TITLE: Drivers for renewal and reform of contemporary nursing curricula: A blueprint for change

AUTHORS:

Cheryl Denise Waters
Email - Cheryl.Waters@uts.edu.au
Senior Lecturer and Director Postgraduate Nursing Studies in the Faculty of Nursing, Midwifery and Health at the University of Technology Sydney

Suzanne Freda Rochester
Email* - Suzanne.Rochester@uts.edu.au
Senior Lecturer and the Director Undergraduate Nursing Studies in the Faculty of Nursing, Midwifery and Health at the University of Technology Sydney

Margaret Anna McMillan FCN (Aust), Order of Australia (AM)
Email* - Margaret.mcmillan@newcastle.edu.au
Professor McMillan is a Conjoint appointment to the School of Nursing and Midwifery, Faculty of Health, University of Newcastle, Australia and a curriculum advisor to the University of Technology Sydney.

KEY WORDS

Undergraduate education, nursing education, curriculum drivers, curriculum development, health services reform, health education reform, graduate abilities

ABSTRACT

The creation of a curriculum blueprint appropriate to the development of a professional nurse who is practice-ready for the current and future context of health service delivery must take account of the extant context as well as an unpredictable and sometimes ambiguous future. The curriculum renewal process itself ought to challenge existing long held ideals, practices, and sacred cows within the health and higher education sectors. There is much to consider and importantly curriculum developers need to be mindful of reform within the health sector and health workforce education, as well as the concomitant vision and requirements of the nursing profession. Curriculum must develop more than discipline knowledge and skills: it must provide an infrastructure for generic abilities both social and intellectual in order to better prepare students for the registered nurse role. This paper discusses a number of forces that are essential to consider in curriculum development in undergraduate nursing education.
Introduction

It may be over a decade in some cases that existing curricula have been in place and as could be expected, despite formative evaluations, there would have been a number of significant changes in the discipline, contexts of employment, higher education, and the health sector. We propose in this paper that these changes scaffold any considerations that drive the revision and renewal of contemporary nursing curricula and provide the blueprint on which implementation is based. Like other professions the discipline of nursing must respond to the political, social and economic landscape. In large part agenda for change has been set down by professional bodies who have responded to drivers for change by revising standards for practice, competency standards, and curriculum accreditation requirements.

Undergraduate nursing curriculum development is shaped by complex and competing forces. At present there are powerful drivers for extensive curriculum renewal. This presents an opportunity for the nursing profession to develop creative curriculum blueprints that accommodate and drive change. Those involved in the education of nurses must aim to build capabilities and maintain processes to improve and sustain graduate outcomes that are consistent with consumer and health service needs. Curricula must be responsive to innovations in practice and learning and teaching.

Nursing students are being prepared for professional practice in challenging, at times unfamiliar, and dynamic health service systems (Duffield et al., 2007) which are likely to undergo significant alteration as they respond to the changing social, political and economic landscape (National Health and Hospitals Reform Commission, 2009). Importantly, curriculum developers need to be mindful of the current and likely future contexts of health care and the concomitant elements of vision and requirements of the nursing profession. Curriculum renewal is an opportunity to better prepare students for the likely trends in society and health care into the future.

The identification of relevant trends, challenges and drivers from both the health care and the higher education sectors is central to the curriculum renewal process. Curriculum renewal is a process that requires *inter alia* careful consideration and the judicious use of information that can come from a range of sources including the government, professional literature, and external advisory committees. This paper is focused on these sources and specifically on: changes in the discipline and contemporary context; recent health services reform; changes within the health workforce; and engaging all stakeholders and members of the broader faculty in the curriculum process by articulating their vision, aspirations and strength to produce a curriculum with some elements unique to the organization in which the students are enrolled.

What is clearly evident in the contemporary environment is a shift in health care delivery from hospital to community care, the growing importance of primary health care, the increasing acuity of in-patient care, chronicity in the general patient population, as well as changing population demographics and epidemiology of disease in our community (Garden, Moore, & Jorm, 2005). Such developments in patterns of health breakdown and health services also call for courses that produce graduates who are focussed on the broadest spectrum of symptom
management, are systematic in their thinking, have particular regard for quality and safety, and who are effective users of point of care and other technologies: graduates who are educationally prepared to respond effectively to emergency situations and recognise the deteriorating patient, and for whom working in interdisciplinary and disciplinary teams is second nature (Clinical Excellence Commission, 2008; Duffield et al., 2007; NSW Department of Health, 2006). Given the dynamic nature of the contexts of care, in addition to those elements of a graduate profile listed above, there is now more than ever a need to acknowledge the importance of maintaining a patient-centred orientation as paramount in graduates, who also have the ability to lead, supervise and delegate to an increasingly unregulated health workforce (Duffield et al., 2007). Recent trends also support what is arguably the most important graduate attribute, that is, the ability to think critically and make sound clinical judgements (Benner, Tanner, & Chesla, 2009). These abilities are achieved through processes that aspire to the achievement of deep learning. This in turn is reliant on active learning pedagogies that generate a curiosity for practice that supports lifelong professional learning. In essence there is an imperative to produce graduates who in the words of Benner et al (2009, p. 370) have learnt to ‘learn for practice’.

Given the complexities of contemporary health care it is critical that educators themselves reflect on both content and processes within the typical curriculum development journey and question the extent to which a thorough appraisal of changes in the discipline and curriculum context has been undertaken.

**Discipline Responses to the Contemporary Context of Care**

Health and higher education guidelines make explicit the structure and processes for university nursing programs to ensure graduates are ‘practice-ready’ for a variety of health delivery settings ranging from traditional hospital and community sites, to ‘hospital-like care’ in the home (Australian Nursing and Midwifery Council, 2006; Benner et al., 2009). The expectation is that undergraduate nursing education is broad based, covers the entire life-span and moves continuously across the health-illness continuum. Furthermore, graduates are required to demonstrate a capacity to manage patient care in the acute and chronic stages of illness and disability, and be particularly responsive to illness that is prevalent within their community: attention to prevalence of disease has focused increasing interest on chronic illness such as diabetes mellitus, asthma, cardiovascular health, and arthritis (National Health Priority Action Council (NHPAC), 2005).

Quality assurance mechanisms are also mandated through professional and university processes and policies. The Australian Nursing and Midwifery Accreditation Council (ANMAC) guidelines require curriculum developers to substantiate processes related to curriculum governance, academic staffing, student support services, and curriculum content. Since the recent nationalisation of nursing registration accreditation processes there is need to make reference to “The standards and criteria for the accreditation of nursing and midwifery courses leading to registration, enrolment, endorsement and authorisation in Australia” prepared on behalf of the ANMC (2009) where each requirement is clearly specified.
The ANMC criteria emphasise the need for pre-registration nursing courses to be designed to produce a new graduate who will meet their Competency Standards for the Registered Nurse (2006) and that the resulting curricula are comprehensively mapped against these standards. They set requirements for the clinical learning components of courses, call for student leadership development and emphasise the need for engagement with the professional community and consumers in the curriculum development process. Importantly, these guidelines call for specific recognition of the needs of marginalised groups within the Australian community. These groups include Aboriginal and Torres Strait Islander peoples, the elderly, and those with mental health disorders.

The neglect of Aboriginal and Torres Strait Islander people’s health issues has been identified by the ANMC as an issue in the curricula and they have responded by incorporating a requirement for an indigenous delegate on curriculum advisory committees. As the ANMC point out nurses are pivotal to the improvement of Indigenous health as they are often the only health workers in some rural and remote communities. The ANMC require that Indigenous Health be included in all nursing curricula and that the development of these elements be undertaken by Indigenous staff. While some elements of Indigenous Health have been included in curricula for some time many universities now provide a discrete subject that addresses these important concerns. The orientation of these subjects is also crucial, with the suggestion that strengths based, rather than problem based approaches be adopted (Australian Nursing and Midwifery Council, 2007). This important aspect of curriculum consideration needs to be reflected in the curriculum design and made explicit at the subject level.

In line with the changing demographic profile of our community and the increase in informative public policy the care of older Australians is an increasing priority for nurses. Nursing needs to be able to understand and support normal aging, as well as manage elderly patients in the acute and chronic stages of illness which is often set against the complexity of co-morbidity (National Health Priority Action Council (NHPAC), 2005).

In 2007 the Mental Health Nursing Education Task Force (Australian Health Ministers’ Advisory Council: Mental Health Nurse Education Taskforce, 2008) strongly advocated the need to improve the curriculum content of undergraduate nursing degrees in regard to the ubiquitous nature of mental health challenges. They identified the substantial increase in mental health issues in main stream care settings and the negative impact of mental illness on ‘lifestyle’ diseases. Based on the prevalence of mental illness they suggested that generic mental health skills were essential for all nurses irrespective of place of work.

Curriculum developers should also be aware of the outcomes of the Nurse and Midwife Leaders Forum (2008) that was sponsored by the NSW Nurses Association in 2007 and which highlighted the need to prepare the recent graduate for management and leadership roles encompassing new models of care in a more digitised workplace. The need for this is further evidenced in the new modalities for health care delivery such as e-health strategies (Australian Health Ministers Advisory Council, 2008). Furthermore, the growing number of unskilled or semi-skilled workers entering the health workforce means that early in their careers new graduates are often required to delegate and supervise the work of others (Conway & Kearin, 2007). Contemporary curricula should incorporate the idea that leadership be developed and nurtured at the
undergraduate level. In this instance leadership preparation would include ways to confidently influence and represent their perspectives within the organisational hierarchy, to be clinical leaders in primary care, and to fulfil the requirements of team leadership and membership under differing models of care.

The ANMC (Australian Nursing and Midwifery Council, 2009) guidelines for accreditation acknowledge that, given the increasingly dynamic nature of health service environments, the likelihood that student nurses will develop confidence and competence for practice in those environments is limited without adequate periods of supported acclimatisation and socialisation to the workplace. That said the curriculum development period is a time to question present models and put improvements in place to enhance the quality of clinical education (Mannix, Wilkes, & Luck, 2009). The extent to which simulation offers alternative or complementary learning experiences to enhance the acquisition of knowledge and skills required for nursing practice can be considered and the potential to maximise capacity through exploitation of the learning events both on and off campus. The assumptions that contact with real patients results in learning, the extent to which the hours of clinical placement results in contact with real patients, or to which the learning around real patients is individualised, must be interrogated through close scrutiny of the purpose and nature of professional experience placements and opportunities for the enhancement of clusters of abilities and skills (Nielson, 2009).

Further to the above comments, clinical education for the health professions is currently under close scrutiny and reforms are in train led by the National Health Workforce Taskforce which is a national body created in 2007 under the Australian Health Ministers’ Advisory Council (AHMAC) committee structures and reports to them directly. Some aims of this work are to improve access to placements, more efficient use and management of existing clinical placements, improve quality and develop and implement models of shared governance for clinical education, foster inter-professional education in the health professions, better training and professional development opportunities for clinical teachers, and more equitable funding models for clinical education (National Health Workforce Taskforce, 2008). Attention is also being given to establishing additional clinical simulation environments as an adjunct to traditional clinical practica. The National Health and Hospitals Reform Commission also recommends reform of clinical education in the health professions and establishment of ‘a National Clinical Education & Training Agency’ (2009, p. 127).

Other elements to consider are the integration of information and communication technologies into and across curricula and the preparation of graduates for contemporary workplace conditions. It is undeniable that during the life of any existing curriculum there will have been a rapid uptake of technology. In a position paper from Nursing Informatics Australia (2007) it was suggested that basic abilities should include the ability to access, retrieve, manipulate, analyse, report and upload data and effectively utilize data for clinical decision making. Therefore, it is imperative that informatics knowledge and skill be integrated within nursing practice and education curriculum.

Graduates have enjoyed high levels of employment but all indicators point to a continuing shortage of nursing resources in some contexts of practice in Australia and internationally. It is reasonable to assume this will continue into the future. The other issue for the workforce and
workplaces is job satisfaction. High levels of casualisation, changing skill mix, high patient acuity and lack of professional recognition and support has resulted in high levels of postgraduate attrition (Duffield et al., 2007). It is important therefore that undergraduate education prepares nurses realistically for the challenges they will face in the workplace and equips them with a solutions focused attitude to solving workplace issues.

The preceding discussion focused on a number of changes in the nursing profession and contemporary context to be considered for curriculum renewal and development. The following discussion interrogates the extent to which a curriculum reflects an integrated awareness of current health care policy, standards, future drivers, and evidence for practice and learning. Consideration needs to be given to the wider external environment to ensure curriculum design has been informed by the following sector reforms.

Health Services Reform

Those concerned with curricula for the health professions are encouraged by policy makers to re-examine their courses for consistency with national strategic directions. The complexities inherent in the management of the continuum of care for clients are more readily apparent in today’s health care environment than ever before and curricula must span this continuum.

Both the Productivity Commission Report (2005) and other State and Commonwealth government reports (Commonwealth of Australia, 2008b; NSW Health, 2006, 2007a, 2007b) presently inform Strategic Plans for the delivery of health care at national, state and regional levels. Plans reiterate a number of common themes that are consistent with the provision of timely, accessible and effective health care. These centre on meeting consumer expectations for:

- fast access to reliable health advice
- access (including time spent waiting for admission or time between admission and allocation to a bed in a ward)
- respect for patient’s values, preferences, and expressed needs (including impact of illness and treatment on quality of life, involvement in decision making, dignity, needs and autonomy)
- effective treatment delivered by trustworthy staff (Productivity Commission, 2005)

Other documents such as NSW Health’s response to the Garling Report (2008) on acute care hospitals in NSW firmly move the patient to the centre of all health-care activity and patient safety in particular to the forefront (NSW Health, 2009). These changes resonate with nursing philosophy and recent practice development initiatives in nursing such as the Essentials of Care project (NSW Health, 2009). Curricula that reflect these changes in course content and learning objectives will emphasise a patient-centred approach. Garling also stresses the need for teamwork, effective communication and an interdisciplinary approach to patient care.

Reform of the Australian health system will continue into the foreseeable future, driven in part by the National Health and Hospitals Reform Commission agenda outlined in the report ‘A
Healthier Future for All Australians’ (2009). This report identifies actions that can be taken by governments to reform the health system incorporating the goals of:

1. tackling major access and equity issues that affect health outcomes for people now
2. redesigning our health system so that it is better positioned to respond to emerging challenges
3. creating an agile and self-improving health system for longer term sustainability’

(National Health and Hospitals Reform Commission, 2009, p. 3)

In addition, the ideas from the Australia 2020 Summit and the Preventative Health Taskforce (PHT) (2009) lead to a greater emphasis on the needs of consumers rather than health professionals, a strengthening of primary health care and an improved capacity to provide care more effectively and in new ways (Daly, Kearney, & Homer, 2008).

Health services are increasingly required to re-orient their thinking towards greater emphasis on Primary Health Care (National Preventative Health Taskforce, 2009). The final report from the Australia 2020 Summit (Commonwealth of Australia, 2008a) provides a long-term health strategy that focuses on the promotion of healthy lifestyles, health promotion, disease prevention, and changes in approach to the health workforce and health services. There are therefore implications for the educational preparation of health professionals including registered nurses.

As the reports above indicate the care landscape is shifting. The context of care is a crucial moderator of not only approaches to care but also the extent to which clinicians need to reconsider the nature of therapeutic relationships. Now more than ever nurses, are engaged in promoting, protecting and maintaining the health of members of the communities of all ages, from ante-natal and early childhood care, to managing the wellbeing of people with chronic illness, and through to palliative care and end of life care in an array of contexts of practice.

The principles of human rights and integrity need to be explored and applied in education and practice in order that nurses safeguard the rights of all people to be treated with respect and dignity in all care contexts. Given the changes in approaches to the management of mental illness and other chronic diseases, there needs to be consideration of the appropriate level of intervention and independence. People experiencing symptoms of acute and chronic mental illness are especially vulnerable and might seek helpful intervention for symptoms associated with their experience of, for example, cancer, chronic illness, heart disease, or stroke. The shift from institutionalized care to the community for many people who have chronic mental illness necessitates a deeper appreciation of what it is like for people with mental illness living in the community, often in group home settings.

Promotion of safety and management of risk have also become central themes in the health sector. The Australian Commission (formerly Council) on Safety and Quality in Health Care (ACSQHC) was established in 2006 (Australian Commission on Safety and Quality in Healthcare, n.d.) to develop a national safety and quality framework. Its aim is to monitor and guide efforts to improve safety and quality across the Australian health care system. Additionally, ACSQHC sponsors the Consumers Health Forum of Australia (CHFA), which has established a charter of health consumers rights (Consumer Health Forum of Australia, 1999); currently, the latter’s aim
is to engage and involve consumers in the improvement of quality and safety in health care. These organisations inform policy makers and health personnel, and highlight the need for risk avoidance.

Reform: Education of the Health Workforce

The 2008 Review of Higher Education explicitly identified a goal of enhancing the role of the higher education sector in contributing to national productivity, increased participation in the labour market and responding to the needs of industry and those labour markets served by higher education (Bradley, 2008). Consistent with these goals the strategic plans for the university sector provide models for teaching and learning. Models generally highlight global practice-oriented learning appropriate to the 21st century.

Furthermore, the Bennett Report recommends ‘a new framework for the education and training of our health professionals which: moves towards a flexible, multidisciplinary approach to how we educate and train health professionals; and incorporates an agreed competency-based framework as part of a broad teaching and learning curriculum for all health professionals’ (National Health and Hospitals Reform Commission, 2009, p. 126).

The curriculum, through the use of authentic clinical scenarios which incorporate inter- or multidisciplinary approaches, needs to be frequently replenished in implementation through collaboration with industry partners which affords access to actual case notes. In addition to this stimulus material, students require exposure to clinical nursing through supervised practice in a variety of practice environments in order to bring this learning back to the classroom (Conway & McMillan, 2006; Tanner, 2006).

When building the curriculum, feedback from clinical personnel who supervise student practice is a rich source of information. Course advisory members also inform the course development and implementation. This ensures authenticity and relevance in the curriculum blueprint as it includes current practitioners and stakeholders. In this way clinical partners share the opportunity and responsibility to influence student learning. Like the students, RNs now have an opportunity to read international nursing literature, consider nursing practice and patient experience from an international perspective, and share their experiences of practice and evidence from the literature with students.

In recent years there has been an increase in the scale, quality and impact of research in our discipline fields that has established the importance of enquiry, judgement and creativity in relation to nursing work and scholarship. Of critical importance to nursing is the value of evidence in the exercise of clinical judgement. Students should be encouraged to value research and recognise the qualities that underpin its validity, reliability and importance to practice. Learning which is research inspired and integrated supports this goal. By utilising nursing laboratories and simulation infrastructure to bring to life enquiry into clinical scenarios, students will be better prepared for clinical practice. A contemporary curriculum therefore is one that invigorates and motivates learning by active problem solving, systematic thinking and reflective processes (Conway & McMillan, 2006).
Developing a Model for Practice and Education: Reform in action

The extent to which the graduates have acquired the ability to function in novel situations and act collaboratively and co-operatively with new professional peers and an increasingly more informed clientele will be immediately apparent to them and others when they commence professional practice. Hence the need for a curriculum model that informs learning events that highlight the nurse’s need to demonstrate appropriate levels of flexibility in their responses to patients’ needs and adequate levels of intercultural awareness and inclusiveness. Learning events must involve the development of high levels of information fluency that will assist nurses to access and process client files and other administrative support technologies to build comprehensive client profiles and provide safe and effective care. Consideration of well developed communication and interaction skills will be critical as they deal with their feelings of insecurity and unease when seeking solutions for their clientele. Newly registered nurses are also often reliant on supervisors and immediate colleagues who are themselves personally extended when dealing with a clientele with high levels of acuity and a shortened length of stay (Conway & McMillan, 2006).

Faculty members can begin the re-conceptualisation of learning and teaching appropriate to the current higher education and health service environments by exploring the contemporary environment and relationships between statements reflecting generic graduate attributes such as employed by most universities and the development of abilities and skills relevant to the discipline of nursing (Bath, Smith, Stein, & Swann, 2004).

An Abilities-Based Conceptual Framework for Nursing

Universities have developed statements reflecting generic Graduate Attributes (Precision Consultancy, 2007) and the relationships between these and the development of abilities and skills relevant to the discipline, in this case of Nursing, needs to be made explicit. The concept of abilities functions as an organizing principle for role performance. Therefore descriptions of effective performance integrate higher education and workplace perspectives.

Alverno College Faculty members defined “abilities” as ‘multidimensional or more specifically, as complex combinations of skills, motivations, self-perceptions, attitudes, values, knowledge and behaviours’ (Rogers & Mentowski, 2004, p. 348). They refer to them as,

‘...broad dispositions - habitual ways of thinking, feeling and acting - as an integral aspect of a multidimensional ability. Faculty members infer abilities from performance assessments - with explicit criteria that integrate disciplinary content with abilities. In this process, integral to student learning, which includes feedback and self assessment, they observe, analyse, diagnose, judge and give credit to students for demonstrating curriculum required abilities in the context of disciplinary content. Development of students’ capacity to assess their own performance is one of the key learning principles underpinning the curriculum’ (Loaker, 2000, p. 28).

Graduate Profile Frameworks reflect the belief that a range of attributes are important to successful graduates, to enable them to live and work in changing contexts, and that personal
and intellectual attributes are best developed in the context of a particular profession or discipline (Bath et al., 2004; Bowden, Hart, King, Trigwell, & Watts, 2004; Precision Consultancy, 2007). The core components that inform the articulation of appropriate attributes for nursing graduates, as mentioned previously, are encompassed in the following: Indications are that graduate health professionals of the future will need to be better prepared to work in inter-disciplinary health care teams, have a strong patient-centred approach to care which is ethically sound, be well versed in primary health care theory and practice, be culturally competent, have the capacity to deliver evidence-based care, have a strong awareness of the critical need for safety and quality in care delivery, the capacity to lead and manage change, and a commitment to life-long learning and professional development. Graduates will also need to be skilled communicators, adept at accommodating and managing diversity in planning and delivering care, and good critical thinkers / problem solvers with the capacity to engage in reflective practice and sound clinical judgement. Therefore keen consideration must be given to teaching and learning experiences which will foster development of graduates who are capable of delivering compassionate, holistic nursing care in a range of settings.

It is important to enhance high levels of information fluency in the professions, industry and communities. University and health service values associated with approaches to learning and teaching, underpin performance and interactions within and across disciplines, with students, strategic partners, and the wider community where practice development occurs.

The health workplace is dynamic, the work is action-oriented and the contexts reflect changing situations, circumstances and conditions. The patient situations to which a nurse must respond are not always well defined and change rapidly. A purely vocational focus limits the potential of the graduate to encompass the broader and more universal concepts of engaged learning and research that facilitates development of a suite of abilities appropriate to the management of complex health breakdown.

Nursing activities are necessary as responses to consumer’s needs. This must inform the learning events and the development of maps that will govern construction of the student’s learning. The workplace is made up of patients/clients who are experiencing symptoms related to a range of pathologies. Hence the nature of the professional activity, and the nature and the structure of knowledge acquisition relevant to the contemporary contexts of practice must inform choices about the stimulus materials for learning events within the curriculum.

Pulling it all together: Crafting the Framework for Renewal

Academics within any Faculty or School need to prepare for an integrated and comprehensive curriculum renewal with an appraisal of feedback from the graduates and current learners on their experiences with the course, an overview of documents and policies informing expectations of consumers for health care, and recent developments in regulation and standards. Additionally, reflections on changes in higher education and health service environments, and statements about outcomes of learning and graduate profiles from a range of universities need to be considered. This process of reflection can be informed by the generation of ideas for strengthening the curriculum blueprint; background reading resources on trends in service delivery; regional data on the most common episodes of care; national priorities for
health; and national and international trends towards greater emphases on Primary Health Care. Also key to any considerations on contemporary blueprints for change are formal data sets reporting on contemporary student feedback and expectations; issues pertinent to cultural diversity, respect and inclusiveness; emerging trends with simulation within the learning process; the centrality of clinical judgement in nurse education and practice; and other examples of ‘abilities-based’ curriculum design.

From the ideas generated, a suite of contemporary course graduate abilities can be created. Refinement of emerging ideas is needed after comparison to evidence from practice and recent publications by key informants on competencies and critical thinking and reasoning processes such as those developed by Benner, Tanner & Chesla (2009); Lasater (2007); and Tanner (2006). These exemplars have the potential to add value to the existing concepts within an embedded curriculum philosophy for teaching and learning that might be over a decade old. Other contemporary documents provide a useful appraisal of statements of Graduate Attributes for example those from the 29 Australian Universities represented in the Graduate Employability Skills (Precision Consultancy, 2007) final report.

The allocation of additional student numbers to the health professions such as nursing and continuing requests from stakeholders for an increase in graduates has compounded existing challenges in providing meaningful on-campus, online, and professional experience placements during undergraduate courses. Furthermore, increasing concerns are expressed about the perceived lack of or variation in, the competence of graduates. These are additional issues that must be addressed within the design of contemporary curricula. Questions need to centre on the feasibility and practicality in the implementation of any curriculum blueprint

Conclusion
Criteria underpinning interrogation of any curriculum for the purposes of renewal should inform close scrutiny of the extent to which the blueprint reflects an integrated awareness of current health care policy and recent reforms within the health services and health workforce. Discipline knowledge and skills development are crucial but other more generic abilities, intellectual and social, are equally critical; there is a symbiotic relationship between the two (Bath et al., 2004). There is therefore a need to achieve a balance between the body of nursing knowledge and other skills such as communication, teamwork, leadership and analytical and critical thinking. Critical thinking about nursing interventions cannot be developed independently of the subject matter and values underpinning the discipline of nursing. When the student develops the generic skill of problem-solving in a discipline nuanced way, the student needs not only to attend to the discipline subject matter at hand, but also the variety of different discipline approaches and contexts in which problem-solving needs to occur, discipline-specific historical and philosophical perspectives on how such problems had previously been solved thereby also increasing their discipline knowledge and skills (Bath et al., 2004).

ACKNOWLEDGEMENTS:
The authors would like to acknowledge the contribution of Professor Denise Dignam, Associate Dean Teaching and Learning, and Professor John Daley, Dean of Nursing.
REFERENCES


