges the professional responsibility for *gate-keeping.*

Professionalism and honesty underpin the notion of *truth seeking* and involve facing one's own biases, prejudices, stereotyping, and egocentric tendencies. Aspects of *being objective and fair* described in the category *judging* (Chapter 8) apply. In order to be objective and fair, to establish and judge the truthfulness of their decisions, nurses need to be open minded and display tolerance for divergent views. This requires the nurse to be self-monitoring for possible bias. When *moderating*

professional judgment, being aware (alert) and acknowledging the opinions of others incorporates the notion of reasonableness (Profetto–McGrath, Hesketh, Lang & Estabrooks, 2003). Here, the nurse considers the fairness of the contribution and the prudence of accepting it. As an important aspect of the *moderating* process *truth seeking* is demonstrated when the outcome of *such* suggests that professional judgment requires adjustment.

During *truth seeking,* the *gathering* strategies described in the concept *collecting the evidence* (Chapter 6), become more focused. This is especially so when summative assessment is undertaken. Previously *truth seeking* and *moderating* ideas about practice have focused on checking out the student's ability to perform individual tasks. These now change to moderating the nurse's judgments about overall performance and focus on achievement of practice standards and *benchmarking.*

Truth seeking is a continuous process that occurs throughout the student's clinical placement and assists in formulating and validating decisions about practice competence. *Gathering* information about student practice, and *benchmarking* are the two primary strategies used by nurses engaging in the activity of *truth seeking* and *establishing truth.* Nurses who consult their peers and *compare* opinions to establish the accuracy of their professional judgment demonstrate these behaviors.

> *'I value the opinion of others...and have gone to colleagues when unsure' (I7-11).*

'Asking others is about finding out the truth, it's being objective and fair'

(I6-145-146).

'I often throw it back to [name] or I would talk to others...where I have

been concerned and then pass that concern onto others...they say "oh

yes I thought that" (I1-591-593).

By taking decisions to the group and obtaining approval, that is, engaging in *truth seeking* nurses are able to establish whether their decisions are accurate. Truth is confirmed when the group affirms that conclusions are accurate and fair. Where this is so, congruency with the professional expectations of nurses instills confidence in decision-making. The process of gathering multiple perspectives improves reasoning and assists in the formulation of judgment (Benner, Tanner & Chelsa, 1996).

9.3.1. Establishing truth

When formulating and *moderating* professional judgments, nurses employ *establishing truth* and *judging truth* strategies to ensure that trustworthy decisions are made and to discharge their responsibility for *gate-keeping* and maintaining public safety. The implications for both the student and public if the assessment is inaccurate was acknowledged by the participants in this research and reinforced the need for assessment that was objective and fair, and a truthful representation of the student's practice ability. For nurses who are inexperienced or not sure, engaging in *truth seeking* and *establishing truth* provides a means for *moderating* judgment, ensuring objectivity and fairness, and professional obligations for maintaining public

safety are upheld. A key element in *establishing truth* is the nurses ability to think critically.

Critical thinking is a corner stone of clinical reasoning (Paul & Heaslip, 1995). It challenges action, decisions and judgments arising from assumptions, and promotes new ways of *knowing*. Critical thinking challenges practice, which may uncritically accept ways of doing passed down from a time no longer relevant to the current reality of practice. In this way, critical thinking provides a means for nurses to manage the process of *establishing truth* and *moderating* decisions. It requires context sensitivity, and awareness of stereotyping. In order to successfully moderate their professional judgment, nurses need to accept, unconditionally, the contribution of other nurses about student competence. They need to see the world the way other nurses see it and engage in perspective thinking. This requires tolerance for ambiguity, the ability to accept multiple interpretations of the same situation, and being alert to assumptions and premature ultimata. Perspective thinking assists the nurse to recognise that assumptions can be coloured by the individual beliefs and values that others hold (Paul & Heaslip, 1995).

Utilising critical thinking to moderate professional judgment involves nurses consciously *reflecting* on the evidence that supports their judgment, their nursing knowledge, an understanding of practice standards and competency requirements, and *critically comparing* this to the opinion and responses offered by others nurses. In this way, *truth seeking* assists *benchmarking* and facilitates the formulation of conclusions that bring about a point of realisation where they know whether their judgment is accurate or not.

9.3.2 Benchmarking professional judgment

Practice benchmarks denote standards, which identify behaviours that are considered indicators of professional and safe practice. When practice is *compared* against an appropriate practice benchmark, the process of *comparing* similarities and differences provides a means of measuring the quality of the practice behaviour being assessed. The closer the behaviour is to the *benchmark,* the more likely the behaviour will be accepted as meeting the standard.

The process of *benchmarking* previously discussed in Chapter 7 is employed in this phase of the CCNA process. The difference however, is that when *moderating* competency decisions, nurses extend professional *benchmarks* to include the professional judgment of other nurses. When professional judgment is used as a *benchmark,* the nurse *gathering* the professional opinion of peers uses this as a measure to determine points of difference. Moderating professional judgment and clarifying points of difference with others is a means of checking the consistency in expectations.

> *'You identify an issue and then you have to sit down and think why do I think like that...am I the only person thinking the student is not competent. You talk to other people and get some advice...and you discuss it' (I2-182-186).*

> *'We definitely check. You'd go to me, I'd go to you, we go 'shall we, shan't we' and you'd say 'what's the good points and what's the bad points' (I6- 179-182).*

The identification of points of difference highlight whether the professional judgment made by the assessing nurse is congruent with that of other nurses. Lack of difference and consistency in judgment is an indicator of truth and confirms a positive decision about competence.

The level of experience of the nurse charged with the responsibility of making the final decision about competence influences the degree to which *truth seeking* behaviour is engaged in and their ability to *benchmark* successfully. For nurses new to assessing competence, discussing practice and *gathering* the opinion of others provides a means for developing an understanding of the parameters and expectations of student practice and learning about competence, and the processes involved when formally assessing this. One nurse described this stating:

> *'I discuss the level of practice with others to check my judgment. When others question this I reflect on this. Over time, you learn to gauge the appropriateness of your expectations' (I8-63-67).*

When the nurse is an experienced assessor, who knows the competency standards and expectations of student practice, and is confident that their decision is accurate, *truth seeking* and *benchmarking* are generally minimal, or in some cases, not engaged in. One nurse described confidence in assessing and making judgments about competence as

'We gather information, we consider it and then we judge and if we go

yes or its an absolute no we don't refer to anyone else, we go yep, yes

pass or no no fail, (I6-176-180).

This is an example of a nurse practicing at a competent level. They have a good grasp of the situation and expectations associated with the assessment. Unlike inexperienced nurses (beginners), they are not overwhelmed and are content to let their experience emotions and intuition guide them (Benner et al., 1996). Conversely, where nurses have little practice experience, including experience of competency assessment, and are not confident, or where there is any doubt in decision-making, there is a tendency to engage in a higher degree of *truth seeking* and *benchmarking* to assist in making and *moderating* decisions. In this situation, multiple opinions are sought before coming to a final decision, if this can be made.

If the nurse completing the assessment is a visitor, for example a visiting nurse educator, *establishing relationships* (Chapter 6) with preceptors and *gathering* information are vital to the *moderating* process. Lack of continuity of preceptors may impede *truth seeking* strategies and opportunities to benchmark. In these circumstances, there is no one nurse who can moderate perceptions or contribute all the information that is necessary to make a decision about competence.

'Assessments are quite difficult to do . You are not with the student all the

time' (I5- 39).

Difficulties *moderating* are further compounded where *truth seeking* involves gathering professional judgment from new graduates to *benchmark* judgment. Here, those who have limited practice and assessment experience often question their ability to make a worthy contribution to the assessment and *rely on others*. The culture of the practice area may also influence the *truth seeking* process. If the culture is not supportive of students and nurses do not accept responsibility for precepting students or making decisions about competence, there are limited avenues for *gathering* information. The consequence of these situations arising is that nurses completing competency assessments may not be completely informed about the student's practice abilities and limitations. Inadequate information on which to benchmark professional judgment may result in nurses passing students on the basis that there is a lack of evidence, which would lead them to question the students' ability to meet practice standards and their appraisal of this.

9.4 Judging truth

Differing expectations of practice may influence decisions about competence and affect the nurse's ability to *judge truth*. As this is acknowledged by nurses, it is common for them to engage in *moderating* to confirm decisions they have made concerning the practice competence of students.

Formulating an objective picture and *judging truth* is connected with the category of *judging* (Chapter 8). When engaged in *moderating, judging* is about the ability to recognise similarities and differences in opinion, detect judgments that are not congruent with accepted standards and confirm decisions about competence. While the activity of *establishing truth* activity involves this. It is important to note that the

primary concern of *establishing truth* is with *gathering* information. Both of these aspects of *truth seeking* involve considering differing points of view (Maynard, 1996).

If the outcome of *benchmarking* professional judgment with peers results in the identification of difference, this does not necessarily mean that the judgment made by the assessing nurse is inaccurate, or that the judgment of others will be accepted. *Judging truth* includes the ability of the nurse to determine if a fair and accurate opinion has been shared. Nurses are aware that perceptions of student ability could be influenced by a number of issues. For example, how well the student is known and liked. This may influence people's perception of truth and the quality of the feedback *gathered* during *truth seeking*. One nurse explained:

> *'Where the student is well known...and liked managing conflicting*
>
> *opinion and judging the accuracy of feedback or truth is difficult'*
>
> *(I1-930-932).*

In these circumstances, nurses engage in further *truth seeking* activity to gain multiple perspectives and formulate an objective picture of the student's ability and *judge truth* and debias opinion.

> *'A lot of it is a judgment thing and sometimes taking the word of the*
>
> *preceptor and what there understanding is, is a bit of a risk...you have*
>
> *got preceptors who feel sorry for them [students] or are a bit lenient or*

they say "yeah they sort of did that, but we want them to pass" so I

wonder if we are getting a full judgment' (I5-31-37).

In order to determine truth, nurses *weigh up* information *gathered* over the period of the students placement. Similarities in the stories conveyed during this period are *compared* with the final judgments provided by peers. Here, the process of critical thinking explained earlier in *establishing truth* is employed. If stories are not consistent, nurses may question the validity of judgments and how truthfully these represent the students practice competence. This process provides a useful means for formulating and *moderating* professional judgment

Where there have been circumstances outside of the control of the student, for example, there have been minimal learning experiences or opportunities to demonstrate competence, nurses assessing competence factor this information into the decision making process. Here factors associated with *making allowances* in Chapter 8 (*judging*) are considered alongside the judgment of peers. The outcome may be that the nurse decides in favor of the evidence to hand and moderates the judgment of others by discounting situations considered unfair or outside the control of the student. Similarly, circumstances such as perceived personality clash between student and preceptor are carefully weighed before *confirming* a judgment about competence.

'You have a chat with the preceptors and you get the run down. You

wonder are they being objective and or constructive or are you only

getting the negative...you don't always get a true picture' (I1 -540-43).

In these circumstances, it is common for nurses to engage in further *truth seeking* activity by *gathering* professional judgment from a number of other nurses to check the accuracy of their misgivings. In situations where the nurse believes there is sufficient evidence to support their decision, the nurse will discount the judgment of others in favour of their own. If other nurses become aware that their professional judgment has been discounted, it may affect interprofessional trust. This is explored further in the property *losing faith*.

9.4.1 Confirming judgment

Confirming judgment is a property of *judging truth*. According to Saul (2001) people need to justify their opinion and actions. *Moderating* reasoning is a strategy engaged in by nurses to protect against error and presents as c*onfirming judgment.* This requires application of a type of thinking that includes ethics, memory, common sense, knowledge, critical thinking and intuition. When engaging this strategy, nurses are not only making comparative judgments to ensure that the end product of *judging* competence is accurate, they are checking their own reasoning. In this sense, *confirming judgment* in nursing is a facet of moral agency and caring as described by Benner et al., (1996). Here, the underpinning philosophy of caring in nursing influences the assessment. Nurses care about their young (students). They also take seriously their responsibility to care for the public and uphold standards to ensure public safety. In order to arrive at a point of rational deduction, and professional judgment, that the nurse is confident is congruent with the philosophy underpinning practice (caring) nurses *confirm* professional judgment.

Confirmation from other nurses that decisions about competence are accurate, objective and fair is achieved by *comparing* opinions. The more evidence that confirms the judgment held by the nurse, the more confident the nurse is that the decision made is professionally accepted and reflects expectations.

> *'I think its good to consult. I don't think its good to do it [assessment] on your own. I think you need to communicate your findings with someone else to help you establish that you are actually right and that based on the evidence you have gathered that you have made the right decision'* *(I1-585-590).*

In this respect, *confirming judgment* is important in making a final decision and instilling confidence in the decision-making process.

Confirming is influenced by the number of affirmations that corroborate with the opinion held by the nurse making the decision about competence. The voice of many is considered to hold more authority than that of one (Harbison, 2001). In situations where the nurse's opinion is not confirmed and sufficient doubt has been raised, it is more likely that the nurse assessing will adjust their judgment so that this reflects the opinion of others.

> *'Nurses seem to go with the majority view… I would say look you must be right'* *(I6-142-144.)*

Nurses who do not possess the level of critical analysis required to distinguish facts that confirm or disconfirm ideas about competence may not be able to make sense of the issues, successfully *weigh* these up, *judge truth* and *confirm judgments* about competence. The ability to confirm is influenced by the individual nurse's knowledge of practice standards, expectations for student practice, and their practice knowledge base and experience. This influences the nurse's ability to deal with conflicting opinions and make a decision.

9.4.2 Dealing with conflicting opinions

The ability to *judge truth* and formulate accurate decisions about the student's practice competence requires a sound knowledge base and clear understanding of competency standards and expectations for students. It is also about being able to manage situations, where differing opinion is held, and being able to filter salient points to establish the truth about the student's ability. This may become difficult when, during the process of *moderating* judgment, there is conflicting opinion or colleagues do not provide complete or honest feedback. For example:

> *'The problem is that when there are concerns and you feed them back to the preceptors that work with them [student] and they [preceptor] continue to give glowing reports' (I1-606-609).*

Individual nurses have differing opinions about practice. This can be attributed to individual beliefs and values, their education and previous experience. What is accepted practice for one nurse may not be accepted for another. It is not uncommon that nurses working with a student will have different expectations and therefore

come to differing conclusions about the competence of student. For the nurse, *gathering* the professional judgment of other nurses, an ability to *weigh up* opinions and synthesise responses is critical if conflicting opinion exists. Resolving conflicting opinion and arriving at an objective and fair decision requires critical thinking and the deployment of strategies to *establish* and *judge truth.*

Moderating provides nurses with an opportunity to question their thinking and that of others. Externalising thoughts arising from critical thinking clarifies issues, assists in developing knowledge and formulating of clinical judgment (Facione & Facione, 1996). Where nurses are able to successfully synthesise the information *gathered* and *make sense* of the diversity of opinion, *moderating* results in decisions that confirm expectations of professional practice, and assists nurses to resolve conflicting opinions.

Dealing with conflicting opinions may confuse nurses who have little experience in the assessment of competence, or are unclear about practice expectations of students. This may impact on the assessment outcome. If expectations are too high, students may fail a competency assessment when they ought not to. Conversely, it is possible that students may pass the assessment when they ought not to, if expectations are too low. Here, issues related to *judging truth* and *trusting* colleagues are important.

For some nurses, the task of managing the assessment process and the pressure to make the right decision can be overwhelming. They may not be able to make a decision and will rely on the opinion of others, *trusting* this is correct. In these cases, nurses "follow the advice of more experienced clinicians" (Dreyfus & Dreyfus, 1986,

p. 67). In an attempt to resolve conflicting professional opinion and reach a judgment, this strategy may be employed even though there is disagreement. If the nurse is unable to accept the opinion of others and *dealing with conflicting opinion* remains unresolved, ineffective *moderating* results. The nurse may resolve this by *abdicating* responsibility for making decisions. This aspect of the process of *moderating* is further explored in the concepts of *trusting* and *defaulting*.

9.5 Trusting

Like truth, the notion of trust is perceived by nurses involved in this research as being central to the process of *moderating*. Ensuring that honest and trustworthy decisions are made about student competence is considered paramount if valid conclusions are to be formulated and public safety upheld. This means that the process of making and *moderating* decisions needs to be safe and reliable. The concept *trusting* is a condition that influences the process of *moderating*. This is affected by the nature of the working relationships with peers. The properties of *having faith* and *losing faith* in professional judgment, and *trusting* the outcome of decisions and the way in which they are managed, influences the process of *moderating* and the outcome of the assessment.

9.5.1 Having faith

Having faith in one's professional judgment influences the *moderating* process in that those nurses who are confident that their professional judgment is accurate, are less likely to need to *confirm* their judgment and are therefore less likely to engage in *truth seeking* activities or to *moderate* decisions about competence. Conversely, where nurses are unsure, they seek out the opinion of others in whom they have faith.

Professional standing and issues related to trust, influence who a nurse might consult to *moderate* decisions. Nurses are more likely to *gather* the professional judgment of those they esteem and consider role models. This includes nurses with identified practice expertise and who are experienced in undertaking student competency assessments.

> *You know your professional judgment is accurate when you go to someone you know and respect. What they say is valuable. Alternatively, seek out someone in a position that indicates the kind of knowledge you need to check your thinking'* (I8-63-67).

In this instance, the nurse acknowledges the experience of others and has faith that this will inform or confirm professional judgments that are accurate.

Trusting others and *having faith* that opinion will be considered professionally and that the integrity of the nurse engaging in *moderating* will be upheld, further influences who might be consulted to *benchmark* decisions. Feeling safe influences whose opinion may be gathered. Whilst working alongside colleagues, nurses identify peers who are supportive, will respect differing opinion and, where judgment requires adjustment, manage this in a respectful way, which safeguards the integrity of the nurses engaging in *truth seeking*.

'I go to someone else who's got more experience and I say "It's supposed to be objective and I don't have the wealth of experience to be able to deal with these borderline ones...come and reassure me...help me' (I3-288-293).

Consequently, nurses who are less likely to ridicule thoughts and ideas if these are not consistent with the expectations of others, who are friendly and supportive are more likely to be chosen by inexperienced assessors to moderate professional judgment when they are uncertain.

Making assumptions and / or *mis-judging* the level of expertise of the colleague chosen to moderate decisions may result in an error of judgment. If the colleague's level of knowledge and expertise does not reflect the generally accepted expectation of nurses, *benchmarking* will not provide an accurate measure from which to *compare* judgments about competence. Where *moderating* involves *gathering* multiple opinions, the error associated with these circumstances may become apparent. Issues related to reliability of judgments made by others and the trustworthiness of these become obvious. This may result in nurses *losing faith* in peers, and subsequently influence who they consult in the future.

9.5.2 Losing faith

Trusting professional judgment and *losing faith* presents primarily in three ways. These are trust in self, trust in others, and interprofessional trust. Firstly, nurses may lose faith and trust in their own ability to make judgments when engaged in

moderating, and where *confirming* results recognise that their professional judgment is not consistent with that of others.

> *'When everyone says something different you don't trust your own gut feelings'(I6-144).*

Accepting the limitations of inexperience in competency assessment can be difficult for nurses. This may undermine their confidence and lead them to question their ability to formulate accurate judgments. If situations like this are not managed well, nurses may choose to decline responsibility for teaching and assessing students and abdicate their role in doing so.

Secondly, *losing faith* may occur when nurses offering their opinion become aware that, despite their contribution, decisions are made that are contrary to this and the resulting decision is not what they expected. As a consequence, nurses may perceive that their professional judgment is not valued, question the validity of the assessment, and lose faith in this.

A primary influence causing *losing faith* is the result of nurses not being honest about their opinions of student competence, *relying on others* to fail students, and nurses who are assessing believing they have been mislead. Here, the evidence (information) *gathered* is either untrue and results in conflicting opinions, or the process of *benchmarking* judgments is flawed due to dishonest opinion being shared (Norman, Watson, Murrells, Calman & Redfern, 2002). This scenario is most likely to arise where nurses are unable to bring themselves to voice an opinion that will

result in the student being deemed incompetent. Issues discussed in Chapter 8 related to *judging* and *failing students* become prominent here.

Assessors who have been mislead by dishonest feedback that has resulted in a student passing an assessment and being deemed competent may feel betrayed by their colleagues. The realisation that an inaccurate decision has been made often arises as a result of comments that do not support the opinions previously shared. For example, a nurse is told that the student shouldn't have passed or is questioned about why the student is still in the nursing programme.

Where dishonest or incomplete feedback is given, CCNA is flawed, the processes of *gathering, benchmarking* and *judging* employed in *moderating* are undermined and result in inaccurate decision-making.   In these circumstances, the process of assessment, its outcome and resulting judgment are in direct conflict with the theoretical propositions underpinning *moderating*. In these circumstances a student may be deemed competent when they are not, and as a potential new graduate may pose a risk to public safety.

Discovering that dishonest or incomplete feedback has been given, and professional judgment mislead, resulting in inaccurate assessment occurs more often after the assessment of competence has been undertaken. The student's placement is completed and the opportunity to address practice deficits is no longer available.

> *'You are on your way out of the ward on the last day of the student's*
>
> *placement and having just completed and passed the student's*

assessment of competence, the preceptor nabs you and says "things have

been terrible". Until this point "things have been fine" (I1-182-184).

This causes internal turmoil for the nurse who completed the competency assessment. The timing of the realisation precludes the opportunity to address new information, *moderate* judgment and adjust the outcome of the assessment (if appropriate). As a consequence of these circumstances, the nurse may *lose faith* in colleagues and, having identified unreliable sources, choose not to use these in the future. This may impact on the process of *gathering* outlined in Chapter 6, and affect working relationships. Further to this, nurses may *lose faith* in their ability to manage the assessment process and abdicate future responsibility to undertake assessment. This notion is explored further in the concept of *defaulting*.

Finally, nurses are not prepared during their education for either assessing competence or managing staff performance. Both skills are required when assessing student competence. If the assessment process is too difficult for the nurse working with the student, and they cannot bring themselves to pass judgment that would result in the students failing, the nurse in practice *trusts* colleagues in nursing education to fail students who are not safe. This would uphold the theoretical propositions underpinning the category of *moderating*. Here, *trusting* as a condition of *moderating* is only successful when nurses communicate honestly.

The consequences of dishonest feedback, and the impact this can have on both the assessment process and *trusting* relationships between nursing education and practice is significant. Interprofessional distrust resulting in nurses *losing faith* in colleagues,

threatens professional relationships, causes tension, and impacts on the process of assessment and its outcome. Where trust is broken, relationships and confidence in the assessment process are threatened (Norman, Watson, Murrells, Calman & Redfern, 2002). In this research, issues related to *trusting* revealed that nursing practice and education had differing perceptions and concerns about the assessment of competence.

For nurses in clinical practice, *loss of faith* in the assessment of competence was attributed to nurses not understanding how students they considered unsafe remain in nursing programmes and/or successfully completed these. Lack of understanding about academic processes, feedback about assessment outcomes, and explanation about these, results in the perception that they are not being heard or that nurse educators do not value their professional judgment. As a result, education is perceived as not upholding the standards required of practice, and the profession and students are "stereotyped by the nursing service as being less competent than they actually are" (Benner, 1984, p. 186). These circumstances can result in disillusionment and manifest in the development of loss of trust in nursing education.

Nurse educators are particularly aware of their dependency on *gathering* as a strategy for collecting information to guide decisions. This is especially so when they have limited direct one-to-one time working with students. Nurses in education are *trusting* colleagues in practice to provide honest feedback. This is a condition that influences the *weighing up* process of *benchmarking* and the formulation of accurate professional judgment about practice competence. Nurse educators *lose faith* when they perceive that they are let down by practice colleagues, who fail to take

responsibility for contributing to student education, abdicate responsibility for assessing competence or do not provide honest feedback about student capability. The perception that nursing education is blamed for producing poor quality graduates, and fails to uphold responsibility as professional gate-keepers by letting students pass, influences relationships and manifests in resentment. This is especially so when nurse educators witness practice standards that are less than ideal, and where students are exposed to practice that is believed to be less than exemplary. Further to this, situations where practice colleagues judge students on the basis of 'once bad always bad', where learning as a process is not acknowledged, or where students are bullied lead to disillusionment and *losing faith* for nurse educators. The underlying theme of *losing faith* is the same for both nursing practice and education. This manifests in loss of trust in colleagues and damages working relationships.

Establishing relationships described in *gathering* (Chapter 6) are vital to *moderating* professional judgment, and resulting decisions support the theoretical propositions of the category *moderating*. Where *trusting* relationships are not developed, there is the potential for nurses to distrust the professional judgment of others. Questions about currency of practice and the credibility of educators assessing competence, or perceptions that practice standards are poor and there is a lack of good practice role models, devalues the contribution both parties have in growing the profession's young. This is another facet of horizontal violence (Giddings, 2005; Hurley, 2006) within the profession, which is not helpful, undermines professional credibility and raises questions about the validity and reliability of the assessment of student practice competence.

Failure to work together and develop *trusting* working relationships undermines the *moderating* strategies utilised by nurses. Lack of trust undermines the concepts of *gathering*, *weighing up*, *judging* and *moderating* encapsulated within CCNA. The validity of the BSPP of *comparing* is undermined by incomplete or inaccurate evidence and may result in inaccurate judgments being formulated. Without trust, nurses cannot have confidence in the professional judgment of others, the outcome of *moderating* their professional judgment, or the assessment of competence. The consequences of this are that the professional standards espoused by nursing cannot be upheld nor public safety assured if students are not accurately assessed and graduates from nursing programme are not safe. These circumstances highlight the need for nurses to trust their judgment, trust the assessment process, work together, trust and support each other to ensure that the process of CCNA, and its underpinning theoretical propositions, are upheld.

9.6 Defaulting

To default is to fail to meet responsibility (Soanes & Stevenson, 2003). In determining competence, *defaulting* is when nurses fail to fufill their professional responsibility to assess competence or make judgments about this. The property *defaulting* is interconnected with *trusting* and may present as a consequence of lack of trust in self or others.

Defaulting that occurs as a result of a lack of trust in self, is an outcome or consequence of unsuccessful *weighing up, judging* and *moderating.* It occurs when the nurse is unable to trust their professional judgment, and is unable to come to a decision that they are comfortable with, or able to manage. This situation is caused

by two factors. Firstly, where there is an inability to *critically compare.* This is most likely influenced by inadequate *gathering,* knowledge and experience. Here, there is insufficient information from which to make a judgment, and a decision about the student's competence is unable to be reached. Secondly, *defaulting* may result when the nurses feel they are unable to manage the assessment process. This is especially so when the need arises to performance manage student behaviour and address practice deficiencies. Nurses may find the conflicting roles of preceptor, mentor and that of assessor difficult to manage. As a consequence, they may not feel comfortable telling students that their practice does not meet the standard required, or they may wish to be disassociated from this. Where this occurs, nurses may choose to *abdicate* their role in the decision making process, and may *rely on others* to inform the students about practice deficits and make decisions about competence for them. This is especially so when related to failing students.

9.6.1 Relying on others

Relying on others is a property of *defaulting*. This presents as either failure to engage in *moderating,* where responsibility for taking a role in the assessment process occurs, or when others are relied on to make decisions when the assessor fails to do so. The incidence of *relying on others* occurring may be influenced by lack of confidence, and believing there are more experienced nurses whose knowledge is greater and who have more experience in the assessment of competence.

Working relationships and trust influence the degree in which *relying on others* occurs. In some cases, inexperienced nurses may feel that it is inappropriate or unsafe to challenge the opinion of senior staff, and are accepting of what they

perceive as "a more experienced view" (Benner, Tanner & Chesla, 1996, p. 67). Some nurses may change their judgment because of this, or may manage the situation by using *abdication* as a strategy to withdraw from the assessment process by making no comment.

> *'If the nurse's personality is not strong enough or the nurse is not confident they can have their professional judgment swayed...especially if an authority figure or role model's opinion is different' (I8-19-21).*

> *'I've been in a situation where colleagues have said "ok they're [Student] not passing and then the students says "yes I am" and the staff on the ward go "yes they are" and you get overruled...what do you do in that situation. It's the pressure to default...some of them are saying you are wrong. Whether it's the pressure or not having confidence in your own decision...you change your mind because the support for your professional judgment isn't there' (I6-205-261).*

When situations like this occur, it is not likely that the assessing nurse will go against the professional judgment of others. To do so would go against the notion of shared knowledge that is accepted as truth (Saul, 2001). Further to this, they are not likely to place themselves in a position where their judgment is questioned by others and their professional standing devalued. In order to resolve *conflicting opinion*, nurses may feel they have little choice but to put aside their judgment and *rely on others,* even though this may not be accurate.

Relying on others may also be caused by an inability to make a decision, because they do not know the competency standards, have insufficient experience assessing competence, or lack confidence in their own ability. In this situation, *relying on others* is a strategy used by nurses to resolve being unable to make a decision or who have difficulty failing students.

> *'Preceptors feel uncomfortable failing students so they let them through*
>
> *and the next preceptor thinks, well they've got this far so they must be ok,*
>
> *we'll let them through' (I3-304-307).*

In these circumstances, nurses are *relying on others* by *trusting* that the judgments made by others are accurate. Instead of making decisions based on the situation at hand, the decisions are based on assumption. The consequence of making assumptions is that decisions may not be based on truth and there is a higher risk of error (Saul, 2001).

9.6.2 Abdicating

Like *relying on others, abdicating* is a property of *defaulting* and presents in three ways. Firstly this behavior may be a reflection of not *knowing* associated with *judging* (Chapter 8). If this is the case, *abdicating* occurs before *moderating* takes place. Here, the nurse has failed to make a judgment and does not complete the process of CCNA. Others are not consulted, and there is no judgment or outcome to the assessment.

Secondly, *abdicating* may occur as a consequence of having discovered that previous judgment was based on dishonest feedback. As previously identified in the concept of *trusting,* nurses may become disillusioned with the experience of assessing competence. Because of this they may choose to *abdicate* their responsibility when assessment of student competence is required in the future.

The third and most prominent explanation for *abdicating* was found to be when nurses in practice had no interest in being part of the education or assessment of students. The perception was that it was the sole responsibility of education to govern all practice issues related to students. This included teaching, assessment and support. Nurses who held this perception were perceived by their peers to have *abdicated* their role in nurturing the young of the profession. These nurses were identified as being less likely to volunteer for preceptor roles, and while they may not take responsibility for this, the act of *abdication* influenced the decision making of those who did. Here, *moderating* is impeded by their reluctance to be involved with students and support other nurses *gathering* information and making competency decisions.

> *'When you ask some of the preceptors for feedback and to contribute to summative evaluation, some of them don't want to touch it' (I3-275-276).*

Abdicating responsibility for students may occur when nurses fear that their knowledge and professional judgment will be questioned. Here, *abdicating* responsibility to contribute to the assessment process occurs as a result of concern that an incident may arise at a later date. It is feared that in these circumstances, an

investigation will question the judgment of the nurse who had previously determined the student competent.

'Being responsible for assessment is serious stuff. Its quite daunting' *(I5-852).*

'...to be accountable for somebody's knowledge is quite frightening and daunting. Suddenly you are accountable for every single thing that comes out of your mouth' (I4-1030-1035).

'When people realise their name is on something they don't want to have anything to do with it' (I3- 279).

In these circumstances, *abdicating* is associated with accountability, the professional standing of the nurse and how others perceived their competence. Issues associated with *worrying* about making the right decision previously discussed in Chapter 8 (*judging*) are prominent here. Further to this, *abdicating* may result in resentment by others that colleagues are not sharing the load and taking responsibility. This may affect working relationships and contribute to an atmosphere where trust or confidence in colleagues is questioned.

9.7 Conclusion

Moderating explains how nurses validate their professional judgment. As the final phase of the CCNA model, this chapter has presented how the category *moderating* and the imbedded concepts of *truth seeking, judging truth, trusting* and *defaulting*

influence professional judgment, or provide strategies to ensure that decisions about the practice competence of students are accurate, fair and reliable and meet professional standards. Utilising *critical comparison* to *moderate* professional judgment provides a means of resolving uncertainty and allows professional judgment to be adjusted, and where needed, aligned with professional standards. This process provides a means for nurses to learn competence and develop expertise in assessing, ensure standards are maintained, ensure that the assessment of students is valid and reliable, and that the professional responsibility of nurses to safeguard pubic safety is discharged.

The following chapter *Critical Comparative Analysis* explains the how *critical comparison* underpins the theory of CCNA. This explains the significance of *critical comparison* and its role in the assessment of competence. The categories of *gathering, weighing up, judging* and *moderating* are drawn together to explain how nurses make professional judgments and determine competency to practice.

Chapter 10: Critical comparative analysis

10. 1 Introduction

Comparing emerged as the BSPP in this research. Throughout the thesis, this has been described as the means for assisting the nurse to determine competence and resolve the problem of not *knowing* or using the competency framework to conduct assessment. The notion of *comparing,* and the relationship this has on determining competence, has been discussed in each phase of the CCNA process. This suggests a constructivist approach is used by nurses to make sense of, and assess everyday moments of nursing practice. This chapter argues that parallels can be drawn between the principles employed in comparative evaluation and the methods underpinning the CCNA model. In doing so, CCNA fulfils the requirements for both comparative and evaluation research, and explains how nurses evaluate practice and assess competence. The notion of *comparing*, its purpose and function, and how, as a critical act, it facilitates the identification of contradictions in practice, that the nurse then uses to guide decision-making, will be discussed in more depth. This chapter will explain the principles of comparative evaluation, and demonstrate their relationship to CCNA. Factors that influence critical comparative analysis, issues related to validity and reliability of assessment, and the implications for using this means of determining competence in nursing will also be discussed.

10.2 Critical comparison and contradiction in CCNA

Ragin (1989) asserts "thinking without comparison is unthinkable" (p. 1). This draws attention to the cognitive processes inherent in making comparison, and the role that critical thinking has in determining similarity and difference. *Critical comparison* and the determination of *contradiction* arising from the outcomes of assessing similarity and difference are crucial to determine competence in CCNA.

Thinking underpinning *critical comparison* calls on attributes such as analyticity, systematicity, self-confidence, inquisitiveness, cognitive maturity, and clinical reasoning (Paul & Heaslip, 1995; Profetto - McGrath et al., 2003).

Analyticity is the ability of the assessor to analyse features of practice and apply reason. This includes the ability to think with a degree of accuracy (Facione & Facione, 1996). Systematicity is the ability to focus and apply diligence to solving problems at all levels of complexity. It is about the organisation of thought, the logical way in which reasoning is applied, and the ability to employ deductive and inductive thinking processes. Deductive methods of reasoning are used to consider notions associated with facts, certainty, validity, truth, argument and conclusions, and are about deriving absolute proof and certainty. Inductive methods consider the diversity of facts, take into account learning from experience, probability, generalisations, questions and involve reasoning, where absolute certainty is not derived and conclusions are established on probability (Profetto - McGrath et al., 2003). The importance of this to *critical comparison* and the identification of *contradiction* is explained by Sartori (1991) who maintains that the scientific approach is inherently comparative. Ragin (1989) also holds this view and claims that "virtually all empirical social science involves comparison of some sort" (p. 1). He contends that researchers compare cases to construct (and adjust) quantitative comparisons. In doing so, "they compare relevant variables to average values in order to assess co-variation" (Ragin, 1989, p. 1). In this way "comparison provides a basis for making statements about empirical regularities and for evaluating and interpreting cases (situations) relative to substantive and theoretical criteria" (p. 1). *Critical comparison* is a reflection of the processes underpinning the scientific

method. As *critical comparison* is an integral component of CCNA, it can be argued that there is a correlation between the processes used by nurses to determine competence in CCNA and those employed in the scientific method. This is illustrated in figure 10.1 .

CCNA   **Scientific Method**

CCNA	Critical Comparative Analysis	Scientific Method
Gathering data		Collecting data
Weighing up (Analysing data)		Analysis
Judging		Interpreting finding
Moderating (Testing hypothesis about competence)		Testing hypothesis
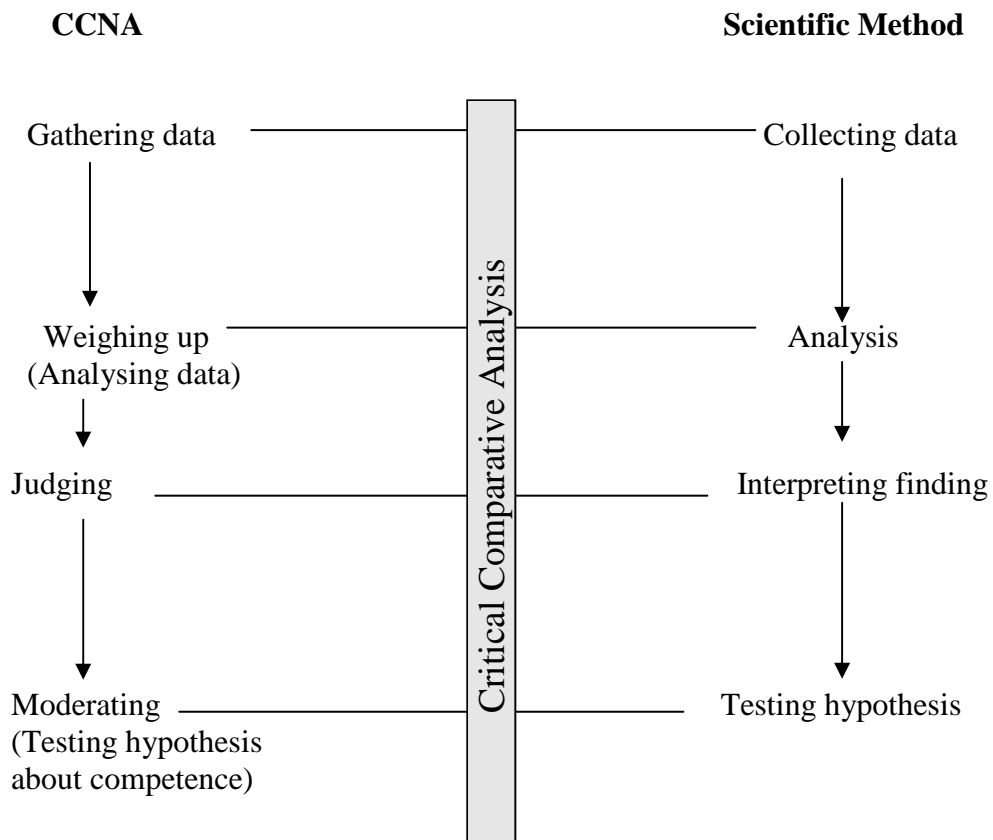
Figure 10.1 the relationship of CCNA to scientific method

Systematicity is congruent with the scientific method. Staib (2003) argues that characteristics such as those identified above are congruent with critical thinking and that

> "critical thinking is simply another name for scientific method. For decades, researchers have used the scientific method as a systematic approach to identifying a problem, collecting evidence, proposing a solution, testing hypotheses, and drawing evidenced based conclusions" (p. 499).

Staib (2003) contends that the nursing version of the scientific method is the nursing process, and that this is a blueprint for critical thinking. Systematicity and analyticity are important in order to determine level, define the scope, and assess the similarity and / or difference of objects. Staib claims that this and other cognitive skills such as "analysing, applying standards, discriminating, seeking information, reasoning logically, predicting, [and] transforming knowledge" (p. 499) are steps of the scientific method. These are evident in CCNA in the use of *critical comparison,* and deductive and inductive methods of reasoning are seen in the category *weighing up.*

Having self-confidence and the ability to trust one's own reasoning skills is another important attribute underpinning *critical comparison*. This is about being able to move out of one's comfort zone and consider options and alternatives. Confidence is also about persistence and the ability to continue without giving up when difficulties arise. This attribute is congruent with the characteristics of a critical thinker (Adams, 1999) and is important for *judging* and *moderating* in CCNA, which is influenced by the nurse's knowledge and experience. As previously explained in this thesis, where self-confidence is highly developed the nurse is less likely to engage in *moderating* activities.

Critical comparison is supported by inquisitiveness (Adams, 1999). This quality is characterised by the assessor being curious and eager to acquire knowledge and obtain explanations, even when the applications of the knowledge are not immediately apparent. Inquisitiveness is evidenced by nurses *collecting the evidence* in *gathering*.

Cognitive maturity is about being prudent in making, suspending, or revising judgment. It involves awareness that multiple solutions can be acceptable and having an appreciation of the need to reach closure and make decisions, even in the absence of complete knowledge (Profetto - McGrath et al., 2003). In CCNA, this aspect of *critical comparison* is an important aspect of *judging* and is evidenced in the concepts of *being aware, being professional* and *being sure*.

Critical thinking is a corner stone of clinical reasoning. It challenges action, decisions and judgments arising from assumptions (Profetto - McGrath et al., 2003). It is an essential element of *critical comparison*. Clinical reasoning embodies the notions of *truth seeking*, and open-mindedness. As previously explained in this thesis, *truth seeking* is about having courage and desire for the best knowledge, even is this fails to support or undermines one's preconceptions, beliefs or self interests. It is also about having concern and is characteristic of caring. Honesty is another aspect of *truth seeking* and involves facing one's own biases, prejudices, stereotyping and egocentric tendencies. Open-mindedness is demonstrated by having tolerance for divergent views and self-monitoring for possible bias. It is also about being alert, watchful or aware, and acknowledging the options of other people, and the reasonableness of selecting and applying options. In CCNA, clinical reasoning is evidenced in the categories of *judging* and *moderating*. The concepts of *reflecting*, *truth seeking* and *judging truth* clearly demonstrate these aspects of clinical reasoning in operation.

The intellectual effort of *critical comparison* decodes the truth of a situation, and facilitates logical reasoning. According to Paul and Heaslip (1995), this process facilitates understanding and promotes new ways of *knowing*. The consequence of
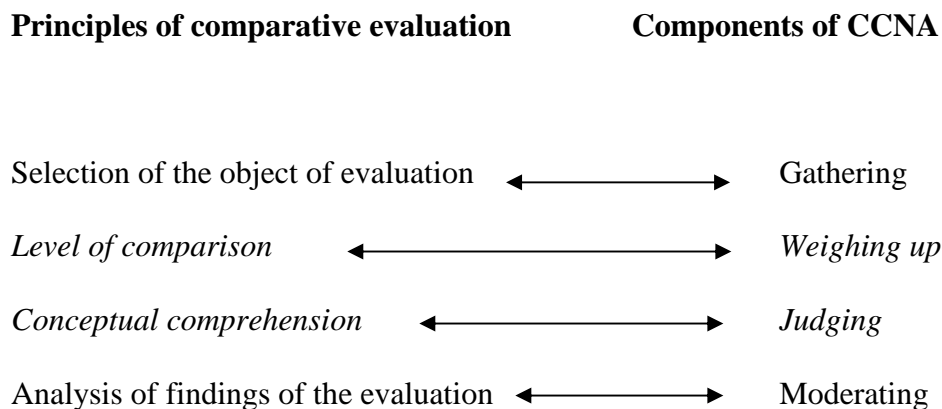
comparing contributes to the clarification of practice and facilitates the distinction between the similarities and differences in objects. Thus *contradictions* among objects become clear. The identification of *contradiction* provides a means for identifying discrepancies and irregularity in facts, and variation and inconsistency in perception. These factors are evidenced in *weighing up,* where practice is deconstructed and reconstructed in *constructing a picture of competence*. They are also apparent in addressing issues related to subjectivity and objectivity in the formulation of judgments (*judging*), which are central to the confirmation of *contradiction* and the successfulness of *critical comparison*.

10.3 Comparative analysis

While no nursing literature was found in nursing describing the use of comparative method, this has been used in social sciences, education and organisational management to evaluate and analyse similarities and differences in various aspects of society (Ragin, 1989). Vartiainen (2002) claims that, in these circumstances, comparison is made in order to comprehend, explain and interpret different phenomena, and that as a feature of scientific method, "comparisons are made exclusively for the purposes of control, to seek evidence supporting or contradicting the accuracy of certain generalizations" (p. 360). Vartiainen also states that, "comparative evaluation can be used as an instrument…in decision making" (p. 360), and that evaluation using comparative method can confirm or dispel the legitimacy of perceptions about technical function. While methodological literature dealing with evaluation and comparison are separate, they have four common principles. These are selection of the object for evaluation, issues related to the level of comparison,

conceptual comprehension, and analysis of the finding of the evaluation. These principles are considered to be universal (Ragin, 1989).

Comparing emerged as the BSPP in this research. Multiple examples are given throughout this thesis where nurses talk about making comparisons. The integrated and interactive nature of the model makes it difficult to confine the processes inherent in CCNA to one principle of comparative evaluation. The associations between the categories, and the principles of comparative evaluation are illustrated in Figure 10.2. The connections between the principles of comparative evaluation and the activities of CCNA support the substantive theory of CCNA and provide a foundation for the ensuing discussion in this chapter.

Principles of comparative evaluation   **Components of CCNA**

Selection of the object of evaluation ◄———————► Gathering

Level of comparison ◄————————————► *Weighing up*

Conceptual comprehension ◄———————————► *Judging*

Analysis of findings of the evaluation ◄——————► Moderating

Figure 10.2 Association between the principles of comparative evaluation and components of CCNA .

It is important to note that whilst there is a correlation between the categories of CCNA and the principles of comparative evaluation, the complexity of the interaction of CCNA and how this presents in relation to the principals, means that the categories in CCNA are not limited to the principles with which they are

identified above. This means that when each principle is discussed, examples in CCNA may be given which relate to differing aspects of the model.

10.3.1 The selection of comparable objects and gathering

Vartiainen (2002) claims that it is important to consider how units (objects) for assessment are selected in comparative evaluation, and that the selection process has bearing on both the successfulness of the evaluation process and issues of validity. In order for comparative evaluation to be successful and valid, features need to be comparable. According to Rankin (1989), to be comparable things need to have common properties. Sartori (1991) provides the example of *comparing* apples and pears. While it may appear that apples and pears are not comparable, they are nonetheless types of fruit, and have common properties. For example, they grow on trees, have skins, and can be eaten. They do obviously have some properties that are not comparable, for example their shape and taste. When making comparison, the issue is how comparable are objects, and with respect to which properties or characteristics. While there may be some dissimilarity, the degree of difference is important. The more closely comparable units resemble each other, the greater likelihood that a more reliable evaluation will result. This highlights the importance of selection of comparable objects. In CCNA, objects equate to features of nursing practice. It is important to *gather* evidence of practice that aligns with the competency assessment framework. An indication of nurses selecting comparable objects and employing strategies to obtain appropriate evidence is illustrated in the category of *gathering,* where the concepts of *creating opportunities* and *collecting the evidence* feature prominently. Where there is lack of commonality between units, the processes inherent in comparative analysis are made redundant. Sartori (1991)

uses the comparison of monkeys and stones to illustrate this point. He claims these units are so different that they have nothing in common, and therefore comparison yields nothing more than they represent different comparable units.

The number of units selected for assessment is also of importance in comparative evaluation. Ragin (1989) makes reference to the limitations of this in evaluative research, especially where the number of cases in a study is too small to allow the investigator to establish statistical control over the conditions, and causes of variation in social phenomena. This draws attention to what Ragin refers to as single case evaluations, which limit the possibility of generalisation. From a purely theoretical perspective, one could argue that using comparative evaluation to assess the competence of one student is an example of single case evaluation and invites criticism about the method and results. Vartiainen (2002) contends that where comparison is restricted to a single case, this is an example of illustrative comparison. Here, the student is not compared with another student. Rather the assessment of performance is undertaken by comparison with a theoretical framework, that includes concepts and definitions that can be used as criteria. In nursing, this equates to *comparing* features (units) of student performance with the competency standards, which represent ideal practice. Ragin argues that

> "…while the number of cases relevant to an analysis certainly imposes constraints on rigor, often it is the combinational natures of explanations of comparative social science and the holistic character of the comparative method that mitigate against rigor"
> (Ragin, 1998, p. 13).

The multifaceted nature and complexity of competency is reflected in the way in which competency standards are formulated. In order to assess these, nurses need to

incorporate a wholistic approach. This means that evidence of different facets of practice is required in order for nurses to undertake comparative analysis. To evaluate only one aspect of practice would not permit the generalisation to be made that practice is competent. In this thesis, evidence is provided of nurses collecting multiple 'snap shots' of practice and it has been suggested that they may use methods associated with triangulation in order to check the validity of comparison. Evidence of nurses *moderating* judgements also increases the reliability of *comparing*. This works to address potential bias associated with single case evaluations.

When selecting objects for evaluation, it is also important to consider the context in which the evaluation is undertaken (Ragin, 1989). According to Vartiainen (2002), the context refers to the focus of the research, that is, its purpose. This may be to assess individual action, behaviour or contentment (satisfaction). In CCNA, assessment of performance incorporates elements of all three. Action and behaviour assess the implementation of care, and the nurse's comportment undertaking specific tasks. Assessment of contentment is incorporated when *calculating value, merit and worth* of the student's practice and reflects the degree to which the care given meets the satisfaction of both standards of practice, and the care requirements of the patient.

Vartiainen (2002) states that comparative evaluation should "take into account the organisational environment and inherent structures and systems" (p. 362). Parallels can be drawn between CCNA and comparative evaluation on this point. In CCNA, context includes the environment in which practice takes place, and variables that may impact on the student's ability to perform. This aspect of CCNA addresses the complexity of the environment and draws attention to the wholistic nature of this

form of comparative evaluation. Examples of how nurses manage these aspects of the comparative assessment are described earlier in this thesis in the categories of *judging* and *moderating*. Strategies embedded in these categories address the notions of objectivity and subjectivity, and recognise the impact of *making allowances*. Technical errors may be rationalised and allowances made for variables impacting on the student's performance that are outside of their control. Thus they work to safeguard the rigour of the assessment.
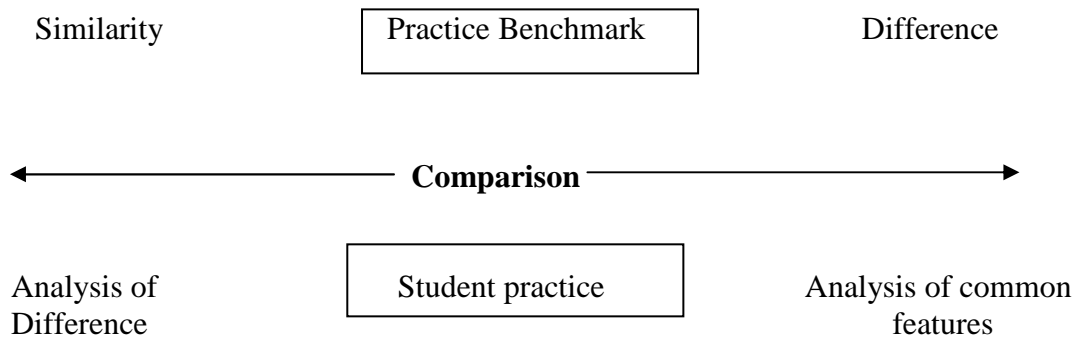
10.3.2 Levels of comparison and weighing up

According to Ragin (1989) the level of comparative evaluation is primarily concerned with identifying similarities and differences, with a view to explaining and interpreting the significance of behaviour in a specific situation. Level primarily concerns assessing the similarity and / or difference of objects, and defines the scope of the evaluation and the criteria to be achieved. Vartiainen (2002) contends that comparative evaluation employs the "principles used in direct (analytical) comparative studies" (p. 366), and that the main purpose is to uncover variables or explanatory factors among similar units. In CCNA, the evaluation of level correlates with strategies employed in the category of *weighing up*. This involves cognitive processes like those described by Vartiainen (2002) and nursing researchers (Buckingham & Adams, 2000; Harbison, 2001; Mahara, 1998) who support a cognitivist approach to explaining reasoning and clinical decision-making. To determine level, the nurse *compares* features of student practice with benchmarks. Rensnick, Nolan and Rensnick (1994) claim that *comparing* is an inherent aspect of benchmarking. Vartiainen (2002) confirms the association between comparisons and

benchmarking stating, "*Benchmarking* is one of the few methods that explicitly and without hesitation can be called a method of comparative evaluation" (p. 361).

In CCNA, *benchmarking* compares features of student practice with an aspect of practice that should correlate with accepted professional standards. Elements embedded in benchmarks equate to criteria, and are used as a point of reference when making comparison. These include safe and unsafe practice indicators, which define boundaries of practice.

According to Sartori (1991), the act of *comparing* "is both to assimilate and differentiate" (p. 246). Comparison draws attention to similarities and difference and highlights the explanatory power of the comparative method. Similarity brings together objects in a given class or comparable unit (features of practice). In evaluative assessment, sameness does not imply replication or identical characteristics it merely infers similarity. Difference appears as contradiction and highlights the dissimilarity between the units being compared. In CCNA, contradiction emphasises aspects of practice that do not correlate with the features of benchmarks. If the student's practice does not conform to the benchmark used, then lack of similarity will suggest failure to meet the standard required, and in doing so, both similarity and difference determine level. It is where that level is that is important. This point draws attention to the importance of assessors having a clear understanding of the expectations of the differing levels of practice for students at the varying levels of education programmes, and as previously acknowledged in this thesis, the impact that lack of knowledge and understanding of the competency framework has on the reliability of assessment outcomes. Adapted from the work of

Vartiainen (2002), Figure 10.3 illustrates a continuum that depicts the assessment process underpinning the determination of similarity and difference.

Similarity   Practice Benchmark   Difference

◄─────────────────── **Comparison** ───────────────────►

Analysis of   Student practice   Analysis of common
Difference   features

Figure 10.3 Comparative analysis: Identifying similarity and difference

The assumption supporting Figure 10.3 is that while similar features are compared, it is natural to look for difference rather than similarity, and where different features are compared, the evaluation focuses on identifying features that are common.

This explains how, in CCNA, nurses select and use benchmarks to confirm or dispel perception of competence. If a benchmark comprising features that are congruent with best practice is used, the emergence of contradictions indicates practice that does not conform to standards of best practice, and is not safe. Where there is a lack of contradiction, practice that is safe is confirmed. The same principle applies where benchmarks comprising features of unsafe practice are used. In CCNA, the nurse's emerging perceptions of practice will determine the type of benchmark used. Depending on the situation and purpose, either type of benchmark may be used to test hypotheses about competence.

In comparative evaluation, the term level also refers to the purpose of evaluation and the point at which comparative method is applied. According to Ragin (1989), the point at which comparative analysis takes place has a bearing on the purpose for which it is used, and the outcome of evaluation. He argues that comparative evaluation takes place on two levels simultaneously. These take into account the micro- and macro-aspects of phenomena. In CCNA, both levels of analysis are evidenced in the nurse's use of comparative analysis. The micro-aspects of practice are compared in *weighing up* during the formulation of perception and the *constructing of a picture of competence*. This is illustrated in Figure 7.4 (page 188). The focus of analysis in this phase of CCNA addresses determining competence in single tasks or features of practice. The use of macro-analysis is seen in the category of *judging*. This is illustrated in Figure 8.1 (page 194). Here, all of the perceptions arising from *weighing up* are collectively compared to provide an over-arching perspective of competence, including professional, moral and ethical influences of the evaluative process. Vartiainen (2002) states that in comparative evaluation "it may be difficult to draw conclusions pertaining to the macro-level on the basis of the micro-level comparisons, and visa versa" (p. 336). This is true in CCNA, as *judging* is dependent on perceptions arising from *weighing up*. If perceptions arising from *weighing up* are for some reason inaccurate, then this will have an impact on the formulation of judgment. Unless the judgment is moderated, it is likely that the error will be perpetuated because of the interactive nature of CCNA, and the dependency of categories and their properties on each other. This is an inherent weakness in the comparative method, when two levels are dependant on each other in this way (Vartiainen, 2002).

In comparative evaluation, determining level can be compromised by the degree of difference. Vartiainen (2002) contends that where units are extremely different, it can be difficult to determine whether or not common features exist. The difficulty in comprehending similarity between units is influenced by the degree of abstraction. Increased complexity requires higher degrees of abstraction to conduct the analysis. The greater the degree of abstraction, the more difficult to conceptualise, and more likelihood that similarity between units will appear vague. In CCNA, this aspect of comparative evaluation is addressed in the category *weighing up*. The consequences of abstraction are illustrated in Figure 7.3 (page 168). This draws attention to the difficulty of using benchmarks that are perceived as being incomparable. For nurses in this study, difficulty in perceiving level and the impact of abstraction is associated with using generic competencies as benchmarks. This aspect of CCNA is discussed in Chapter 7. According to Sartori (1991) the lack of perceived similarity and issues related to level contribute to inability to make generalisations and compromise the comparative assessment method.

10.3.3 Conceptual comprehension and judging

When comparison is used as a tool for evaluation, conceptual comprehension is the most important factor contributing to the success of the evaluative process (Vartiainen, 2002). Conceptual comprehension is about the understanding of the concepts being evaluated. This is important during both the evaluative and validation phases of analysis (Ragin, 1989; Vartiainen, 2002). Sartori (1991) claims that it is crucial that the people involved in undertaking the evaluation have a very clear understanding of the concepts involved, and that they apply the same logic in determining similarity and difference. Having well-defined concepts assists in

addressing issues related to the consistency of comparative evaluation, the determination of the level of comparison, and the degree of abstraction.

While conceptual comprehension is important in the formulation of judgments (*judging*), it also influences all other aspects of CCNA. For example, in *gathering* nurses need to know the criteria being evaluated in assessment. This should guide them in the selection of examples (units / features of practice) for comparison, and in determining practice development needs of students. In *weighing up,* a clear understanding of competency standards is required in order to facilitate reliability of comparison. In *judging* and *moderating,* the same issue is of importance. If conceptual comprehension is lacking, this may adversely affect the rigour of the evaluative process. This issue draws attention to the need for nurses to have a clear understanding of the NCNZ competency standards and criteria, which underpin the competency assessment framework. While this has been raised as a concern in this research, the issue has been addressed by the nature of comparison and the way in which nurses moderate judgments. The professional standards acceptable to the group guide comparison and mediate decision-making. This is of particular significance for *judging* and the determination of competence.

Conceptual comprehension also raises the issue of context and the ability to make comparison internationally (Sartori, 1991). In evaluative research, this includes accounting for variables such as culture, and differences between systems. In *judging,* contextual factors influencing the assessment are addressed by nurses *making allowances*. This means that the conceptual comprehension of practice is liable to reflect the area in which practice takes place. Due to the nature of the health

care context, the degree of variance in technical skills required for safe practice can be significant. Unless there is a clear understanding of the competency framework, there is a risk that the assessment outcome may only be valid in the context in which it took place. Creemers and Reynolds (1996) contend that because of this, it is pointless to compare and transfer observations carried out in one cultural context to another. This further highlights the need for a common understanding of the competency standards. While this and other issues arising in Chapter 7 about abstraction, are outside the scope of this research, it does raise the issue of whether the use of generic competency standard results is a reliable method of assessing practice.

10.3.4 The analysis of finding in comparative evaluation and moderating

The focus of this aspect of comparative evaluation is on ensuring reliability. This correlates with activities in CCNA in the category *moderating*. Factors influencing the reliability of evaluative comparison and evaluation studies include interaction between subjects and objects, research, the process of comparison, comparison of concepts and definitions, similarity of compared cases, and context knowledge of the research object. (Ragin, 1989; Vartiainen, 2001). These factors bear some resemblance to the issues arising from concepts and properties that emerged in CCNA, and impact on the successfulness of these. Based on the ideas of Ragin (1989) and Vartiainen (2002), parallel factors that influence the usefulness, and the reliability of competency assessment based on evaluative comparison in CCNA, are illustrated in Figure 10.4 (page 306).
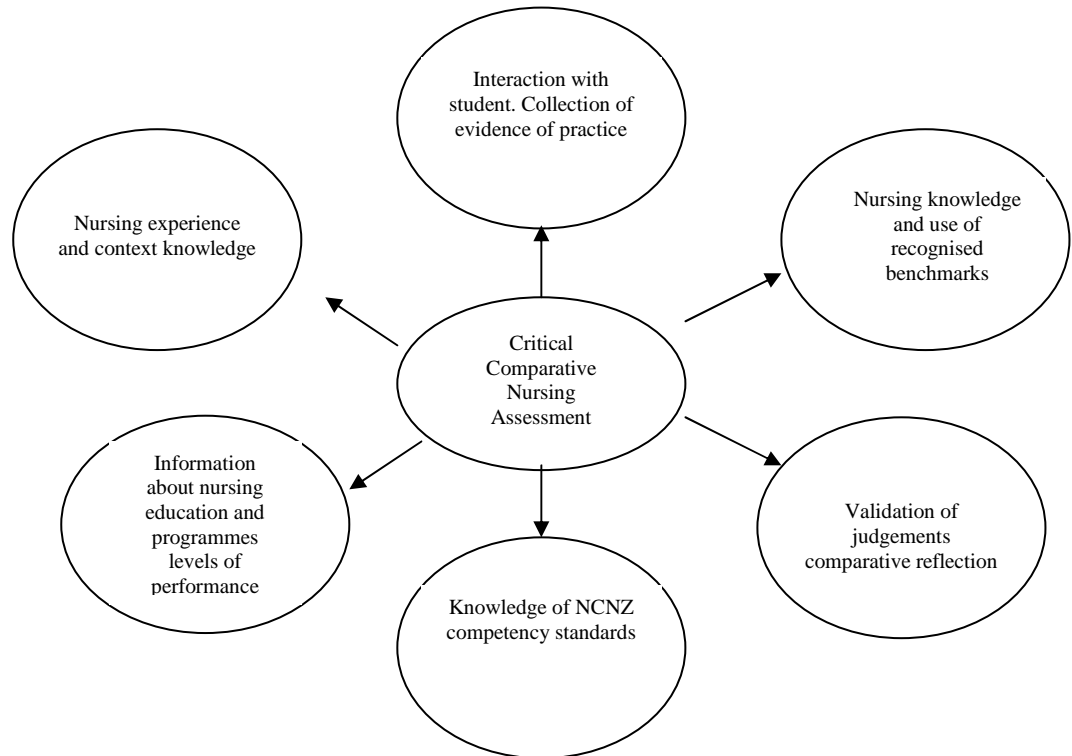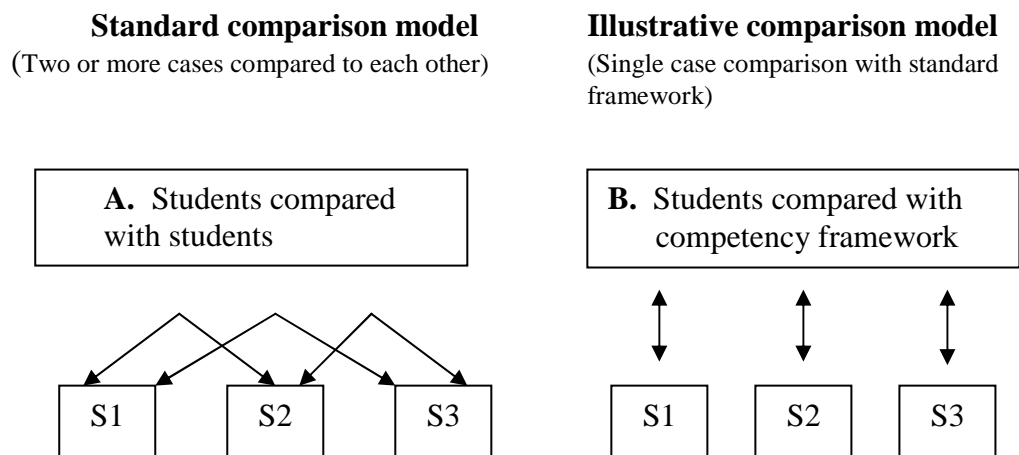
Figure 10.4 Factors influencing the reliability of CCNA

In comparative evaluation, analysis of findings is dependant on the level of the evaluation. As previously identified, this refers to the unit chosen for comparison and is most reliable when units are similar. The analysis of findings in comparative evaluation employs techniques to evaluate the validity of the use of methods to determine level. The primary purpose of analysis is to identify irregularities on which generalisations are based. The underlying premise correlates with *moderating* in CCNA and strategies used by nurses to check the validity of judgments.

One of the measures used to assess the appropriateness of generalisation is to determine if the correct method of comparison has been applied in a comparative study. To provide an example, earlier in this thesis the comparison of student with student was raised as an issue impacting on the validity and reliability of assessment.

Where this occurs, this is an illustration of nurses using a standard comparative evaluation process involving two or more cases. This practice employs *benchmarking* one student against another, and is a compensatory measure for the nurse not being familiar with the assessment framework, and expected levels of practice for students. This practice raises issues about the process of analysis, level and the accuracy of assessment and generalisations made about levels of practice competence. Figure 10.5 illustrates this and the difference between standard evaluative comparison (involving two or more cases) and illustrative comparison (single case). It highlights the implications of using inappropriate methods of comparison and why it is important that findings (judgments) in comparative evaluation are moderated.

Standard comparison model
(Two or more cases compared to each other)

Illustrative comparison model
(Single case comparison with standard framework)

Figure 10.5 Models of comparative evaluation

The first model (A) illustrates a standard comparative evaluation model. This is typically used to compare organisations with each other. In this model, S1 – S3 represent different students. This is representative of the scenario presented previously where one student is compared with another. Even when the level of

education is the same, comparison of student to student remains problematic. While it is expected that there will be some similarities, each student is different. They have had different experiences, have different learning needs, and may be looking after different patients. It raises issues previously identified in relation to how comparable objects are and with respect to which properties or characteristics (apples and pears). Where students are evaluated using this model, the assessor determines the criteria for assessment. This is liable to reflect the nurse's personal beliefs and values, nursing philosophy, expectations, and ways of doing. It may also include contextual factors specific to the practice environment. Here, there is a risk that *benchmarking* will not be consistent and may raise questions about the reliability of the evaluation.

It has previously been identified that the number of cases is significant in comparative assessment. When using students as benchmarks, the number of students available for comparison impacts on assessment reliability. If student numbers are too small as in the assignment of two students per shift/ per ward, too much attention may be paid to existing difference. This can lead to misinterpretation of practice ability. For example, if the assessor is using a student to benchmark the practice of another, and have nothing else to compare (benchmark) practice to, the focus of assessment may pay too much attention to the difference between the practices of the two students. This can lead to a student working at the appropriate level being assessed not competent, because the other student is working at a level above that which is required.

The second model (B) illustrates the evaluative framework where students are not compared with each other. Nurses involved in this research perceived this model as

being the ideal. Here, performance is compared to a theoretical framework consistent with processes used in illustrative comparison. There is a level playing field, with each student's performance evaluated on the basis of individual *value, merit and worth* in relation to the standards and criteria specified in an assessment framework. The assessment framework in New Zealand equates to features of student practice being compared to the NCNZ competency standards. Having a stable point of reference (i.e. the competency standards) to benchmark against increases the reliability of assessment, and addresses concerns related to the *comparing* of students. As the benchmarks in this model are based on standards of practice, it provides a means for nurses to determine if professional standards have been maintained, and if public safety can be assured. This form of comparative evaluation supports the theoretical propositions underpinning CCNA.

Other issues that raise questions about the reliability of evaluative studies and the analysis of findings included misclassification, conceptual stretching, incommensurability and degreeism. Misclassification occurs as a result of using inappropriate benchmarks. This can induce difficulty in identifying similarity, and can contribute to the prevention of generalisations being made in comparative evaluation (Sartori, 1991). In CCNA, the incidence of this factor occurring is more likely when inexperienced nurses are assigned the responsibility of assessing students. Here lack of experienced-based knowledge may limit *benchmarking* possibilities.

Making assumptions based on little similarity and stretching perceptions without validating, extending or drawing out conclusions in comparative evaluation is

referred to conceptual stretching (Ragin, 1989; Sartori, 1991). Here, generalisations are made that are based on little evidence. This may occur as a result of misclassification. This concept has been discussed in relation to *collecting the evidence* and factors impacting on this in the category of *gathering* in CCNA. In this instance insufficient evidence can compromise the nurse's ability to make comparison.

Incommensurability is a term used by Sartori (1991) and essentially means "no measure" (p. 252). It can be caused by lack of knowledge and experience, and / or situations where concepts are so embedded in context that they are disguised or go unnoticed. The notions of expert practice (Benner, 1984; Benner et al., 1996) and knowledge that is embedded in ritual may account for some nurses being unable to articulate how they measure competence. Incommensurability challenges the transferability of competencies and may contribute to abstraction and the difficulty of making comparison.

Sartori (1991) condemns degreeism, claiming that this equates to the uncritical use of comparison. Critical thinking is an important factor in determining the level of analysis, and the nurse's ability to identify contradiction and determine competence. This has implications related to the determination of level and analysis in comparative evaluation. In CCNA, the occurrence of this may be influenced by lack of knowledge of the assessment framework, and application of criteria that reflect assessor's beliefs and values and are influenced by the nurse's personal philosophy of nursing.

10.4 Conclusion

This chapter has discussed the notion of *critical comparison* and explained the significance of contradiction in determining practice competence in the CCNA model. It has been argued that CCNA is underpinned by the principles of comparative evaluation, and that these are congruent with the ideology and processes inherent in the scientific method. In doing so, parallels have been drawn between scientific method, principles of comparative evaluation and the processes inherent in the CCNA model. Factors that influence *critical comparative analysis*, issues related to validity and reliability of assessment, and the implications for using this means of assessment determining competence have been discussed. The implications for nursing, limitations of the study and suggestions for future research will conclude the thesis in Chapter 11.

Chapter 11: Conclusion

11.1 Introduction

This chapter concludes this thesis by reviewing the research aims, identifying implications for nursing arising from the research, and making recommendations that if implemented, could contribute to improving the validity and reliability of competency assessment processes. The focus of recommendations include curriculum development, development of competence assessment tools, preparation of assessors and strategies to promote collaborative approaches between nursing education and practice in assessing the practice competence of students. In addition, this chapter provides an evaluation of the theory and suggestions for future enquiry.

11.2 A review of the research aims

The purpose of this study was to discover and explain what was happening regarding determining competency to practice of completing third year BN students in New Zealand. Using grounded theory, the specific objective of this research was to develop a substantive theory, which explained the processes employed to determine competence to practice for these students. To achieve this, the perspectives of nurses undertaking assessments of competence on completing BN was researched. This included interviewing nurses and obtaining their understanding, and views about competence, and how this was assessed. The question guiding this enquiry was, "what is happening regarding the assessment of competence for completing BN students"? The responses of the nurses and additional information obtained by means of theoretically sampling of the literature were synthesised through the use of comparative analysis. This resulted in the emergence of the substantive theory represented in the CCNA model.

CCNA describes the views and opinions of nurses involved in this research and how they assess the practice competence of students. These interpretations are described in the categories of *gathering* (Chapter 6), *weighing up* (Chapter 7), *judging* (Chapter 8) and *moderating* (Chapter 9). The BSPP of *comparing* underpins these categories and facilitates the assessment of students, by resolving the participant's concern of not knowing or understanding fully the competency standards used to assess student practice. The nature of *comparing* and how this operates to resolve not knowing the competency standards or how to assess these is described in Chapter 10.

This research is relevant to the development of educational processes designed to assess competence. The CCNA model provides insight into the factors impacting on the assessment of process. In order for the assessment process to provide valid and reliable outcomes, these factors should be addressed. This is essential if the profession is to have confidence that professional standards are maintained, and nursings responsibility to uphold public safety is assured.

11.3 CCNA implications and recommendations for nursing

In illuminating what is happening in practice, this theory provides information that can be used to address the challenges associated with assessing students. It provides information that highlights issues, which, if addressed, would make the assessment process more reliable. The implications of issues arising from this research can be broadly categorised under the headings of: curriculum development, competency assessment and the development of assessment tools, preparation of assessors, and relationships between nursing education and practice.

11.3.1 Curriculum development

While various educational models underpin curricula, and provide students with a wide knowledge base, undergraduate nursing education programmes in New Zealand are essentially competency-based programmes. The objective of these is to produce graduates who have a sound knowledge base, and the technical skill necessary to perform nursing care, which meets the NCNZ competency standards for safe practice. If a competency-based approach is desired, these standards should be explicitly identified in curriculum models, and should define the structure and delivery of the programme. To achieve this, the NCNZ competency standards need to be more than just an assessment framework attached to a theoretical model. Education should focus on teaching students the requirements for competence, how this is demonstrated, and how to critically appraise practice. While this study is not about critical thinking per se, CCNA may provide a helpful framework for teaching students how to make qualitative distinctions by *comparing* experience to what they already know, and subsequently identifying contradictions and learning needs. This may assist students to learn nursing and strengthen educational approaches used to teach clinical reasoning.

While focusing curricula on the competency standards may not ease the tension associated with implementing a competency-based programme in a higher education setting, it makes provision for content and assessment of this to be directly aligned with the competency standards. This makes a clearer connection between theoretical preparation, and assessment of professional requirements. It is, therefore, recommended that curricula be reviewed and, where necessary, realigned and adopt the NCNZ competency framework as their underpinning structure. The realignment

of curricula in this way may address the tension between delivering a programme that does not mirror a competency-based design, and the perception of nurses in practice, that students are not prepared to meet the needs of the real world.

Further to this, nursing curricula have a tendency to focus solely on preparing graduates to care for patients. More emphasis needs to be placed on preparing graduates for supervisory roles, where, as registered nurses, they will work along-side and supervise students and other health care workers. It is recommended that as progressive development of their educational roles, third year students refocus previous studies related to patient education and be introduced to the notion of preceptorship, and to teaching, coaching, and supervising other heath care workers (including students). At an introductory level, this aspect of the curricula should include the assessment of peers, including an introduction to competency assessment, staff appraisal, performance management of staff, and conflict management and resolution.

While it could be argued that these topics are already addressed in new graduate programmes, and are more appropriately taught at a post registration level, the current health care context, staffing shortages and casualisation of the work force, place new graduates in vulnerable positions. New graduates are responsible for overseeing the practice of other health care workers and, while it is not advocated that they should be responsible for precepting and assessing students, this research found that many newly registered nurses find themselves undertaking these roles shortly after appointment.

Providing students with a more in-depth introduction to these aspects of the registered nurse role may facilitate better understanding of competency standards, and raise awareness of potential issues regarding supervision and future roles, including the management of staff and students. Strengthening new graduate programme curricula, and building on preceptorship concepts introduced in undergraduate education, may address issues raised in this thesis related to the failure to manage student assessment and progression appropriately. Preparing nurses in this way for undertaking competency assessment may address issues related to lack of confidence in the current assessment methods, and may reduce the occurrence of nurses *defaulting* and / or *abdicating* responsibility for precepting and assessing students. Education on topics such as supervision and performance management may also assist nurses adapt to a changing health care system, where there is an increase in the employment of health care assistants (Norman, Watson, Murrells, Calman & Redfern, 2002).

11.3.2 Competency assessment and development of assessment tools

As previously identified in this thesis, there is the potential for tension to arise when comparative evaluation processes, such as those described in the CCNA model and competency-based assessment methods, are used to assess performance. This can impact on the validity and reliability of assessment outcomes (Gonczi, 1995; Rutherford, 1995). In order to ease this tension and enhance the validity and reliability of assessment, a number of important issues related to the construction of competency assessment tools and accompanying documentation must be addressed.

When a competency-based assessment method is used, the practice standards (concepts) being assessed, and the criteria (indicators) used to guide decision-making need to be clearly defined (Sartori, 1991). Without clear definition, there is a tendency for conceptual comprehension to be compromised. Here, the connection between practice and standards become fragmented. If the expectations of performance (including level) are not clearly specified and / or the assessor is unable to relate practice to the assessment, the degree of synthesis required to determine if the assessment criteria have been met intensifies. The more complicated the analysis, the higher the degree of abstraction is required to make connections between criteria and the practice observed (Vartiainen, 2001). This analysis is further complicated where generic standards are used. This is because these provide broad statements that cover multiple aspects of practice, and are difficult to measure. In these circumstances, nurses have to use discretionary judgment. This is often based on inference, and it is difficult to determine if the outcome of the assessment is a true judgment of capability, reflective of achievement of professional standards, or if this is an appraisal of performance based solely on the assessor's individual understanding and expectations of competency (Rutherford, 1995).

This thesis has demonstrated that having standards that are area specific increases the validity and reliability of assessment. When the nurse can make a direct connection between the standards, and the practice in which they are involved, the degree of abstraction and resulting complexity in decision-making is reduced. It is recommended that consideration be given to adopting area specific standards. This would see the re-introduction of specific mental health and other practice area competencies. It would address issues related to the requirements of competency-

based assessment previously discussed, and result in tools that are more useful and accurate for assessing competence. It would also address the lack of confidence that some nurses have in the current framework (Walker & Bailey, 1999).

Further to this, assessors require more guidance. Assessment tools should state clearly what aspects of practice are assessed and how. Standards should be performance orientated, unambiguous and measurable, be expressed in terms of results, not procedures, and not overlap other elements (Rutherford, 1995). Due to the integrated nature of nursing practice, formulating assessments tools that meet these requirements is very difficult. Area specific standards may address this to some degree. In addition, performance criteria should detail how the student will achieve the desired level of practice (e.g. speed, accuracy, neatness or completeness). Criteria should mirror the knowledge and skills required to meet the standard (Gonczi, 1995). These should take into account the context of practice, be realistic, attainable, measurable and clearly specify the minimum expected level of practice. Where applicable quality and quantity should be defined (Gonczi, 1995; Rutherford, 1995).

The provision of supporting documentation in the form of a user's guide is recommended to provide assessors with a clear understanding of the assessment process and requirements. This should include instructions describing when and how the assessment is conducted, expectations regarding documentation of evidence of performance, and a detailed guide addressing levels of performance. Level of performance should outline the degree of autonomy and responsibility and include precise descriptors specifying expected practice behaviours for each year of education. This is an important requirement in comparative evaluation, as the level of

comparison and expected practice for student performance needs to be clearly defined in order to determine how indicators can be weighed. Further to this, if indicators are not weighted equally, then information about this also needs to be included (Rutherford, 1995). The user guide should include information about the expected conditions or circumstances in which the assessment of performance should take place, and specify a range of variables. For example, expectation of normal working conditions, the number of patients (including acuity) a student should be able to care for, and the tasks they should be able to undertake competency at various levels of education.

New Zealand is a small country and there are a limited number of nursing schools. It is recommended that consideration be given to the development of a national competency assessment tool (including a users guide), which meets the requirements of competency-based assessment identified above. The development of a national competency assessment format would promote consistency in assessment methods. This, and the establishment of assessment moderation processes, would contribute to addressing issues related to the reliability and validity of assessment.

While implementation of these recommendations will clarify expectations of student performance, and assist nurses to make judgements about student practice competence, they will not completely resolve the tensions associated with offering competency-based education programmes that are at degree level in institutions of higher education.

As previously identified education offered at degree level has resulted in curricula providing a broad knowledge and skill base. This requires students to undertake multiple assessments in theory and practice. Despite an exhaustive assessment process involving assessment of theory and practice, students completing nursing programmes in New Zealand are still required to undertake a national State Final examination. This comprises of two ninety-minute multiple-choice question exams. While this is designed to screen practice competence and determine eligibility to register as a nurse, this form of assessment is not congruent with the NCNZ definition of competence, which as previously identified in Chapter one, reflects an integrated approach to defining competence. State Final examinations are however, restricted to assessing knowledge. In determining competence, the assumption underpinning this form of assessment is that, if the student has the knowledge to answer the question correctly, they will also have the ability to manage equipment, implement the technical skills required, and to provide treatment at a level that meets the standards of practice necessary for the provision of safe care. It includes providing care in a manner that is professional. This is supported by Neary (2000), who argues that the true test of the nurse's competence is not their ability to espouse theory, but rather demonstration of their clinical expertise.

In reality, while examinations may provide a means for testing knowledge and attempt to assess attitude, they cannot predict with any accuracy the behaviour of the student in practice, or whether they have the ability to perform. Carroll (1998) claims that this premise has been argued in New Zealand since 1928, when, at the Annual New Zealand Nurses Association conference, the question of examination reform arose. Concern was expressed at that time that this form of assessment was "largely a

test of memory rather than a test of intelligence and ability" (p. 69). This argument has continued to permeate nursing circles in this country.

The difference between theory examinations and practice-based assessment is that the latter provides a means for assessing personal attributes, appraising the student's ability to perform in stressful situations, and demonstrate the provision of care. It also takes into account the context of practice, and the student's ability to perform in an unpredictable real life context of the practice environment. It would appear more appropriate, therefore, to evaluate competence in the practice context. This is more congruent with traditional competency-based assessment methods and would support assessment of an integrated definition of competence.

The limitations of a final practice-based assessment of competence undertaken in one area, and the use of area-specific standards is that competence in one area cannot assure practice competence in another. While this is of concern, the reality is that the national state final exam provides no better assurance of 'fit for purpose'. The introduction of the HPCAA (2003) has provided an opportunity to revisit the need for a national examination and empowers the NCNZ to implement alternative assessment requirements as it sees necessary to ensure public safety. The result of this research is timely and provides information that supports the review of the continued use of a national State Final examination. It is recommended that the continued use of state final as a determinator of competence be discontinued. Accredited schools of nursing, in partnership with practice providers should be empowered to determine whether a student has met the academic and practice competency requirements for the award of the degree. Concurrently they should also

be assigned the responsibility for determining eligibility for registration, and whether students should enter practice as registered nurses. If stakeholders (practice, education, assessors, lecturers and students) are to have confidence in assessment methods, it is recommended that they have input into determining all forms of standardised assessment methods / approaches that may be devised as an alternative to the State Final examination.

11.3.3 Preparation of assessors

While it could be argued that by *moderating* judgment, issues relating to lack of understanding of the assessment framework and criteria are resolved, the subjectivity associated with assessing personal attributes, and concerns related to the validity and reliability of assessment outcomes remain. Variance in practice context (Ragin, 1989), and the influence of individual beliefs and values, mean that there is liable to be differing interpretations and expectations of student practice. As a result, there is no assurance that a student assessment in one area of practice by one nurse, will be consistent with that undertaken in others areas by other nurses. It is crucial that nurses have a common understanding of the assessment framework and a clear understanding about levels of performance, expectations of student practice at varying stages of education programmes, and the difference between these and expectations of registered nurses performance or attributes.

In order to achieve a measure of consistency in assessment and protect professional standards, nurses need to be familiar with the NCNZ competency framework. This research supports the NCNZ requirements that nurses' precepting students have completed a preceptorship training programme. It is noted that in New Zealand, these

programmes vary in length and content. It is a recommendation that a national programme be developed and delivered in conjunction with the release of a national competency assessment tool for assessing undergraduate students. While the teaching role associated with preceptorship is important, this programme should place more emphasis on competency assessment methods, ensuring that nurses understand the competency standards, how these relate to the context in which they are working, what the expectations of student practice are in relation to these, and how the standards might be assessed. These courses should provide instruction in coaching, conflict management and performance management. Courses should provide an introduction to problems associated with understanding the language used in competency assessment, and the expectations of documentation and record keeping.

Nurses working with and assessing students also need clarity about their role and the expectations associated with this. They need to know what they, and other nurses involved with students are expected to do, and how their roles relate to one another. A position profile (job description) detailing the role should be developed. In addition to training, it is recommended that systems be established within the work place to provide professional supervision for preceptors.

11.3.4 Relationships between nursing education and practice.

Establishing trusting relationships, and the need for nursing education and practice to work together in partnership, have been identified in this research. The energy surrounding the debate about whether practice or education should undertake competency assessment should be refocused to establishing a collaborative approach

and valuing expertise. Collaboration, utilising the expertise of both disciplines of nursing, and supporting nurses working with students, is likely to result in more accurate assessment.

Increased communication between education and practice is required. Issues related to the dissemination of information about student preparation, learning requirements and capability in practice should be addressed. It is acknowledged that the casualisation of the workforce, and staff shortages affect the continuity of student preceptorship. This has an impact on the collection of evidence and formulation of judgements about competence. To increase the accessibility to information, it is recommended that course materials, including information about expectations of student practice and assessment, be placed on practice intranets.

Teaching and assessing students is a joint responsibility. Educators need to have an increased presence in practice. They should support preceptors working with students and ensure that the students experience is managed appropriately. This is especially so when students are having difficulty meeting the challenges of the practice environment, and safety is questioned. Providing support and establishing an environment, where nurses feel they can safely express their opinions of students could promote honest feedback and more reliable assessment.

Nurse managers in practice need to acknowledge their responsibility for the part they play in supporting and contributing to the education of the profession's young. This includes providing placements, and supporting nurses working with students. While it is desirable that preceptors have a minimum of two years post-registration

experience (Benner, 1984), it is acknowledged that the current workforce skill-mix may not consist of sufficient nurses with this amount of experience. It is, therefore, paramount that nurses precepting students have successfully completed preceptorship training and that their workloads are reduced. This means that nurse managers should plan to release staff for preceptorship training and take more responsibility for planning student experiences. Engaging in this way demonstrates the valuing of education, supports preceptors to provide quality teaching and supervision, and protects the safety of patients (Neary, 1999; Spouse, 2001).

Educators working in practice environments need the support of practice colleagues. Without honest feedback on student performance, they are disempowered. Completing competency assessments together will enable educators to provide advice or teaching about competency assessment methods and provide support for preceptors. This will support preceptors, facilitate moderation, ensure that assessment processes are consistent and result in more accurate appraisal of performance. In doing so, professional standards and public safety are more likely to be protected.

The establishment of joint appointments is recommended as a means of providing support for both educators and preceptors. Nurses working in coordinator roles, could facilitate relationships between education and practice. By providing education and increasing understanding of student requirements, it is envisaged that nurses in this role would establish close working relationships with education and preceptors. These relationships may facilitate the establishment of collaborative and trusting partnerships (Cooney, Dignam & Honeyfield, 2001). In addition, it is recommended

that representatives from practice are appointed onto academic committees which make decisions about student progression. The committee will address trust issues by ensuring that both side's perspectives are heard, establishing confidence in decisions, and reinforcing that practice expertise and professional judgment is valued.

It is also recommend that a registered nurse be appointment and over see student experience in each area of practice. This role could be assumed by nurse managers or a senior staff nurse. These nurses would be responsible for overseeing the student experience, collecting and collating evidence, and providing a consistent point of contact in practice areas for educators. Having one person responsible for coordinating the student's experience, collecting information and liaising with education could help to address the issues associated with the casualisation of the work force, lack of consistency in preceptorship, and provide another means of providing support for nurses working with and assessing students.

11.4 Evaluating the theory

When reporting research findings, it is traditional to report on the limitation of the enquiry. According to Glaser and Strauss (1967), grounded theory is a methodology that stands on its own, and due to the nature of theory, there should be no need to legitimise this, as in grounded theory, the product legitimises itself. Glaser (1998) argues that while external quantitative research or canons of methodological rigour applied to grounded theory may allow another researcher to disavow the results" (p. 17), this is inappropriate as grounded theory has its own criteria of evaluation. These are fit, workability, relevance, and modifiability (Glaser, 1998; Glaser & Straus,

1967). These criteria are used for evaluating the validity of substantive theory. If, in the final analysis, the theory holds up to these, "this resolves its legitimation" (p. 17).

Glaser (1998) argues that other than to acknowledge that this theory is substantive and its generalisability is limited, there is no further need to identify limitations of this research. I acknowledge that this theory is representative of the reality, knowledge, beliefs and values of the nurses who participated in this research, and that my beliefs about, and experience in, education have, through the processes embodied in conceptualisation, been incorporated in the development of this theory, which remains untested. It is, therefore, important to draw attention to the robustness of the theory. This has been done by considering the occurrence of the criteria identified above. The relationship of these criteria, and their relevance to the procedures and methods is described in Chapter 4 and illustrated by participants comments in section 4.2.12.7 (page 81). These draw attention to fit, workability, relevance, and modifiability and highlight the trustworthiness of the research.

11.5 Suggestions for further research

As previously identified in Chapter 2, the literature gives no assurance that there is a reliable method of assessing competence. There is, therefore, a need for research that explores the notion of competence in nursing, clarifies competence, and contributes to the development of valid and reliable tools to assess this. Further research that would be beneficial would be that which adds to the professions knowledge base about the assessment of competence to practice, provides a means to understand this, and take action to ensure that professional standards and public safety are upheld.

The research outlined in this thesis can be considered complete as the categories and codes have been saturated. This is evidenced in the depth of detail provided in the properties, and the interconnectedness between concepts, properties and categories. As the theory lends itself to modifiability, further theoretical sampling would enable the development of a formal grounded theory. For example, the sample could be widened to include patients and other stake-holders perspectives of competent practice. The sampling of perspectives on competence assessment from other health professionals (doctors, dentists, physiotherapists and occupational therapists) who also identify competence as an important professional issue, may provide valuable information for all these professions. This may also contribute to the development of the CCNA model and move this into the next theoretical level. In addition research exploring the relationship between CCNA and the development of clinical reasoning may contribute to understanding the role of comparative evaluation in relation to learning in nursing.

11.6 Conclusion

Critical Comparative Nursing Assessment contributes a theoretical explanation about how nurses determine the practice competence of completing Bachelor of Nursing students. The substantive theory of CCNA was generated using a Glaserian grounded theory approach. This has been presented as a model that describes and explains the processes utilised by nurses to manage the assessment of student nurses, and how this supports and informs decision-making. *Comparing* emerged in the form of a BSPP in this research. This has been explained in depth in Chapter 10. The process of *comparing* underpins all of the activity described in the four categories that

comprise the CCNA model. These have been explained in Chapters six *(Gathering),* seven *(Weighing up),* eight *(Judging)* and nine *(Moderating).*

While the majority of nursing research about the assessment of competence focuses primarily on the development of assessment tools, this research highlights that the process of determining competence relies on more than a tool. It is not the tool that determines the outcome of the assessment. It is the assessor and the analytical processes that are employed that bring about a decision. CCNA explains how nurses make decisions and provides evidence that nurses' decisions about competence are underpinned by more than 'best guesses'. They are supported by a body of knowledge and professional experience. Nurses use this in conjunction with comparative evaluative processes that align with scientific method, to determine levels of performance, and calculate competence.

This theory acknowledges the influence of individual nurse's experience, education, and beliefs and values on assessment outcomes. These and factors related to the combination of evaluative and competency assessment methods, the use of generic competency standards and contextual issues are explained. While nurses have devised a number of strategies to combat bias, the potential for subjectivity, which compromises decision-making, remains. CCNA exposes the tensions associated with making competency decisions and how nurses manage the assessment process to ensure that assessment outcomes are reliable and fair.

Based on the professional opinion of the nurses involved in this research, and the literature, recommendations have been made to support the processes used by nurses

to determine competence, and reduce the potential for subjectivity. It is envisaged that these will address the influence of individual nurse's interpretation and understanding of nursing, the uniqueness of the patient and the complexity of the care environment, and the potential impact that these factors have on the validity and reliability of assessment. In order for these recommendations to be successful, nursing education and practice need to make a concerted effort to support each other and work together in partnership to grow the profession's young and strengthen the education and assessment of students.

This research found that the processes involved in making professional judgements about competence are integral to practice, and occur so quickly that nurses may not recognise what they do, or be able to articulate clearly how they arrive at decisions. Despite this, the process that nurses employ to make decisions, and check the validity of these, is robust. These are explained in CCNA, and demonstrated in the diligence applied by nurses to ensure that those people entering the profession are safe to practice. Thus, nurses display an awareness and acceptance of the responsibility they have to uphold professional standards and maintain public safety.

This research makes four important contributions. Firstly, it explains what is currently occurring regarding the assessment of completing Bachelor of Nursing students. Secondly, it explains how nurses formulate professional judgements about competence. Thirdly, the model and concepts identify where the challenges and tensions related to the assessment of competence lie and how nurses currently manage these. It suggests strategies that could be implemented to further address issues related to validity and reliability of assessment, and enhance the robustness of

this. Finally, the theory gives nurses a place to stand, and have confidence in knowing that the judgements they make about competence are well founded. It demonstrates professional judgment is explainable and that the method used to formulate decisions about competence are reasonable, orderly, able to be adapted to differing situations in practice, acknowledges the individuality of students, and is responsive to the demands of the context in which the assessment takes place.

It is acknowledged that, during the five years which this research has taken, work has been undertaken by nurses in practice to align the job descriptions of nurses with NCNZ standards. NCNZ has also taken steps to redesign the competency assessment framework. While this work has had some impact on raising nurses awareness of the competency framework, further work related to this aspect of practice is required.

This work presents a new way of viewing and understanding what we as nurses do in practice when assessing competence. It is hoped that this research and the recommendations arising from it, will make a positive contribution to this, and to the development of competency assessment processes for nursing students in New Zealand.

<u>Appendices</u>

Appendix A

Ethical Approval

VICTORIA UNIVERSITY OF WELLINGTON
Te Whare Wananga o te Upoko o te Ika a Maui

MEMORANDUM

DATE: March 22, 2004

TO: Patrea Andersen

FROM: Allison Kirkman, Convener, Human Ethics Committee

SUBJECT: **APPLICATION FOR ETHICAL APPROVAL: Determining Competency for Entry into Nursing Practice**

Thank you for your application for ethical approval, which has now been considered by the Standing Committee of the Human Ethics Committee.

Your application has been approved and this approval continues until 30 March 2007.

Best wishes with your research.

Allison Kirkman
Convener

**Waikato
Ethics Committee**

PO Box 1031
HAMILTON
Delivery Address:
C/- Ministry of Health
Level 3, BNZ Building
354 Victoria Street, Hamilton

Telephone (07) 858 7021
Facsimile (07) 858 7070
Email juliana_smithells@moh.govt.nz

17 June 2004

Waikato Ethics Ref No: 04/05/042
Please include the reference number and study title in all correspondence

Patrea Anderson
18 Raniera Place
ROTORUA

Dear Patrea

Determining competency for entry to nursing practice

Investigator: **Patrea Anderson**
Reference: **WAI/04/05/042**

The above study has been given ethical approval by the Waikato Ethics Committee.

Approved documents
Appendix 2   - Letter to Participants
Appendix 3   - Participant Information – Informed Consent Form and Declaration
Appendix 4   - Interview Guide
Appendix 5   - Confidentiality Declaration

Certification
The Committee is satisfied that this study is not being conducted principally for the benefit of the manufacturer or distributor of the medicine or item in respect of which the trial is being carried out.

Accreditation
The Waikato Ethics Committee is accredited by the Health Research Council and is constituted and operates in accordance with the Operational Standard for Ethics Committees, March 2002.

Progress Reports
The Study is approved until 1 March 2007. The Committee will review the approved application annually. A progress report is required for this study by May 2005 and thereafter on an annual basis. You will be sent a form requesting this information prior to the review date. Please note that failure to complete and return this form may result in the withdrawal of ethical approval. A final report to be lodged in April 2007.

Amendments
All amendments to the study must be advised to the Committee prior to their implementation, except in the case where immediate implementation is required for reasons of safety. In such cases the Committee must be notified as soon as possible of the change.

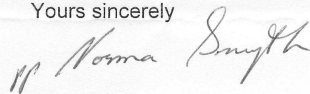Accredited by Health Research Council

Page 2

General

It should be noted that Ethics Committee approval does not imply any resource commitment or administrative facilitation by any healthcare provider within whose facility the research is to be carried out. Where applicable, authority for this must be obtained separately from the appropriate manager within the organisation.

We wish you well with your study.

Please quote the above ethics committee reference number in all correspondence.

Yours sincerely

Peter Allan
Chairman
Waikato Ethics Committee

**Bay of Plenty
Ethics Committee**

234A The Strand
National Bank Lane
Whakatane
Ph/Fax 07 308 5026
Email: adcam@ihug.co.nz

April 23, 2004

Patrea Andersen
18 Raniera Place
ROTORUA

RE: Determining competency for entry to nursing practice.
Investigator: Patrea Andersen
Centre   BOP site specific **BOP/04/03/018**

The Bay of Plenty Ethics Committee considered the above application at its meeting of the 13th April, and advises that the above study has been given ethical approval by the Bay of Plenty Ethics Committee

Approved Documents
- Patient Information sheet (undated) for Patrea Anderson. Victoria University of Wellington
- Letter to Participants

Accreditation
This Committee by the Health Research Council and is constituted and operates in accordance with the Operational Standard for Ethics Committees, March 2002.

Progress Reports
The study is approved until 1st March 2007. The Committee will review the approved application annually. A progress report is required for this study on 23 April 2004. A final/progress report is attaché for copying. Please note that failure to complete and return this form may result in the withdrawal of ethical approval. A final report is also required at the conclusion of the study.

Requirements for SAE Reporting.

Please advise the Committee as soon as possible of the following:
- any study in another country that has stopped due to serious or unexpected adverse events
- withdrawal of Investigational product from continued development
- withdrawal from the market for any reason
- all serious adverse events which result in the investigator or sponsor breaking the blinding code at the time of the SAE or which result in hospitalisation or death.

Accredited by Health Research Council

Amendments:
All amendments to the study must be advised to the Committee prior to their implementation, except in the case where immediate implementations is required for reasons of safety. In such cases the Committee must be notified as soon as possible of the change.

General
It should be noted that Ethics Committee approval does not imply any resource commitment of administrative facilitation by any healthcare provider within whose facility the research is to be carried out. Where applicable, authority for this must be obtained separately from the appropriate manager within the organisation.

Please quote the above ethics committee reference number in all correspondence.

Yours sincerely,

Carol Campbell
Committee Administrator

waiariki
INSTITUTE OF TECHNOLOGY

Whare Takiura
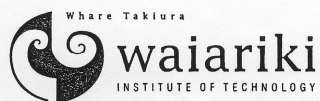
26 March 2004

Patrea Anderson
18 Raniera Place
ROTORUA

Tena koe, Patrea

Thank you for submitting your PhD research outline and ethical approval documents to the Waiariki Research Committee. We have convened with the Research Committee for the School of Nursing and Health Studies to review and approve the portion of your project that applies to the Waiariki Institute of Technology.

The meeting is pleased to commend you on your research and we are in agreement that your project should proceed without hindrance at Waiariki Institute of Technology.

We wish you well with your studies.

Kia ora

Averil Herbert. PhD
(Interim Chair, Waiariki Research Committee)

Alison Anderson. (M.Ed.)
(Chair, Research Committee, School of Nursing and Health Studies)

Wintec
WAIKATO INSTITUTE OF TECHNOLOGY
Te Kuratini o Waikato

Research Connections

W-Block cnr Nisbet &Tristram Streets or
cnr Tristram & Ward Streets
Private Bag 3036
Hamilton 2020
Telephone 07 834 8841
Fax 07 834 8884
e-mail : research @wintec.ac.nz
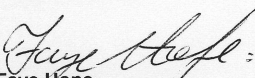
Wednesday 2 June 2004

Patrea Andersen
18 Raniera Place
Rotorua

Dear Patrea

Re: **Your Project "Determining competency for entry to nursing practice"**
Request for persmisson to conduct research involving Waikato Polytechnic
staff and/or students

The attached 2 copies of e-mails are forwarded for your information and noting confirming
"approval" for your above request.

Yours sincerely

Faye Hope
Research Administrator

Appendix B

Recruitment notice – Invitation to participate

VICTORIA UNIVERSITY OF WELLINGTON
Te Whare Wananga o te Upoko o te Ika a Maui

Determining competency to practice of completing third year Bachelor of Nursing students in New Zealand.

This research is being completed as part of doctorial study.

The aim of the research is to discover and explain what is happening regarding determining competency to practice of completing third year Bachelor of Nursing students.

Participants must be Registered Nurses who have two years post registration experience and have been involved in the competency assessment of completing third year Bachelor of nursing students.

Focus group or individual interviews will be used to collect data.

If you are interested in participating in this research further information can be obtained by attending the research information session on (date / venue to be identified). Alternatively contact the researcher directly.

Patrea Andersen

18 Raniera Place Rotorua
Ph (07) 3468753
andersep@waiariki.ac.nz

NOTE: Participation in this study is voluntary. All information participants choose to contribute will be kept confidential

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Letter to invitation

Dear Colleague

You are invited to participate in research that I am undertaking as part of my Doctorial studies. The aim of the study is to discover and explain what is happening regarding determining competency to practice of completing third year Bachelor of Nursing students in New Zealand.

Your experience as a Nurse Educator / Clinician (identify as appropriate) will be valuable to identify the information required. A focus group comprising of you and 5-7 of your colleagues will discuss issues surrounding competency requirements for beginning practice and the processes used to assess this. This discussion and the data generated will be recorded on audiotape and backed up by note taking. It is anticipated that the discussion will last approximately two hours.

Participation in this study is voluntary, and you may withdraw at any time. All information you choose to contribute during this session will be kept confidential by the researcher and their assistant. In the event of publication of the study results, the identity of all of the participants will be protected. Information obtained will not be utilised to compare and contrast the practices of the institutions that the participants represent. The data will be pooled and findings discussed in an aggregated manner. At the end of the study participants will have access to a copy of the results. Data will be kept secure and destroyed after ten years in accordance with Victoria University research requirements.

If you are interested in participating in the study, please complete the attached form and return this to me before (date to be identified) I will contact you and provide further information.

Thank you for your consideration

Patrea Andersen

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Participant response form

Dear Patrea

I am interested in participating in your research about determining competency to practice of completing third year
Bachelor of Nursing students in New Zealand.

NAME: _____

ADDRESS:

_____

_____

_____

PHONE: _____
E-MAIL: _____
Please return this form to Patrea Andersen by (date to be identified)
 (Address supplied)

Appendix C

Participant information

Informed consent form and declaration

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Informed Consent Form and Declaration

Participation in this study is entirely voluntary. Full-informed voluntary consent will be obtained before the commencement of the study. The participants should be aware of the purpose of the study (graduate study), the nature of the research methodology and the possibility of the publication of results.

Purpose of the study

The purpose of this study is to discover and explain what is happening regarding determining competency to practice of completing third year Bachelor of Nursing students in New Zealand.

Invitation to participate

o Thank you for expressing an interest in participating in the above-mentioned study. The discussion in the form of a focus group interview will take place as outlined below:
  Date:
  Time:
  Venue:
o It is anticipated that your participation in this study will require approximately two hours.

The procedure

o The interviews will provide opportunity for the researcher to gain insight into the opinions, beliefs and values of a particular population. In this research data will be collect from nurse educators and clinicians about competency assessment processes, how competency is determined and issues impacting on this
o A series of separate focus group interview will be used to collect data from nurse educators and clinicians.
o Participants will be invited to discuss their beliefs and ideas about competency requirements and what is happening regarding competency assessment processes with a group of 5-7 of their peers.
o The interviews will be semi structured. The researcher will act as the moderator of the group process and will only intervene to refocus the group discussion, invite reticent participants to speak, restart the discussion should this stop, or to clarify issues.
o The interview schedule will be conducted in two parts. The first 15 minutes of the focus group interview will involve the introduction of group members and explaining the procedure to be undertaken. During this time the biographical details of the participants will be collected. The primary information required will include: registration status, postgraduate qualifications held, number of year post registration experience, and area of specialty practice / experience. The following 90 minutes will be spent discussing your experience in assessing competency to practice. This could

include an exploration of the processes used to assess competency, how this is determined (e.g. criteria / evidence of performance), factors that help or hinder the assessment process and information from you about how you think the assessment process could be further developed (if needed). The final 15mins will provide the researcher with time to clarify (if necessary) any issues / points of discussion and conclude the interview by thanking the participants.
o   Participants will receive a copy of the results of the research.

Confidentiality and anonymity
o   Confidentiality of the collected data, data analysis and the report will be maintained.
o   Information obtained will **<u>not</u>** be utilised to compare and contrast the practices of institutions that the participants represent. The data will be pooled and findings discussed in an aggregated manner with **<u>no</u>** reference to geographical area, educational facility or DHB that participants may represent.
o   In the event of the publication of the results from this study, identities of the participants will be protected.
o   All data will be kept secure for 10 years, after which time this will be destroyed.

Participants rights
o   The study will not require participants to undertake anything that would be contrary to the Nursing Code of Ethics
o   Participation in the study is on a voluntary basis. There will be no coercion.
o   Participants may withdraw from the study at any time (without fear of repercussion).

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Consent to participate in the study

Determining Competency for Entry to Nursing Practice

I have read all the information attached and had all my queries answered. My signature below indicates that I have been informed of, and understand the nature, purpose and requirements of the study, and that I have decided to participate.

Signature of participant: ---------------------------- Date ----------

Signature of the researcher: ---------------------------- Date ----------

Appendix D

Participant demographic profile sheet

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Interview: _____

<u>Determining Competency to Practice</u>
<u>Participant Profile Sheet</u>

<u>Personal Details</u>
Please complete the following:

Name: _____

Address: _____

_____

Phone : _____

E-mail: _____

Gender:
Please tick as appropriate   ○   Male   ○   Female

Ethnicity:

_____
Using the ethnicity coding guide on the reverse side of this paper, please
identify which ethnic group or groups you most closely identify with.

<u>Professional Qualifications and Education</u>

Registration status:

_____

First Nursing Qualification:
Please <u>tick</u> what best describes your **first** nursing or midwifery qualification

○ Hospital based training – registered nurse (all categories)
○ Diploma of Nursing – comprehensive
○ Diploma in Midwifery
○ Degree in Nursing / Health Studies
○ Degree in Midwifery

Post registration
Qualifications:_____
Please identify you highest nursing or health related educational qualification.

Continuing Education:
Are you currently undertaking study?   Please tick ○ Yes   ○ No

If you are currently studying toward a Nursing or Midwifery qualification, please tick the qualification you will gain on successful completion (if other please identify)

○   Bachelors Degree   ○ Post Grad Cert (masters level)
○   Masters Degree   ○ Post Grad Diploma (masters level)
○   Doctorate
○   Other

_____

Professional practice and employment

Number of years nursing experience since registration:
_____

Number of years of experience involved in competency assessment:_____

Employment:
Please tick as appropriate   ○ Full time   ○ Part time

Identify hours worked in a typical
week:_____

Current employment setting:_____
Using the employment coding guide on the reverse side of this paper, please identify which employment setting best describes where you work. If more than one estimate % of time in each.

Practice area_____ Using the practice coding guide on the reverse side of this paper, please identify which practice area / specialty best describes your work.

Would you like a transcribed copy of the group interview you participated in? (please tick)
○   Yes   ○ No

Would you like a letter for your portfolio which identifies your involvement in this study as a research participant?
○ Yes   ○ No

In accordance with ethical approval <u>ALL</u> information provided will be kept confidential and in a secure place.

Thank you for your participation in this research ☺

Appendix E

Interview guide

Interview Guide

Explain research

Although participants will have already had the research explained to them and have voluntarily signed informed consent forms, before the interview process commences, the following issues are reiterated and participants given a further opportunity to ask questions and seek clarification if needed.

- Research purpose and aim
- Issues related to participant consent
- Confidentiality
- Publication of results
- Participant rights
- Withdrawal from the research
- Interview process / tape recorder

Interview questions guide

Before questioning commences, participants are made aware that there is no right or wrong answer. Their account / story is important and that it should be considered that the researcher has no prior knowledge.

Sample questions

- Tell me about what's happening in your area of practice regarding competency assessment of students?
- What experience have you had with this?
- Can you tell me more about …?
- What happens when …?
- I don't understand…can you explain…?
- Is there anything else that you think is important?
- In a previous interview a participant said that… how dose this fit with you?
- We've covered a lot of ground and it will take me some time to work my way through the content of this interview. May I come back to you if I have further questions?

Interview conclusion

Thank participants for their contribution

Appendix F

Transcriber Confidentiality Declaration

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Confidentiality Declaration

I, the undersigned, hereby declare that in the process of transcribing data collection tapes for the research undertaken by Patrea Andersen, I will keep confidential any information that relates to any person, hospital, educational institution or other agency that is involved with the research. I acknowledge that I am an agency for the purposes of the Privacy Act 1993 and accordingly undertake to observe provisions of that Act and in particular the Information Privacy Principles contained in Section 6 of that Act.

Signed: _____   Print Name: _____   Date: _____

Appendix G

Transcription template

Transcription template

Memo	
Code	
Transcription	
Line	

Adapted from: Browne, J., & Sullivan, G. (1999). Analysing in-depth interview data using grounded theory. In, V. Minichello, G. Sullivan, K. Greenwood, & R. Axford. (Eds.). *Handbook for research methods in health sciences.* (pp. 576-611). Sydney: Addison-Wesley.

Appendix H

Data management and audit trail

Example of data management and audit trail system for tracking data associated with emergence of codes

| Code	Data/ Text reference and number
Comparing	- Comparing own PJ with other staff's I2-172, I1-586-590 - Sharing concerns and comparing outcome confirms PJ I1-602 - Comparing practice of year 1 and 2 students to define difference in levels of practice I1-536 - Comparing how well student behaviour and skills fit the team I3-616 - Comparing student performance with that of other students I1-755, 80-808 - Comparing previous student performance with current I1-760 - PJ = constant comparative analysis I2- 157 - Comparing measures competency I1-604, 609 - Comparing used as a discriminatory measure in competency assessment I1- 807 - Comparing informs PJ – provides ability to pick up on where students are at I2-614 - Quite a personal thing I2-614 - Comparing - Its human nature to compare I2-1045 - Comparing - We do it all the time I2-158 - Comparing descriptors in student assessment forms assist development of awareness of practice requirements I1-529-531 - Comparing is part of "weighing up" I2-1046, 1047 - Comparing is norm referencing I3- 609 - Element of comparing when measuring competency I3-604, 609

<u>Appendix I</u>

<u>Example of data management and audit trail system for end of each stage of analysis</u>

Example of data management and audit trail system (photographs) for end of each stage of analysis
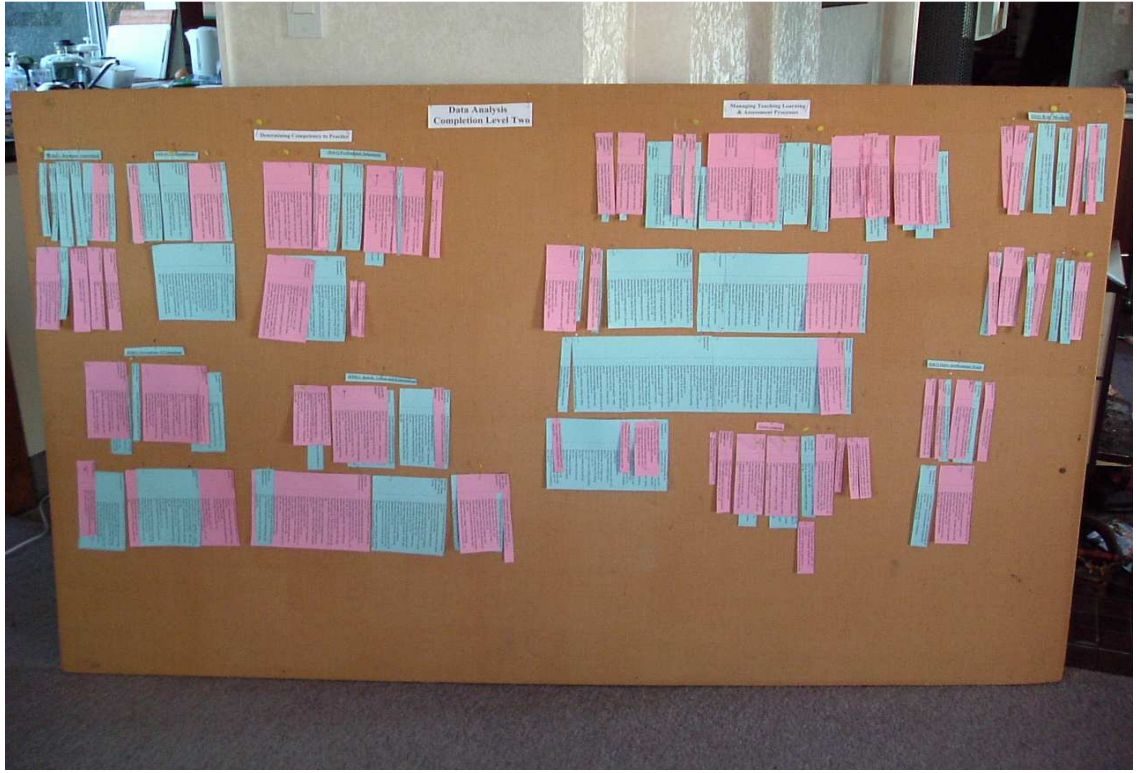
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