

# The Emergence of Community-Based Nursing Education Programmes in South Africa

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## Abstract

The worldwide changes in the health systems, including the adoption of a primary health care approach, has contributed significantly to the paradigm shift from hospital-based education to community-based education. Community-based education is favoured because of its potential to stimulate interest amongst graduates to serve in rural and under-resourced settings and it has a potential to equip graduates with competencies required to function in a primary health care oriented system. In South Africa, community-based nursing education was first reported in university-based schools of nursing in the early 90's and the first nursing college piloted community-based nursing education in the late 90's. Most of the initiatives were supported by the Kellogg Foundation. The nursing schools adopted a problem-based approach to learning and adult learning principles in their community-based programmes. Literature however reflects that there have been some adjustments in the initial programmes to ensure effective learning and sustainability of these initiatives.

## Introduction

The current health systems worldwide require skilled health workers who can provide care in all health settings, addressing the health needs of all clients across their lifespan. This requires a paradigm shift from hospital-based education and training to education which provides students with an opportunity to learn in non-traditional clinical settings outside the four walls of the hospital or health clinic, such as in community-based settings. Such clinical settings expose students to healthy clients before hospitalisation, where the focus of care is on health promotion and illness prevention. Community-based education is one approach that is used in disciplines such as nursing to facilitate such learning. In South Africa, community-based nursing education was first reported in the early 1990s.

## Background

Community-based nursing education came into being as a result of the move towards community-oriented care which was first reported in South Africa as early as 1940. Two physicians in the Pholela community in Bulwer, KwaZulu-Natal introduced this system of care. This was partially adopted by many

other countries, and was used by the World Health Organisation in their definition of primary health care (Mullan & Epstein, 2002). This paradigm shift impacted on health professional education promoting the adoption of community-oriented or community-based education.

Community-based nursing education is education that uses the community extensively, especially the under-developed and under-resourced settings for learning purposes, in order to enhance the relevance of nursing education and cultural sensitivity to the needs of the South African population (Mtshali, 2005). In South Africa, university-based nursing schools were the first to adopt community-based nursing education. The University of KwaZulu-Natal previously known as the University of Natal introduced community-based nursing education in 1994 (Gwele, 1997, Uys, 1998); the University of Witwatersrand followed in 1995 (McInerney, 1998); the University of the Free State in 1997 (Fitchardt & du Rand, 2003; Fitchardt, Viljoen, Botma, & du Rand, 2000) as well as the Walter Sisulu University School of Nursing previously known as the University of Transkei (UNITRA), (Mdalane, 1997;

Nazareth & Mfenyane, 1999; Mtshali & Gwele, 2003). Community-based nursing education is also reported in the University of the Western Cape and the Pretoria University of Technology and Frere College of Nursing, the first college to pilot community-based nursing education in 1997 and which changed the curriculum in 1998, as well as the Lilitha College of Nursing and its seven satellite campuses, (Mtshali & Gwele, 2003) and the KwaZulu-Natal College of Nursing, mainly the Edendale Campus. The Kellogg Foundation funded most of these initiatives. This paper focuses on four university-based nursing schools (University of KwaZulu-Natal, University of Witwatersrand, Free State University and Walter Sisulu University) which have published information regarding their programmes.

### **Methods**

A narrative literature review which included work published or documented from 1994 to 2011 was used as a source of data. Data sources included journal articles, research-based chapters in books, dissertations and theses, as well as conference papers.

### **Results**

A number of themes emerged from the data. These included rationale for change, guiding theoretical basis, the process of change, teaching/learning process, the nature of community-based nursing activities and issues of concern.

### **Rationale for Change**

A number of reasons were cited for the adoption of community-based nursing education in South Africa. The nursing schools were responding to national and international forces. For example, according to Fitchardt and du Rand (2000) and Fitchardt et al. (2000), the powerful global movement towards Health-for-All by the year 2000, coupled with the necessity to focus national health care delivery systems on primary care (Dana & Gwele, 1997) had an impact. The Agenda for Action by the WHO in 1991 made clear the role of health professionals' education institutions towards meeting the needs of the population they served. Internationally, universities were challenged to prepare health professionals for the prospective needs and demands of the population they served (Fitchardt & du Rand, 2000; Fitchardt et al., 2000).

The political changes in South Africa, the Reconstruction and Development Programme, as well as the change in the National Health Care Policy post-1994, with the emphasis on PHC as a means to improve and maintain the health of the South African population, more especially communities in under-served areas, demanded a paradigm shift in the education approach used (Fitchardt & du Rand, 2000; Fitchardt et al., 2000; Gwele, 1997, Dana & Gwele, 1997). Health professionals' programmes were to be developed to facilitate the production of graduates with the relevant knowledge and skills to serve the South African population (Fitchardt & du Rand, 2000; Fitchardt et al., 2000; Gwele, 1997) and to meet the needs of the rapidly changing health care climate that is challenging the abilities of the professionals who provide health care (Carter, Fournier, Kielh and Sims, 2005; Lashley, 2006) As a result, one of the premises of the University of KwaZulu-Natal's curriculum was that it had to be relevant to the needs of the diverse communities served by its graduates, and that the curriculum content had to be determined by community and learner needs (Gwele, 1997; 1999) to produce graduates in possession of meta-cognition skills (Gwele, 1999; Mtshali & Middleton, 2010).

The 1996 recommendations by the National Commission of Higher Education (NCHE) were cited as one of the stimuli for change (Fitchardt & du Rand, 2000; Gwele, 1999). The NCHE recommended that health education institutions should revise their curriculum to equip the health care students and health personnel educators with the comprehensive knowledge, competency and attitudes to respond to the health care needs of the population of South Africa. Explaining this statement further, Fitchardt et al. (2000) stated that, "In reality this meant contextualising of learning and narrowing the gap between the curricula content and realities of health care practice" (p. 87). Decontextualised learning was also pointed out by Gwele (1997; 1999) who indicated that it resulted from fragmented clinical learning that made meaningful learning impossible. According to Gwele (1999), there was no immediate application of learning from the clinical settings to the classrooms and vice versa, hence the need to review the existing programmes. McInerney (1998) also cited knowledge explosion as one of the reasons for change so as to equip students with lifelong learning skills to cope with the overload.

The literature also revealed that the schools of

nursing were using teaching methods which were not adequately synchronised with the principles of adult learning. There was no active learning or active involvement of students thus promoting passive academic behaviour. As a result, the students were deprived of the opportunity to develop problem-solving and critical thinking skills (Mtshali, 2009; Fitchardt et al., 2000). The schools had to adopt community-based learning using a Problem-based Learning (PBL) approach to promote adult learning, and to facilitate the development of transferable core skills (Adejumo & Gangalimando, Gwele, 1999; Mtshali & Middleton, 2010).

Walter Sisulu University also cited inadequate allocation of resources, especially to health and rural health care settings (Nazareth & Mfenyane, 1999). This lack of resources resulted in limited health care. In addition, the province experienced problems retaining graduates because most of them were attracted to career opportunities in urban areas. Nazareth and Mfenyane (1999) reported that there was a need to recruit and train people in settings that resembled those in which they would serve on graduation. This led to a change from hospital-based training to community-based education.

### **Guiding theoretical basis**

Guided by the health-to-illness continuum model, all programmes adopted a problem-based approach and used community settings extensively as a learning environment (Mtshali & Gwele, 2003; McInerney, 1998). According to this model, the health needs and problems identified from community settings inform the curriculum content, thus making it relevant, up to date, and context driven (Mthembu & Mtshali, 2010). The programme is structured in such a way that nursing students receive exposure to community-based learning experiences as early as their first year of study. They are first introduced to environments with healthy individuals and groups where the focus is on health promotion and illness prevention. They are then introduced to primary health care clinics, hospitals and later to rehabilitation services at a community level (McInerney, 1998; Madalane, 1997). This, according to Mtshali, (2009) gives students a holistic approach to care and equips them with comprehensive skills enabling them to provide care at all levels of the health care system, and the ability to provide care across the lifespan.

One of the guiding principles involved which was

noted in the existing programme is community involvement and community partnership, which, according to Yousif, (2007) is essential in community educational programmes' decision-making and its success. On inception of the programmes, the schools of nursing entered into partnerships with surrounding communities (Adejumo & Gangalimando, 2000). The University of KwaZulu-Natal's School of Nursing, using a multidisciplinary approach that involved students from other health science disciplines entered into partnership with a rural community (Valley Trust Community), a semi-urban community (Austerville Community) and an urban community (Point Community). The Free State University's School of Nursing entered into a partnership with the Mangaung community in the early 90s, and formed a University Community Partnership Programme, (Fitchardt et al., 2000). The involvement of the School of Nursing in this partnership led to the realisation of the importance of a curriculum determined by the needs of the community (Fitchardt, et al, 2000). Wits University's School of Nursing partnered with communities such as Muldersdrift, Alexandra and a Hillbrow community (Hlungwane, 1999; Tshabalala, 1999; <http://www.wits.ac.za/med/nursing>). The Walter Sisulu University School of Nursing joined the Community Health Partnership which was formed in 1991 with the Medical School which now includes disciplines such as pathology, microbiology, basic sciences, social work, other clinical disciplines and a health promotion unit. According to Nazareth and Mfenyane (1999) all the partners are involved in the teaching and learning of students.

### **The Process of Change**

Intensive and detailed preparation for change seemed crucial across all schools for the success of the new programmes (Gwele, 1999; McInerney, 1998, Fitchardt & du Randt, 2000; Fitchardt et al., 2000; Madalane, 1987). Time and resources were invested in a number of ways. For example, workshops were held to familiarise partners with the new approach. A number of training sessions were conducted to develop the staff, especially for their new roles as facilitators in PBL rather than serving as teachers. They also attended several international conferences and workshops on the role of facilitators and the process of facilitation. Networking with institutions running community-based nursing education and problem-based learning programmes

was important, and the exposure of the rest of the staff to field trips in these schools was crucial in creating a sense of understanding and coherence during the implementation of the new programme. McMaster in Canada is one of the universities that supported most of the initiatives. As part of the networking process, universities such as Natal and Free State University obtained membership of the International Network of Community-oriented Educational institutions (Fitchardt and du Randt, 2000; Fitchardt et al., 2000; Uys, 1997).

According to Fitchardt et al. (2000) initiating the process of change at the University of Free State was not without difficulties. Numerous doubts and questions concerning the new curriculum emerged internally and externally. To overcome these barriers, the school implemented Kaufman's four change strategies cited by Fitchardt et al (2000). The strategies implemented involved (a) developing a broad ownership for the proposed innovation, (b) winning converts by inviting participation, (c) forming new alliances to broaden the support base and, (d) sharing success. It was crucial for the planners to build support internally and externally for the successful implementation of the programme. Support was obtained from different departments within the university, as well as from the relevant communities and government institutions.

### **Teaching/learning process**

Although nursing schools shared some similarities in the teaching and learning process, they also approached teaching and learning differently. What was common was that all schools used community-based problems as a starting point. Problems were however presented to students either as raw health problems from the community settings, or in the form of case studies which were based on community problems.

The University of KwaZulu-Natal's School of Nursing according to Adejumo and Gangalimando (2000) divides students into three small groups of about ten each and places them in three different communities; urban, suburban and rural (Adejumo & Gangalimando, 2000; Gwele, 1997, 1999; Uys, 1998). The placement of the students in the community settings takes place during university vacations to avoid clashes with courses run by other faculties (Gwele, 1997; 1999). According to Gwele, (1997; 1999) this occurs among the second year students where community-based nursing

education is predominant. The students start their academic year five weeks earlier than the university timetable. The first two weeks are for orientation to community-based learning, and the remaining weeks are used for hands-on learning experiences. According to Mthembu and Mtshali Gwele (2011) and Gwele (1999), the University of KwaZulu-Natal's School of Nursing follows Kolb's Experiential Learning Cycle. The January period is used to expose students to concrete experiences, conducting community surveys, family studies and epidemiological study. The initial class interactions are used to reflect on community-based learning experiences and on organising community health problems and needs in order of their priority in preparation for group discussions. During group discussions the students interrogate identified health problems in relation to existing theoretical or empirical evidence (Mthembu & Mtshali, 2011). The April vacation is used for the validation of community problems identified at the beginning of the year. The students give feedback to the community on the problems identified at the beginning of the year as part of the validation process, and they are requested to arrange them in order of priority. This assists the students in identifying a priority problem to be addressed during the winter vacation. After validation of these problems, community meetings are conducted with the purpose of prioritising the problems identified, and deciding on one problem which the students can target for joint community intervention during the winter vacation. The community intervention provides a platform for the students to apply the knowledge they have constructed during class interactions. The whole community-based learning experience culminates with community members evaluating the whole exercise from the beginning of the year. A special day to show case community-based activities is held during the September vacation known as 'Expo Day' (Gwele, 1999). On this day, the three groups present their community-based interventions and reflect on their experiences and how those experiences have facilitated their personal and academic growth. As stated in Gwele (1999), the community members, nursing services and other health professionals, parents, university personnel, the students and prospective students attend the expo. The expo is also used as a platform to introduce new groups of students to community-based learning, as the community setting used is a totally different setting to

that of the hospital (Gwele, 1999).

The University of Witwatersrand, school of nursing uses a mix of authentic problems and problems presented in cases for teaching and learning. Small tutorial groups are used, within which adult learning principles are observed. In the tutorial groups, the students are presented with problems emanating from real life situations encountered in the community or in clinical situations. The students are expected to be actively involved in working on these series of health problems. The facilitator is there to assist in the learning process (McInerney, 1998). The whole learning process is supported by a wide range of educational resources - the library, expert lecturers and tutors, workshops, video and computer-based learning packages, lectures and seminars, site visits and clinical tutorials (<http://www.wits.ac.za/med/nursing>). During the first six months in the community-based nursing education the first year students are allocated to different community sites for orientation in respect of community issues, environmental health and community assessment (McInerney, 1998). Exposing the students to community settings as early as in their first year not only allows the students to get to know the community, but also permits them to attain a deeper understanding of the community and the real problems in the community (<http://www.wits.ac.za/med/nursing>).

The focus in second year at the Wits School of Nursing is on the individual suffering from illness, the disordered family and community (McInerney, 1998). It is at this level that the nursing students are more involved in Hillbrow Community Partnership Initiatives which are multi-disciplinary. Students participate in partnerships with students from other faculties such as environmental health, medical students, social work and other technikon students to conduct a community assessment. They compile a community profile on the health of the community in Hillbrow, and the surrounding community (Hlungwane, 1999). The third year students work at the clinics for their community-based learning experiences as a follow-up to the case scenario of a client who is discharged from hospital. They follow that client at the clinic and in his or her community for continuity of care (<http://www.wits.ac.za/med/nursing>). In the fourth year, the students learn and deliver supervised services in relation to midwifery, which is referred to as women's health. At the primary health care clinics the students' focus is

on maternal and child health (Tshabalala, 1999). They are placed at the clinics serving the community to which they have been exposed, and this placement gives them an understanding of the clients in their context. The nature of services and facilities in the health centre offers a conducive, multi-disciplinary environment for community-based teaching and learning of undergraduate students (<http://www.wits.ac.za/med/nursing>).

According to Mthembu and Mtshali (2011) and Mtshali and Gwele, (2003) the Free State University's School of Nursing uses case studies during class sessions. Cases are based on the problems either drawn from the community setting or the health facility as a context in which to learn problem-solving skills (Fitchardt & du Rand, 2000). Experts from other disciplines contribute to the formulation of these cases to facilitate a holistic multi-disciplinary approach to care. Fitchardt et al. (2000) reported that the principles underlying the teaching methodology used include a shifting of learners towards independent learning, moving away from the narrow world of the teacher and the text; the development of analytical and creative thinking; the development of self-directed learning abilities; the encouragement of cooperative learning; the integrated application of skills and knowledge in the context of practice, and the encouragement or motivation to engage in learning. Although the problems are presented in the form of case studies, the students get exposure to community settings where they also conduct community needs assessments, family studies, and implement their community-based projects (Mtshali & Gwele, 2003). According to Fitchardt and du Rand (2000) the community is used extensively as a learning environment to give students an opportunity to understand the capacities and initiatives of the community they serve, as well as to sensitize them to different cultures. Because both the students and the community should benefit from the community-based nursing education programme, the community is also given an opportunity, through interaction, to understand the strengths and limitations of the health care system, and in that process of interaction to learn to take care of themselves (Fitchardt et al., 2000).

In the Free State University's School of Nursing programme, the community's involvement is more obvious during the placement of the students in the community (Fitchardt et al, 2000). The community

members accompany the students in the community setting to familiarise them with the environmental and cultural activities in the community. The community members also accompany those students who are not familiar with the language spoken by the community. The community sometimes assists by translating for some of the students who have a problem in understanding the language used by the community (Fitchardt et al., 2000). The community is used as an environment from which to derive problems which can be used in the classrooms as part of the curriculum content (Fitchardt & du Rand, 2000; Fitchardt et al., 2000). The students are divided into small groups, with the facilitator facilitating their learning process. There is also a coordinator who coordinates community-based learning activities and accompanies students to the community settings. This person serves as a link between the school and the surrounding communities.

Madalane (1997) reported that in the Walter Sisulu University School of Nursing, the first year nursing students are placed in the community once a week throughout the year, while second year students spend three weeks and third years spend two weeks in the community. This means that the students are exposed to community-based learning as early as in their first year of study, and the community-based nursing education activities continue throughout the first three years of the programme. The students at the UNITRA are divided into small groups of about 10 with one facilitator (Madalane, 1997). The students are exposed to community-based learning activities throughout the programme.

### **Nature of community-based activities**

The purpose of the community-based activities is to contribute to positive change in the community and to facilitate self-reliance and self-determination from the community (Mtshali & Gwele, 2003). Community-based activities include clean-up campaigns, health education and information sharing days, income-generating projects such as vegetable garden projects and sewing projects which are maintained by unemployed community members. Other community projects include a feeding scheme, a road safety project, and youth projects encompassing a variety of youth activities for youth development (Mtshali & Gwele, 2003; Banda & Bruce, 1999; Madalane, 1997).

### **Some Issues of Concern**

Using authentic health problems acquired directly from the community to inform learning seems to pose a challenge, because the nature of the problems varies from time to time. Some of the problems may be omitted because they were not identified as such at the time of conducting a needs assessment, or were not rated as priority problems. More importantly, all disciplines have core knowledge which needs to be addressed. To deal with this challenge, nursing schools are now using both case studies and authentic problems (Mthembu & Mtshali, 2011; Mtshali & Gwele, 2003). Case studies are designed in such a way that the required core content is included in the case studies used (McInerney, 1998; Mthembu & Mtshali, 2011).

Security during the placement of students in the communities is one of the main concerns. Efforts such as working closely with local police stations and ensuring that the students have the contact details of police officers they can contact at any time if they encounter a problem while they are in the community; sharing a clear plan of community placement of students with key figures to ensure that they are aware of the days and where and when the students will be in the community; having a known safe community base such as a local clinic or school where the students gather in the mornings and at the end of the day have been considered (Mtshali & Gwele, 2003).

Transport for the students to the community is one of the challenges. For example, the University of KwaZulu-Natal had to change the rural community site because, although it presented a rich learning experience, it was inaccessible by public transport. The school managed well while they had the Kellogg Foundation's financial support because they could hire transport to take the students to any community site (Mtshali & Gwele, 2003).

Other areas of concern include the fluidity of some of the urban communities such as Hillbrow which was used by Wits and the Point area which was used by the University of KwaZulu-Natal. This poses a challenge when it comes to ensuring the continuity and sustainability of the community initiatives (Mtshali & Gwele, 2003), Competition over learning experiences and exhaustion of the community if the community is used by a number of institutions and disciplines can also become a problem (Mtshali & Gwele, 2003). Equal partnership between the academic institutions and community members

seems to be a challenge, as the parties have different agendas. This has to be clarified at the beginning of the partnership, and a consensus has to be reached regarding the role and benefits of both partners in the partnership (Linda, Engelbreth & Mtshali, 2008; Mtshali, 2008; Mtshali & Gwele, 2003).

Most of the schools have lost the original teaching staff trained to implement community-based education. Some of these people have been promoted to higher positions which process has removed them from teaching, some have moved to other institutions, and others have resigned to pursue different careers or have retired. One of the institutions (University of KwaZulu-Natal) is addressing this challenge of staff shortages by involving postgraduate students who are doing nursing education. These students are responsible for the different small groups of students and they work under the guidance and leadership of academic staff who underwent special preparation in community-based education (Mtshali & Middleton, 2010). The Free State University's School of Nursing breaks the big group into smaller groups and the facilitator has class sessions with the groups at different times (Mthembu & Mtshali, 2011). There is, however, a staff member who is responsible for community-based learning activities who also ensures consistency is maintained in what the students learn (Mtshali & Gwele, 2003).

## **Discussion**

The primary reason for the paradigm shift cited in the text reviewed was the drive to strengthen the health care system by producing competent nurses who are equipped to meet the needs of the South Africa population, including those in rural and under-resourced areas. More importantly, graduates produced must be socially accountable and culturally informed as South Africa is characterised by diverse cultures. This is in line with Kaye et al. (2007; 2011) and Villani and Atkins' (2000) argument for community-based education as it goes beyond cognitive capacities and encompasses the social and emotional aspect, and increases the interest in the uptake of careers in rural and under-resourced settings (Strasser, 2010). According to Anderson, Calvin and Fongwa (2011) cultural competence in nursing education is facilitated through using community settings extensively as one with the clinical learning settings, involving community

members in the learning of the students, and through establishing effective partnerships with the communities. This approach ensures that the education of nursing students is also culturally relevant. Furthermore, while students' learning facilitates the development of relevant community-oriented skills, they also learn experientially by providing hands-on service to the community, thus increasing access to health care, as also stated in Kaye et al. (2011). Community-based education thus brings another dimension to the education and training of nurses.

One of the observations, however, is that although community-based education is implemented by a number of nursing education institutions in South Africa, there is no standardisation in the implementation of this phenomenon, which there should be, even if this means having a guiding framework by a regulatory body to monitor quality and consistency in the existing programmes. For example, the regulatory body could provide specifications regarding clinical settings such as hospitals and health clinics suitable for the placement of students. There are no criteria regarding the nature of community settings suitable for the placement of students.

The literature reviewed revealed a need for areas of further research. For example, there is limited reporting, if any, on the assessment of community-based nursing education in South Africa. More importantly, community-based education has been in existence for more than 15 years in South Africa, therefore there is a need to conduct a national study that will evaluate the implementation and the effectiveness of the existing CBNE programme. Most of the programmes were initiated with the financial support of external donors as they are heavily resource-reliant. Some of the programmes had to be modified as a result of limited resources. Institutions have to explore strategies that can be used to sustain their educational programmes when donor funds run out. Programme sustainability should form part of the initial planning process.

## **Conclusion**

Community-based education is practiced by a number of nursing education institutions in South Africa. It is used as one of the strategies to produce graduates who are competent to meet the health needs of the current health system and the needs of the diverse South African population. The

involvement of the surrounding communities emerged as critical in achieving the desired competencies from the graduates produced. This paradigm shift was not only reported in the clinical settings used for the placement of students, it was also reflected in the changes and innovations in methods of teaching in the classroom, applying the principles of adult learning and student-centred and active learning. Implementing community-based education is not without challenges, but the nursing education institutions discussed came up with creative solutions to meet these challenges.

## References

- Adejumo, O. & Gangalimando, M. (2000). Facilitating positive attitudes toward an innovative programme for baccalaureate nursing education: Example from the clinical settings in Durban. *Curationis*, 1, 3-7.
- Anderson, N. L.R.; Calvillo, E.R. & Fongwa, M.N. (2007). Community-Based Approaches to Strengthen Cultural Competency in Nursing Education and Practice. *Journal of Transcultural Nursing*, Supplement to Vol. 18 No. 1, 49S-59S.
- Banda, J., & Bruce, J. (1999). Community-based activities. University of the Witwatersrand, Faculty of Health Sciences: Department of Nursing Education, p. 6.
- Carter, K.F.; Fournier, M.; Kielh, E.M. & Sims, K.M. (2005). Innovations in Community-based Nursing Education: Transitioning Faculty. *Journal of Professional Nursing*, 21,(3), 167-174
- Dana, N. & Gwele, N. S. (1998). Perceptions of student nurses of their personal and academic development during placement in the community as a clinical learning environment. *Curationis*, 1, 58-64.
- Fitchardt, A. & du Rand, P. (2000). Facilitators' perceptions of problem-based learning and community-based education. *Health SA Gesondheid*, 5, (2), 3-10.
- Fitchardt, A. E.; Viljoen, M. J., Botma, Y. & du Rand, P. P. (2000). Adapting to and implementing problem and community-based approach to nursing education. *Curationis*, 3, 86-91.
- Gwele, N. S. (1997). The development of staffs concerns during the implementation of problem-based learning in a nursing programme. *Medical Teacher*, 19, (4), 275- 284).
- Gwele, N. S. (1999) Experiential learning in action: A programme for preparing educators for health professionals.
- Hlungwane, M. (1999). The Hillbrow community partnership in health personnel education. University of the Witwatersrand, Faculty of Health Sciences: Department of Nursing, p 18.
- Kaye, D. ;Mwanika, A; Burnham, G.; Chang, I.W.; Mbalinda, S.N.; Okullo, I.; Nabirye, R.C. Muhwezi, W.; Oria, H.; Kijjambu, S.; Atuyambe, L. & Aryeija, W. (2011). The organization and implementation of community-based education programs for health worker training institutions in Uganda. *BMC International Health and Human Rights* 2011, 11(Suppl 1):S4 <http://www.biomedcentral.com/1472-698X/11/S1/S4>
- Lashley, M. (2006). Teaching community based nursing in a parish nurse faculty practice *Nurse Education in Practice* 6, 232-236
- Linda, Z.; Engelbrecht, C. & Mtshali, N.G. (2008). A Phenomenological Investigation of Community Involvement in UKZN Community-Based Nursing Education Programme. Unpublished Dissertation, University of KwaZulu-Natal.
- Madalane, L. D. (1997). Analysis of students' views concerning clinical supervision and learning opportunities in community settings. (Unpublished Manuscript) University of Natal, Durban.
- Mash, B. & de Villiers, M. (1999). Community-based training in family medicine: a different paradigm. *Medical Education*, 33, (10), 725-729.
- McInerney, P. A. (1998) Recurriculating to problem-based learning curriculum: The Wits experience. *Curationis*, (5), 53-56.
- Mthembu, N.S. & Mtshali, N.G. (2011). Knowledge construction in community-based Service Learning Nursing Programmes: A grounded theory approach. Unpublished Thesis, University of KwaZulu-Natal.
- Mtshali N.G. & Middleton, L. (2010). The Triple Jump Assessment: Aligning Learning and Assessment- Chapter 14. In T. Barrett & S. Moore (Editors). *New Approaches to Problem-based Learning Revitalizing Your Practice in Higher Education*. Taylor & Francis Ltd: Routledge, UK.
- Mtshali N.G. (2009). Implementing community-based education in basic nursing education programs in South Africa. *Curationis*, 32(1):25-32.

- Mtshali N.G. (2005). Conceptualisation of community-based basic nursing education in South Africa: a grounded theory analysis. *Curationis*, 28(2):5-12.
- Mtshali, N.G. & Gwele, N.S. (2003). A grounded theory analysis of Community-based education in basin nursing in South Africa. Unpublished Thesis. University of KwaZulu-Natal.
- Mullan, F & Epstein, L 2002: Community-oriented primary care: New relevance in a changing world. *American Journal of Public Health*, 92, (11), 1748-1725.
- National Commission of Higher Education (1996). NCHC Report: a framework for transformation. Parow (SA): CTP Book Printers.
- Nazareth, I. & Mfenyane, K. (1999) Medical education in the community- the UNITRA
- Schmidt, H. G.; Magzoub, M.; Felletti, G.; Nooman, Z. H. & Vluggen, S. (2000). Handbook on community-based education. Maastrich: Network Publications.
- Strasser, R. P, (2010). Community engagement: a key to successful rural clinical education. *Rural Remote Health*, 10:1543.
- Tshabalala, M. (1999). Alexandra health centre and university clinic. University of Witwatersrand, Faculty of Health Sciences: Department of Nursing Education, p. 17.
- University of Witwatersrand, School of Nursing, Outreach - Community Based Activities. Retrieved March, 15, 2001 from <http://www.health.wits.ac.za/nursing>.
- Uys, L.R. (1998). University of Natal, School of Nursing. Network of Community-oriented Educational Institutions for Health Sciences Newsletter, 28, 19.
- Villani, C. J. & Atkins, D. (2000). Community-based education. *School Community Journal*, 10, (1), 121-126.
- Yousif, T. K. (2007). Toward a better community based education program in Iraq. *The Middle East Journal of Medical Education*, 5, (4), 8-11.