A DESCRIPTION OF THE PRACTICE OF ADVANCED MIDWIVES

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A DESCRIPTION OF THE PRACTICE OF ADVANCED MIDWIVES

BY

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DECLARATION

I declare that the dissertation hereby submitted by me for the Master's Degree in Social Sciences (Nursing) at the University of the Free State is my own independent work and has not previously been submitted by me at another university. I further cede copyright of the dissertation in favour of the University of the Free State.

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Nozimanga Gladys Lesia

May 2011

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DEDICATION

I would like to dedicate this dissertation to my late Father; Phillip Plaatjies, late Husband Setlhare, and my children, Thato, Nkamoheleng and Tsebo; for their endless patience, understanding, love, support, encouragement, and the confidence they had in me during the difficult times of my study. To the rest of my family, whom they are too many to mention, thank you for standing by me.

ABSTRACT

Midwives, in the absence of medical practitioners are the most readily available health professionals to render care in Primary and Community Health Care settings. After obtaining a qualification in Advanced Midwifery and Neonatology, midwives should be placed and utilized in areas where they can use their competencies for the benefit of the mother and the baby.

The aim of this study was to describe the practice of advanced midwives including their placement and utilization. A non-experimental and descriptive design was used. After a thorough literature analsis as well as a focus group discussion was done, a questionnaire for data collection was compiled. The data was collected after approval was obtained from the relevant roleplayers as well as from the Ethics Committee of the Faculty of Health Science from the local University.

The population consisted of all (178) practicing advanced midwives who trained at the University of the Free State during 1995-2007. No sampling was done and 178 questionnaires were distributed to the practicing advanced midwives. Sixty nine questionnaires were returned (39% return rate) and analysed.

The findings indicated that only 13 (n=13, 19%) of advanced midwives were placed and utilized correctly. Advanced midwives that were not placed and utilized correctly expressed a loss of self-confidence, lack of support and a lack of recognition. They also reported an inability to demonstrate their expertise in practice due to inappropriate placement and utilization.

Nurse academics and Advanced midwifery Practitioners should publish research articles in Health Sciences Journals to make their competencies known. That might ensure that they are recognized by their colleagues and given the opportunity to practice what they have trained for.

OPSOMMING

In Primêre - en Gemeenskapgesondheidsorg Instansies is vroedvroue, in die afwesigheid van mediese praktisyns, meer beskikbaar om die nodige sorg te verleen. Nadat ’n kwalifikasie in Gevorderde Verloskunde en Neonatologie behaal is, behoort gevorderde vroedvroue in areas geplaas te word waar hulle, hul bevoegdhede tot voordeel van moeder en baba, kan aanwend.

Die doel van die studie was om die praktyk van gevorderde vroedvroue, insluitend waar hulle geplaas is en of hulle bevoegdhede daar benut word, te beskryf. ’n Nie-eksperimentele, beskrywende studie is gedoen. Na voltooing van ‘n deeglike literatuur analise sowal as ’n fokusgroeponderhoud, is ’n vraelys vir data-insameling saamgestel. Nadat goedkeuring van die Etiekkomitee van die Fakulteit Gesondheidswetenskappe van die plaaslike universiteit, sowel as ander rolspelers verkry is, is data versamel.

Die populasie het bestaan uit alle (178) praktiserende gevorderde vroedvroue wat gedurende 1995-2007 by die Universiteit van die Vrystaat afstudeer het. Geen steekproeftrekking is gedoen nie en honderd agt en sewentig (178) vraelyste is aan die praktiserende, gevorderde vroedvroue gestuur. Nege-en-sestig (39% responskoers) vraelyste is terug ontvang en is vir ontleding gebruik.

Die bevindinge het aangedui dat slegs dertien (n=13, 19%) van die gevorderde vroedvroue korrek geplaas en benut is. Gevorderde vroedvroue wat nie korrek geplaas en/of benut was nie, het gemeld dat hulle ’n gebrek aan selfvertroue, gebrek aan ondersteuning en gebrek aan erkenning ervaar. Hulle het ook genoem dat hulle, as gevolg van verkeerde plasing en/of onvoldoende benutting, nie instaat is om hulle ekspertise in die praktyk toe te pas nie.

Verpleegkundige akademici en gevorderde vroedvrou praktisyns behoort navorsingsartikels in Gesondheidsorgjoernale te publiseer om te verseker dat hulle bevoegdhede aan andere bekend gemaak word. Dit mag verseker dat hulle deur hul kollegas erken sal word en die geleentheid gegee sal word om die vaardighede en bevoegdhede waarvoor hulle opgelei is, te implementeer.

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CHAPTER 1

INTRODUCTION AND PROBLEM STATEMENT

1.1 INTRODUCTION

South Africa (SA) is known for its maldistribution of health care workers in the public sector (Sanders & Lloyd, 2009: Online). According to the statistics from the Health Professional Council of SA (HPCSA) and the South African Nursing Council (SANC), there were 36,003 medical practitioners and 115244 registered nurse/midwives in South Africa in 2010 (HPCSA Statistics, 2010: Online; SANC Statistics, 2010: Online). The nurse/midwife is the most readily available health professional in the absence of a medical practitioner (Fraser, Cooper and Nolte, 2010: 6) Doctors in particular, are mainly concentrated in the peri-urban hospitals while in the rural hospitals and the Primary Health Care (PHC) settings, there is a shortage.

The choice of rural versus urban distribution of health care workers rely heavily on various factors such as communication systems, availability of facilities and opportunities for career advancement (Dussault and Franceschini, 2006: Online). This maldistribution, becomes a crippling factor in health care delivery; and therefore, midwives are faced with challenges of working independently to support and form a backbone of the health care system. These challenges include having freedom to act on behalf of childbearing women, working in partnership with them and having the knowledge and capability of providing continuity of care for normal pregnancies all in the best interest of a woman, fetus and newborn (Fraser et al., 2010: 7).

Statistics on “Saving Mothers’ Report ” of 2005-2007 indicates a total of 4077 maternal deaths (South African National Department of Health, 2005-2007: 1). In addition to this statistics, the SA Department of Health for the Free State (FS)

province, reported a total number of 500 maternal deaths in a three year period [2006-2008] (Belot, 2008: Online). To reduce these figures and improve the quality care, doctors and advanced midwives should work in partnership. Based on the fact that there is a shortage of doctors in this country, and that trained medical practitioners are not willing to work in rural areas; advanced midwives should be placed and utilised mostly in rural areas (Yadav,Jarhyan, Gupta & Pandav,2009: Online).Their placement and utilisation should be directed in maternity care centers so that the Millennium Development Goals (MDG) 4 and 5 which aimed at reducing child mortalities with a target of two- thirds reduction, and of improving maternal health, through reduction of maternal mortalities by 75% respectively, could probably be achieved by 2015 (United Nations, 2002: Online).

In order to ensure that there is improvement in maternal health, advanced midwives cannot only depend on routine procedure manuals or traditions that used to guide their clinical practice and decision making, but should apply their skills and knowledge acquired during training. In rural areas, midwives themselves have to deal with many obstetrical and midwifery complications independently, while in urban and peri-urban hospitals, doctors are concentrated and always available to deal with complications (Fraser et al., 2010:10).

Based on the above mentioned statement, advanced midwives, should be well trained and be prepared to cope with both normal and complicated midwifery situations. They should be able to consult and collaborate with physicians when women in their care develop complications. Competent advanced midwives should adhere to the principles of “Safe Motherhood”; and avoid delay in rendering appropriate care to clients after arriving at the facility (De Graft-Johnson, Kerber, Tinker, Otchere, Narayanan, Shoo, Oluwole & Lawn, 2006: Online).

In 1992, a survey and situation analysis was conducted by the University of the Free State (UFS) that indicated the need for training midwives as clinical nurse specialists (advanced midwives) who will be able to cope with the increased responsibility of working independently (Fichardt, 1996: 6). Responding to this need the Free State community and the School for Nursing (SoN) at the UFS initiated a programme of diploma and clinial masters degree in Advanced Midwifery and Neonatology.

This programme was originally implemented through problem based learning (PBL) approach. Between 2002 and 2004, an Interactive Learning Communication and Management (iCAM) approach was introduced, which was later rejected due to poor broadcasting problems encountered. Presently mixed teaching strategies (approaches) like community-based learning, student-centred or cooperative approach and PBL are being used by the School of Nursing in the education of Advanced Midwifery and Neonatology. The importance of mixed teaching models are to enhance effective teaching in adult learners as most of the students involved are adults (Adams & Angermeyr, 2008: Online).

Between 1995 and 2007, hundred and seventy eight (178) students obtained a qualification in Advanced Midwifery and Neonatology at the UFS. Some of these advanced midwives are now working in private sectors, in rural areas or in Primary Health Care (PHC) centres where there are few or no doctors on site. The placement and utilization of advanced midwives in these areas, was also emphasized at the Reginal Meeting for the Review of Midwifery Standards and Practice Regulations held in South Africa, Johannesburg (WHO, 2004: Online).

1.2 PROBLEM STATEMENT

According to a Report on the Evaluation of Advanced Midwifery Training (1998), advanced midwives experienced lack of support and resistance from senior midwives who did not approve of them for being in-charge of maternity units. Furthermore, the shortage of staff is reported as another factor that prevents advanced midwives from funtioning effectivelly.

Although the WHO (2006: Online) indicates that there is a gross maldistribution of midwifery health providers in rural and PHC centres, the correct placement and utilisation of avilable advanced midwives should be considered.

Based on the problems stated above, questions that now arise are:

(1)"Are the advanced midwives who were identified by the community as an important need, and trained at the UFS, placed and utilized correctly, and (2) Can they function independently as specialists in midwifery and neonatology?."

1.3 THE AIM OF THE STUDY

The aim of this study is to describe the practice of advanced midwives trained by the School of Nursing at the UFS.

1.4 OBJECTIVES OF THE STUDY

In order to describe the practice of advanced midwives, the following objectives will be relevant. To:

Determine whether advanced midwives are being placed correctly

Determine whether advanced midwives are utilized correctly.

Determine whether advanced midwives feel that they are competent enough to function independently.

Identify factors that influence the practice of their skills.

Make possible recommendations for the placement and utilization of advanced midwives and

1.5 CONCEPTUAL FRAMEWORK

In order to enable the researcher to develop a logical meaning of the study, a conceptual framework of the study is depicted in figure 1.1

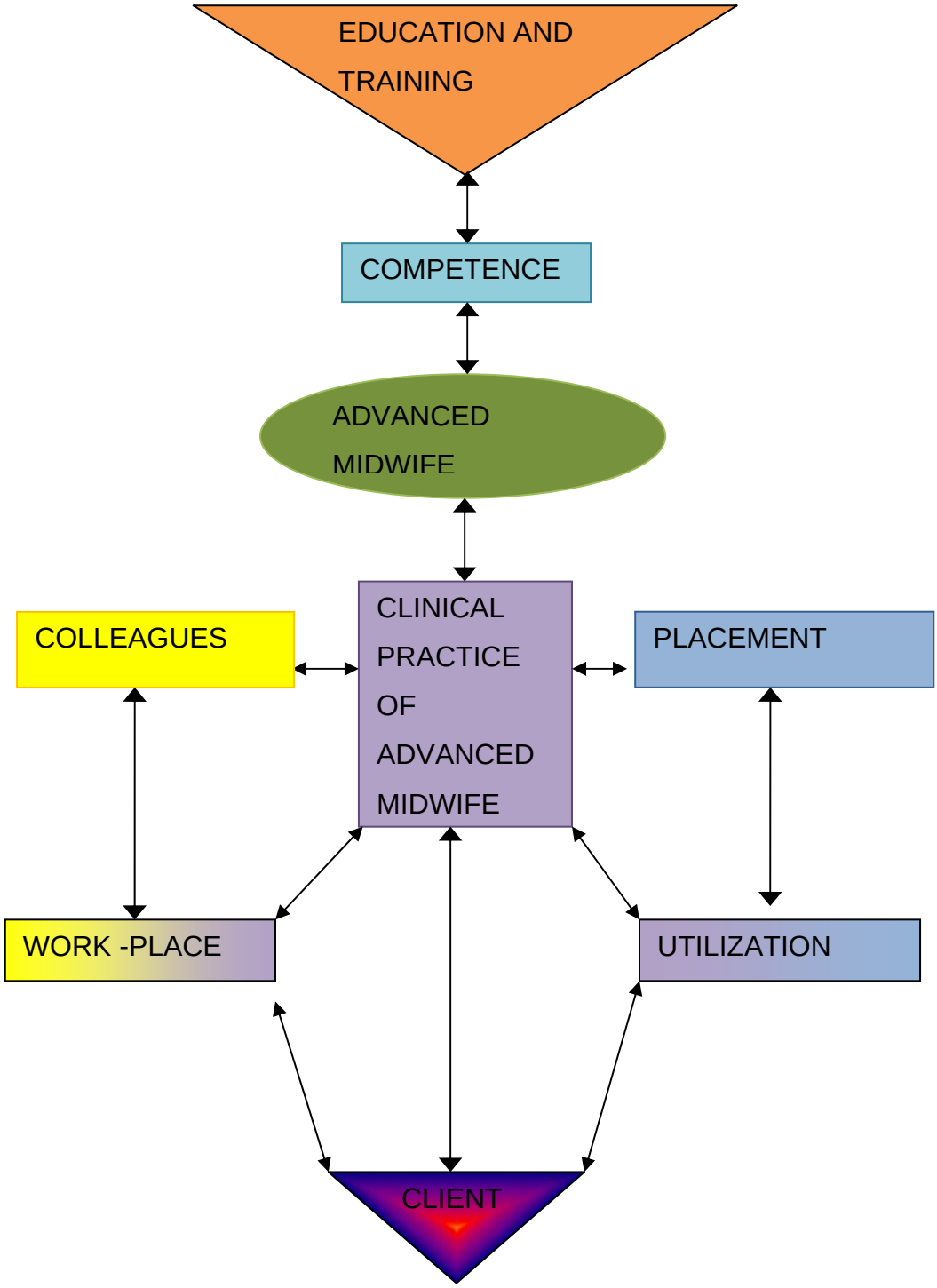

FIGURE 1.1: CONCEPTUAL FRAMEWORK

The above illustration indicates that, through **education** and **training**, an **advanced midwife** should have acquired **competency** in order to work independently. In

practice the advanced midwife's continuous interaction or engagement with **colleagues** should display a healthy or a mature kind of relationship which acknowledges his/her expertise on midwifery issues. His/her ideal clinical **placement** should match with both theoretical and practical preparation acquired during training so that he/she is properly **utilized** in the relevant area with the objective of ensuring that in his/her presence, the **client** receives the best possible care. The **work-place** in which he /she is placed and utilized should be well equipped with all resources that will aid in the provision of best possible care that clients (mother and her baby) are entitled to receive.

1.5.1 DEFINITION OF CONCEPTS

An advanced midwife is a person who promotes wellness, offers healthcare interventions and advocates healthy lifestyle choices for patients/clients, their families and in a wide variety of settings in collaboration with other healthcare professionals, according to agreed scope of guidelines (The National Council for the Professional Development of Nursing and Midwifery 2008: Online). For the purpose of this study, the advanced midwife is registered by the South African Nursing Council (SANC) as a registered nurse and midwife and had trained and completed either a clinical master's degree or an advanced diploma in the specialized field of Midwifery and Neonatology at the UFS.

1.5.1.1 EDUCATION AND TRAINING

Education is the delivery of knowledge, skills and information from teachers to students with the aim of having access to optimal states of mind regardless of the situation you are in (Berg, [n.d] :Online). The author further states that training is the acquisition of knowledge, skills and development of abilities. For the purpose of this study, education and training will refer to the knowledge and skills advanced midwives acquired during training in preparation of working independently.

1.5.1.2 COMPETENCE

Competence indicates sufficiency of knowledge and skills that enables someone to act in a variety of situations. (BusinessDictionary.com: What is competence? definition and meaning, 2010: Online). In order to ensure that advanced midwives are competent enough to practice independently, they should be recognized nationally and internationally as the best professionals that render quality health service to diverse societies through innovative education, research, community service and clinical programs and practices. Advanced midwives should inherit high skills and be accountably professionals that advance health care and evidence-based midwifery practice through partnership-building, scholarly research, publications and deliberations (SA.UFS:SoN, 2005.Vision, Mission, Values & Program Statement: Online).

1.5.1.3 PRACTICE

For the purpose of this study, practice will refer to the activities and responsibilities of advanced midwives rendered in all maternity areas. Searle (2000: 134) describes practice as meaning to put knowledge into practice or to follow a profession. At clinical areas, advanced midwives have to practice in accordance with the scope of practice of midwives as stipulated by the SANC (Government notice No.R2598 as amended by R260, 15 February: 1991).

1.5.1.4 COLLEAGUES

The term “colleague” is defined as a person with whom one works in a profession or business (South African Concise Oxford Dictionary, 2002: 226, The Free Dictionary, 2008: Online). In this study colleague refers to advanced midwives, midwives with a basic midwifery qualification, supervisors, as well as doctors.

1.5.1.5 PLACEMENT

For the purpose of this study, correct placement will refer to areas where advanced midwives are placed and utilized. The purpose of placement and utilization is to

display knowledge, skills acquired as well as attitudes for working as independent practitioner (Searle, 2002:124).

1.5.1.6 UTILIZATION

Searle (2002:124) refers to utilization as the displacement of knowledge, skills and experiences acquired. In this study correct utilization will be measured by the way advanced midwives execute their competence in order to improve maternal and neonatal health.

1.5.1.7 WORK PLACE

Work-place in this study will refer to maternity centres which can either be situated in hospitals or primary health care centres where advanced midwives are placed and utilized.

1.6 RESEARCH DESIGN

A research design is a blueprint for conducting a study and it maximizes control over factors that could interfere with the validity of the findings (Burns & Grove, 2009: 218). A quantitative design will be used because most of the data collected will be in the form of numbers (Neuman, 2007: 110). The design is non-experimental and descriptive as the study is aimed at describing the practice of advanced midwives. This method will be applied because through it, a clear picture of a situation where advanced midwives are placed and utilized will be described (Burns & Grove, 2005: 232).

1.7 RESEARCH TECHNIQUE

To describe the practice of the advanced midwives, a questionnaire will be used as data–gathering instrument. A questionnaire is chosen because it can be distributed

to a very large sample, either directly or through mail (De Vos, 2005: 172 and Brink 2000:153).

An already tested questionnaire compiled by Roets (1996) will form the basis of this questionnaire. The questionnaire will further be extended after a thorough literature analysis is done, as well as after a focus group interview with advanced midwives in practice is conducted. A thorough description of the focus group is done in chapter 2. This will be done as part of triangulation in order to ensure that all possible questions regarding the practice of advanced midwives are included in the questionnaire.

1.8 POPULATION

1.8.1 POPULATION

Population is the entire set of individuals having some common characteristics or who meet the sampling criteria for inclusion in a study (Burns & Grove, 2005: 342, Polit, Beck & Hungler, 2001: 233). In this study the population will be all advanced midwives (178) trained at the UFS between 1995 and 2007 and who are currently practicing.

1.8.2 SAMPLING

Sampling is a process of selecting subjects who are representatives of the population being studied (Burns & Grove, 2005: 341, Uys & Basson, 2000: 234). For this study there will be no sampling because of the limited number of respondents (178). Therefore, all advanced midwives trained at the UFS from 1995 to 2007 will be approached to take part in the study.

1.9 PILOT STUDY

A pilot study is defined as a smaller version of an actual study (Polit & Beck, 2004: 51). It will be conducted to determine the clarity of questions, effectiveness of instructions, completeness of response sets, time required to complete the questionnaire and the success of the data collection technique (Brink, 2008: 166). For this study, two advanced midwives working at the UFS and having contact with practice through accompaniment of the students will be requested to complete the questionnaire in order to indicate shortcomings or any other problem with the questionnaire. This data will not form part of the actual study.

1.10 DATA COLLECTION

Data collection is the precise, systematic gathering of information relevant to the research purpose (Burns & Grove, 2009: 43). In this study, a questionnaire for collecting data will be used after permission to conduct the study has been granted by the Ethics Committee of the Faculty of Health Science at the UFS.

The researcher will post questionnaires together with the cover letter explaining the purpose as well as the aim of the study to all advanced midwives who studied at the UFS from 1995 to 2007. Names and addresses of respondents will be obtained from the School of Nursing's records.

Written instructions on how to complete the instrument will be the same in all questionnaire forms in order to maintain consistency. Participants will be requested to complete the questionnaire forms within two weeks of receiving them and mail them back to the researcher. A postage-paid addressed return envelope will be posted with the questionnaires to facilitate the return rate (Neuman, 2007: 87).

1.11 VALIDITY AND RELIABILITY

1.11.1 VALIDITY

Validity is regarded as the main criterion by which the quality of the instrument is evaluated. The instruments must reflect the real meaning of the concept under consideration (Babbie, 2004: 143). In this study, face and content validity will be enhanced.

Face validity: refers to the fact that the instrument look like it was valid, and that it gives an appearance of measuring the appropriate construct (Polit& Beck, 2006: 328). Face validity will be enhanced by submitting the questionnaire to experts on the Evaluation Committee of the School of Nursing before it can be distributed to the respondents.

Content validity refers to the degree to which the items in an instrument adequately represent the content (Burns & Grove, 2009: 381). In this study, content validity will be maitained by structuring questionnaire using an already tested questionnaire compiled by Roets (1996) as the basis.

This basis questionnaire will be extended after a literature analysis was done and after a focus group interview is conducted. The triangulation approach will strengthen the validity of the questionnaire (Burns & Grove, 2009: 232).

During the pilot study experts in midwifery as well as experts in the field of drafting questionnaires will be consulted to validate the questionnare, thus further enhancing the validity thereof.

1.11.2 RELIABILITY

Reliability refers to the accuracy and consistance of information obtained in a study (Polit & Beck, 2006: 324). In this study reliability will be maintained by using the

same questionnaire to all respondents. Assessment of stability will be derived through the procedure of test-retest reliability in which the researcher will administer the same questionnaire to a pilot sample on two occasions and then compare the scores (Burns & Grove, 2009: 377).

Reliability will be maintained by using the same questionnaire for all respondents. Therefore, the questionnaire will be available in both English and Afrikaans which were the languages used during training. To ensure accuracy and consistancy, the questionnaire will be translated from English to Afrikaans and *vice versa* to make sure that the content is the same.

1.12 ETHICAL ISSUES

All research should be conducted in an ethical manner, adhering to principles as stated in ethical codes such as the Nuremberg Code and the Declaration of Helsinki (Burns & Grove, 2005: 177). In order to conduct this study in an ethical manner, the following isues will be addressed:

1.12.1 OBTAINING PERMISSION

Permission to conduct the research will be obtained from the Ethics Committee and the Head of the School of Nursing, UFS.

1.12.1.1 ETHICS COMMITTEE

According to Brink (2008: 41), research should be reviewed by an ethics committee before the researcher can continue with the study. In this study, the researcher will first submit the research proposal to the Evaluation Committee of the School of Nursing and thereafter to the Ethics Committee of the Faculty of Health Sciences of the UFS. After permission has been granted by the Ethics Committee, the researcher will then continue with the study.

1.12.1.2 HEAD OF THE SCHOOL OF NURSING

The permission of the Head of the School of Nursing was obtained for the researcher to have access to the records of the names of Advanced Midwives who completed the Advanced Midwifery and Neonatology programme.

1.12. 2 RESPECTING HUMAN RIGHTS

The human rights of respondents will be respected by ensuring that principles of right to self-determination, privacy, confidentiality and anonimity is maintained.

1.12.2.1 RIGHT TO SELF-DETERMINATION

Participants will be invited to participate after they have read a covering letter wherein the purpose as well as an explanation of the study procedure is stipulated. They will be able to decide whether they want to participate or not by signing the consent form wherein they will indicate their willingness to participate.
Contact numbers of the researcher will be provided in the consent form so that respondents may phone for clarification if needed. The researcher will respect the decision of respondents to participate or not.

Respondents will be informed that they are allowed to withdraw from the study at any time without a penalty should they so wish (Burns & Grove, 2009: 189). The respondent's right to self-determination will not be violated by promising rewards or remuneration after participating in the focus group interview or completing the questionnaire.

1.12.2.2 MAINTAINING PRIVACY

In order to maintained privacy there will be no names attached to the questionnaire that participants have to complete. A code number will be used to obscure identity. With the focus group discussion, respondents' names will not be used during transcription. Participants will be indicated as "participant 1 or participant 2".

1.12.2.3 MAINTAINING CONFIDENTIALITY

Confidentiality is the researcher's management of private information obtained from respondents. It must not be shared with others without the authorization of the respondents (Burns & Grove, 2009:196). The information obtained through the questionnaire will only be read by the researcher and study leader.

With the focus group interview, the transcribed data, will only be read by the researcher and the co-coordinator. The transcribed documents and tapes will be kept in a safe place to which only the researcher has access (Burns & Grove, 2005: 188). They will be destroyed by the researcher after successful completion of the research.

1.13 DATA ANALYSIS

Descriptive statistics, namely frequencies and percentages for categorical data and means and standard deviations or medians and percentages for continuous data, will be calculated. The analysis will be done by the Department of Biostatistics at the University of the Free State.

1.14 VALUE OF THE STUDY

The Findings and reccommendation of this study might enfluence stakeholders to pay attention to the placement and utilization of advanced midwives. At the end of this study, probably an advanced midwife might be placed in an appropriate place where her/his expertise are needed. This might only be materialized through reccommendations from all stakeholders involved in the health care of childbearing women. Correct placement and utilisation, will enable the advanced midwife to meet the needs of clients as well as the demands of the work-place; for example, complementing the shortage of doctors. Information obtained, might be valuable to the School of Nursing as well as to the nursing profession.

1.15 OUTLINE OF THE STUDY

The structure of the study is as follows:

Chapter 1: Introduces the problem statement, the purpose and objectives of the study, including the research design and methodology to be used.
Chapter 2: The focus group interview.
Chapter 3: The literature review concerning the practice of advanced midwives.
Chapter 4: The research methodology used in this study.
Chapter 5: The analysis and interpretation of the collected data.
Chapter 6: Presents the summary of the findings, the conclusion reached, limitations of the study and the recommendations made.

1.16 CONCLUSION

In this chapter the problem statement was introduced, the aim and objectives of the study, the research methodology to be used and the conceptual framework underlying the study was discussed. In the next chapter, a focus group interview will be illustrated.

CHAPTER 2

THE FOCUS GROUP INTERVIEW

2.1 INTRODUCTION

In the previous chapter, the researcher introduces the topic and the problem statement. A tentative plan of all the processes that would be involved in carrying out the study was outlined. It was also stated that the focus group interview with the practicing advanced midwives trained at the UFS was conducted. The aim of this interview was to use the results obtained for formulating questions based on the relationship of advanced midwives with their colleagues.

The relationship in the workplace is a critical issue that has to be taken into consideration for promoting better health care to both a mother and her baby. Fraser, Cooper & Nolte (2006: 5), stated that midwives/ advanced midwives cannot function or stand as an island. Therefore, their accountability and a healthy relationship within the multi-professional team are crucial for promoting evidence-based practice.

This chapter will focus on the process of the focus group interview as a data collection method. The data was then used in conjunction with the literature review to compile a questionnaire that was used to describe the practice of the advanced midwife.

2.2 THE FOCUS GROUP INTERVIEW

A focus group interview is a carefully planned face-to-face discussion with a group of individuals assembled to answer and discuss questions on a given topic (Polit, Beck & Hungler, 2001:462, De Vos et al., 2005: 300).

The focus group interview was chosen because it promotes self-disclosure among respondents and gives an indication on what people really think and feel on a certain subject. It creates a fuller, deeper understanding of the phenomenon being studied and spontaneous exchanges of ideas, thoughts and attitudes needed are stimulated (De Vos et al., 2005: 312).

The relationship among colleagues plays an important role in practice and therefore a focus group interview as data collection method was used specifically to know more about the relationship of advanced midwives with their colleagues, so that applicable questions could be included in the questionnaire.

2.2.1 ADVANTAGES OF FOCUS GROUP

The setting of the venue where the focus group interview was held was conducive and allowed respondents to express their opinions freely (Neuman, 2007: 301). The focus group interview was seen to be the best data collection method that will be able to give the desired information regarding the practice of advanced midwives trained at the UFS.

Through the use of the focus group interview, respondents were also able to express and clarify their beliefs, attitudes and knowledge of the required information in a way that less likely to occur in a one-to-one interview (Burns & Grove, 2005: 542). New ideas for hypothesis and questionnaires items were generated (Neuman, 2007: 301). Speedy results were immediately available after the analysis of the data (De Vos et al., 2005: 312).

2.2.2 DISADVANTAGES OF FOCUS GROUP

With the use of a focus group interview, the researcher experienced less control than it would be with the individual interviews (Babbie, 2004: 303). The researcher was just there, taking notes of whatever was said by both the respondents and the questions asked by the moderator. Data was difficult to analyze as it first had to be

transcribed verbatim from the tape recording, and then broken down in such a way that makes sense in whatever was said by respondents (Burns & Grove, 2005: 547).

The focus group interview was costly because the researcher had to search for a senior lecturer, and a psychiatric nurse, also practicing private, with a PhD qualification and an expert in interviewing to facilitate the session. A quiet venue which was free from disturbances was organized. Assembling the group was difficult because, from ten (10) recruited respondents who promised to attend, and who were reminded twice and confirmed their attendance, only four came for the interview.

2.3 POPULATION

Population is the entire set of individuals that meet the sampling criteria the researcher is interested in studying (Brink, 2008: 123). For this focus group interview, the population was all advanced midwives who obtained a qualification of Advanced Midwifery and Neonatology at the UFS between 1995 and 2007.

2.4 UNIT OF ANALYSIS

A unit of analysis involves selecting a group of people as a target of the study (Burns & Grove, 2009: 344). The common unit in social research is the individual, a group or an organization (Babbie, 2004: 94 and Neuman, 2003: 156).

The units of analysis were chosen purposefully. This was managed by selecting ten advanced midwives who were studying for other programmes at the School of Nursing, at the UFS. They were selected because it was easy to get hold of them and it was also not inconvenient for respondents as the interview day occurred immediately after they have attended classes. After permission from the ethics committee as well as the Head of the School of Nursing was obtained, the researcher was able to get their names and contact numbers from the School of Nursing‘s administrative office.

Recruiting a sample for purposive sampling was easy because respondents were easily contacted as they were attending classes for other programmes at the UFS. The researcher met them in class and asked volunteers to participate in the focus group interview and they were willing to participate. Volunteers gave the researcher their contact numbers so that they could be contacted for the appointment for the focus group interview. The process of the focus group interview was convenient for the respondents because it was scheduled in the afternoon as requested by the respondents.

The first ten (10) volunteers were selected to serve as an exploratory group and assessed the question for reliability and validity (Burns & Grove, 2009: 514, Brink, 2008: 153). Through their responses to the question, it was identified that the question was formulated correctly to be understood and it lead to applicable responses. Because the question was not modified, it was therefore, used for the focus group interview.

2.5 DATA COLLECTION PROCESS

In order to ensure that the needed data were collected, the preparation included the following:

2.5.1 THE VENUE

The Benedicts Kok Student Centre, at the UFS was used as the venue for the focus group interview. This venue was chosen because it was easily accessible, especially to respondents using public transport. Both undergraduates and postgraduates respondents use this venue for their studies, and it might have been familiar to some members which made it more user-friendly.

The venue selected was conducive and very quiet with no disturbances. No other people except for the respondent's, the supervisor, tape operator and the researcher were present. This helped in allowing quality tape recording of the session (Burns & Grove, 2009: 514).

The session was relaxed, in a comfortable sitting pattern. There was enough space between respondents so that they could be comfortable. The room was well ventilated with enough light.

Refreshments were served since eating together promotes conversation and communication which were the main aim needed for this occasion (De Vos et al., 2005: 309). The group discussion was guided and directed so as to remain focused on the topic of interest.

2.5.2 THE MODERATOR

The moderator requested to conduct the focus group interview possessed a Ph.D. as well as a master's degree in Psychiatric Nursing. She is a professional psychiatric nurse and a senior lecturer at the UFS. She is also practicing privately as a registered psychiatric nurse and do interviews on a daily basis. The moderator was therefore a qualified and capable to execute this task.

2.5.3 THE INTERVIEW

In this study ten respondents were recruited two weeks before the date of the session (De Vos, et al., 2005: 3050). A reminder call was done the night before the session to remind them of the appointment and to confirm attendance (Polit & Beck, 2008: 3950 and, De Vos et al., 2005: 305). Nevertheless, only four came to participate.

The other six failed to present themselves for different reasons like; four were late although were reminded and given the date, time and direction to the venue in advanced (Burns & Grove, 2009: 513). Two phoned thirty minutes before the commencement of the interview stating that they are unable to come due to personal reasons. Based on the suggestion of Polit & Beck (2008: 394), the researcher moderator and the researcher's supervisor decided to continue with a number of four respondents.

Data was collected from the four participants, trained at the UFS and working in different institutions. Prior to commencement of the interview, in order to break the

ice, respondents were allowed to introduce themselves to each other, to the moderator and to the researcher's supervisor.

The moderator then introduced the research question to respondents. The information regarding the aim of the focus group interview, as well as the purpose of the study was given verbally as well as in a written form on a leaflet; and they gave their written consent to participate.

The moderator then informed participants that the interview will last for approximately an hour and that they have the right to withdraw from participating at any time without penalty to them. That every respondent's point of view was important was stressed, and as a result there were no right or wrong answers to the question asked during the interview. Respondents were ensured that confidentiality of the collected data was maintained by not allowing other people to have access on it. Only the researcher had access to the collected data.

The moderator was flexible and kept respondents to the topic (Burns & Grove, 2005: 544). The session was guided according to one question (Polit et al., 2001: 265). The moderator directed the discussion and encouraged participation while probing them without biased responses. She exerted a mild unconstructive control over them and at the same time remained neutral and non-judgmental (De Vos et al., 2005: 313 and Burns & Grove, 2005: 544). Her tone was clear and was adequately knowledgeable about the topic of the conversation.

Throughout the session of the interview, the moderator promoted debate by asking open-ended questions in order to get a variety of ideas. She encouraged respondents to interact with one another, the aim being to formulate ideas and to draw out cognitive structures not previously stimulated (Burns & Grove, 2009: 515). The moderator displayed good communication skills which promoted a relaxed environment that motivated respondents to feel free and share their experiences that added to the required data.

During and at the end of the interview, the moderator controlled and directed the process by opening and summarizing the session. The question posed was: "Please

discuss positive and negative factors that your colleagues have on your practice as advanced midwife”

To obtain the necessary information, the proposed question was an open-ended type, involving, and non-directional and especially formulated to re-instate the purpose of the study (Neuman, 2007: 178).

Figure 2.1 below indicates the sitting positions of respondents during the focus group

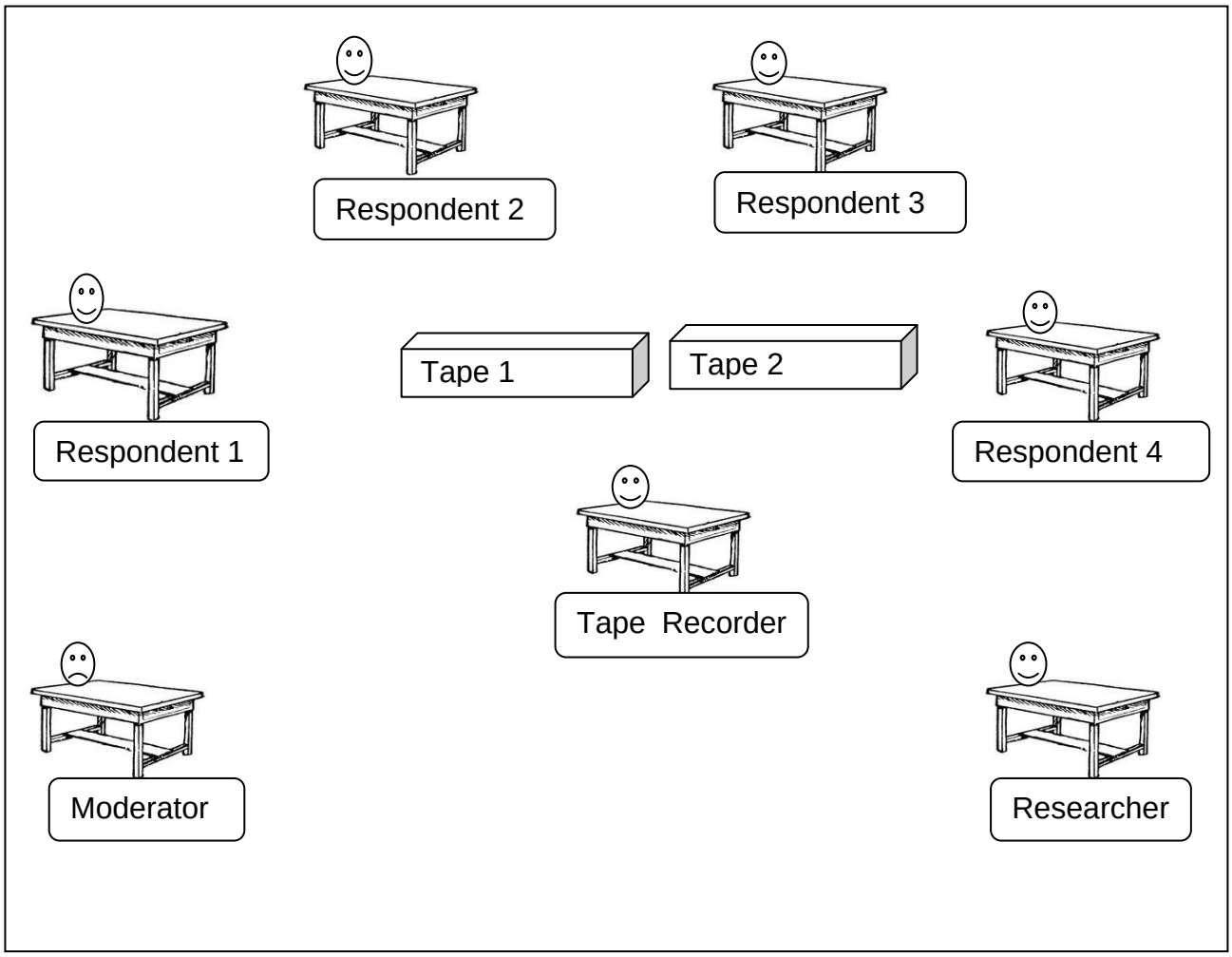

Figure 2.1 Sitting patterns of Respondents, Moderator, Tape recorder Operator and the Researcher.

FIGURE 2.1: SITTING POSITIONS OF RESPONDENTS, MODERATOR, TAPE-RECORDER OPERATOR AND THE RESEARCHER.

2.6 SAFEGUARDING DATA

The researcher had to ensure that data was safeguarded until the analysis had been completed (Polit & Beck, 2004: 334). Measures were taken to safeguard the data by taking notes and by using high quality audiotapes to record the whole discussions or all that were discussed. The tapes were stored and kept safe in a closed place to ensure effective and efficient use at the end of the study.

2.6.1 FIELD NOTES

Field notes are used to obtain first hand information (Neuman, 2007: 288). They serve as “jotted notes” that helped the researcher to recall events and observe what could be easily missed.

During the process of the focus group interview, the researcher took detailed notes regarding; seating arrangements and the order in which people speak. This helped with the identification of respondent’s tone of voice which helps to express exactly what was said (De Vos et al., 2005: 311).

Observation of behaviour and various forms of non-verbal communication such as eye contact, posture, gestures between group members were made to assist with the interpretation of data. Remarkable and burning issues that affected respondent in the practice/workplace were said time-and-again and highlighted as were important for deciding on a conclusion about the research topic.

2.6.2 AUDIO TAPED DATA

From the beginning of the session, participants were informed that audiotapes will be used and the reasons thereof were highlighted. The agreement was that the tapes will be destroyed after the interpretation and transcription so that no link could be attached to their participation.

Two audiotapes were used simultaneously to record data and to secure a back-up. Audiotapes were used because they provided a close approximation to what occurred and a permanent record that others can listen later (Neuman, 2007: 292).

Just before the commencement of the discussion, the audiotapes were checked to ensure that they were functioning properly. The cassettes used were of a high quality the reason was to make sure that all data collected is saved and protected from damage that can occur before it is transcribed. The transcription was done directly after completion of the interview.

2.7 TRUSTWORTHINESS

Trustworthiness is the ability of a study to persuade the researcher and the targeted interested parties that the findings of his/her research are worth paying attention to and worth taking note of (Lincoln & Guba, 1985: 280; Polit & Beck, 2008: 539).

Four operational criteria for developing the trustworthiness of a qualitative inquiry which are credibility, dependability, conformability and transferability were used (Polit & Beck, 2008: 539). The researcher used the Lincoln and Guba (1985: 277-290) model of trustworthiness which makes use of the following aspects:

2.7.1 CREDIBILITY (TRUE VALUE)

Truth value determines whether the researcher has established confidence in the truth of the finding with respondent and the context in which the research was undertaken (Botma, Greeff, Mulauzi & Wright, 2010: 232). The truth of the experiences of advanced midwives was maintained through the data collected by taking field notes and the use of audiotapes.

In order to ensure that the real data that was collected is maintained, it was kept safe so that none of it is lost. In order to ensure that first class information (data) was collected; sufficient time with the advanced midwives was spent during data

collection. The interview took two hours wherein the question of interest was addressed.

The moderator employed the process of member checks, a process of getting feedback from respondent in order to check whether their responses were recorded accurately and that this represents their experiences (Lincoln & Guba, 1985: 314; Polit & Beck, 2008: 539).

The researcher in pursuing with persistent observation identified and focused in details on those characteristics and elements in the situation that were relevant to the practice of advanced midwives. Non-verbal communication cues of respondents as well as other elements in the conversational context; such as silence and continuous repetition of words were taken into consideration when transcribing the data.

The researcher engaged an independent co-coder to analyze the data she obtained during the focus group interview for final coding.

2.7.2 DEPENDABILITY (CONSISTENCY)

Dependability is the stability (reliability) of data over time and over conditions (Lincoln & Guba, 1985: 290). To ensure this, the focus group interview was conducted until all the required information was obtained. The purpose was to compile a questionnaire and thus validity of data gathering technique.

An enquiry audit technique was engaged by using the moderator who has experience with qualitative research. The moderator checked and compared the results of the data analysis and thereafter, consensus was reached by both the researcher and the moderator to ensure consistency (Polit & Beck, 2006: 335). The data were transcribed with field notes added.

2.7.3 CONFIRMABILITY (NEUTRALITY)

Confirmability refers to the objectivity or neutrality of the data, that is, the potential for similarities between two or more independent people about the data's accuracy, relevance or meaning. To enhance confirmability, field notes and the interview transcripts are still available should they be needed for enquiry (Polit & Beck, 2008:336). The enquiry was determined by the practicing advanced midwives who were able to give the needed data without being biased (Brink et al., 2006: 119).

The researcher did ensure neutrality through "bracketing" which the researcher identified by putting aside the ideas of what is already known about the practice of advanced midwives (Streubert & Carpenter, 2003: 22-23; Brink et al., 2008: 120). The researcher bracketed all information concerning their relationship with regard to factors that influence their practice and focused on the data gathered by the interview.

2.7.4 TRANSFERABILITY (APPLICABILITY).

Transferability is the responsibility of the person wanting to transfer findings to another situation or population. However, transferability refers to the extent to which the findings can be applied in other context or with other respondents (Babbie & Mouton, 2002: 277). The researcher has tried to describe the context and data in such a way that other consumers or people can evaluate the transferability of the data to other context (Polit & Beck, 2006: 336).

2.8 DATA ANALYSIS

Data analysis is a process of organizing collected data in such a way that it becomes meaningful and answers the research question. The aim of analysis is to see whether there are any patterns or trends that can be identified in order to establish themes in the data (Mouton, 2008: 108).

Qualitative data analysis involves integration and synthesis of narrative data in order to draw and communicate conclusions without loss of context and richness of data collected (Polit & Beck, 2004: 570). To ensure that the integration and synthesis of narrative data was maintained, the raw data was translated into an organized format in such a way that the researcher was able to make conclusions about the findings (Burns & Grove, 2005: 548). Thus through the emerging patterns and the noted explanation of the findings, conclusion and verification was reached (Burns & Grove, 2009: 526).

The transcribed data was analyzed by using Tesch's method of data analysis, as cited in Creswell (2003: 192). This method involves eight steps which the researcher followed in a systematic process of data analysis:

The researcher searched out the sense of the whole by reading through all of the transcriptions carefully, and wrote down some ideas as they came to mind.

The interesting issues were noted and the researcher went through them thoroughly by asking herself; "what is it about", and did not think about their meaning but wrote thoughts in the margin.

After completing this task, a list of all topics or concepts were identified, and similar topics were clustered together and arranged into columns.

The topics were categorized into major and unique topics and leftovers.

The list was now taken back to data and the topics were abbreviated as codes and written down as codes next to the appropriate segment of the text. This preliminary organizing scheme was repeated again in order to see whether new categories and codes could emerge.

The most descriptive wording was found for concepts and transformed into categories. Then the total list of categories was reduced by grouping concepts that relate to each other. Lines were drawn between the categories to show the interrelationships.

A final decision on the abbreviation for each code was made, and the codes were alphabetized.

Lastly the data material belonging to each category was assembled in one place and a preliminary analysis was performed.

To ensure that coding was done well, the existing data was re-coded by a co-coder again.

The content of each category was subdivided into subcategories. The data that were found irrelevant were discarded. An independent co-coder was engaged. This independent co-coder was a person who is an experienced researcher in qualitative research and has a PhD in nursing.

The independent co-coder did her own analysis as well as the researcher and thereafter, both the researcher and the independent co-coder came to consensus and agreement about the data analysis.

The main categories identified were, factors preventing as well as those enhancing the practice of an Advanced Midwife as indicated in Table 2.1

TABLE 2.1: FRAME FOR DATA ANALYSIS

CATEGORY	SUB-CATEGORY	THEMES
Factors preventing effective practice	Lack of support	Do not get any support from colleagues Lack of support is the problem. “I think by being alone, you don’t get support when they are rigid to change”. Lack of support pushes you to do what you were not supposed to do.
	Lack of cooperation	They are being jealous. Junior doctors and student midwives do accommodate our presence; but our colleagues!!! colleagues!!!...do not accommodate us.

CATEGORY	SUB-CATEGORY	THEMES
	Resistance to change	Not interested to adapt to new ways of doing things. Practice right things only when the advanced midwife is present. They stick to the old method of doing things even though... They are very rigid to change
Factors preventing practice	Lack of practice (opportunities)	You even forget what you have learned. Doctors take all the work: don't give us chance at the hospital situation " but the doctor is here to do these procedures" "I feel so bad to observe a student (advanced midwife) being prevented from practicing "but they are being prevented by doctors" "I am sure this is an indication for forceps, but they (colleagues) will tell you to wait for five minutes until the doctor arrives".
	Not recognized	Advanced midwife not in-charge of the maternity units. We feel that we must be recognized.
	Lack of confidence	" you even forget what you have learned
Factors enhancing practice	Reluctance and ignorance	They merely practice the right thing to please the advanced midwife

CATEGORY	SUB-CATEGORY	THEMES
		"They seem not to understand that it is done for the good of the patient" "I'm not going to study…". They fail to do them (amnion infusion) when you are not there. "Agh! Advanced midwifery is nothing; I can do it myself as well!"
	Misuse	Given chance conditionally: when working with an inexperience doctor, when the doctor is not there or when doing night duty. When you are off-duty, you are being called-in to help even at night at the same time you are expected to work again the scheduled duties during the day. After helping colleagues you still have to go back and start with your allocation. "you work double"
	Confidence	One is usually accepted well by students "I am sure about the procedure" "When there is no doctor, we can do these procedures" (assisted births).
Factors enhancing practice	Recognition	Recognized well on night duty: "it is nice to have an advanced midwife on duty" "They recognize me" "They know that I am going to

CATEGORY	SUB-CATEGORY	THEMES
		help” They feel advantaged to have an advanced midwife on duty”.
	Support	Get support from people that know what all is about in the course of Advanced Midwifery. Get support from younger staff: students and inexperienced doctors. “In my situations, colleagues know that if there is a problem, they can call me”. Whenever there is a problem, they turn to call her (an advanced midwife).

2.9. FINDINGS AND LITERATURE CONTROL

2.9.1. FACTORS PREVENTING PRACTICE:

In order to ensure that quality care is offered to women and their babies, health care providers (advanced midwives), should be encouraged and assisted by their colleagues. In this study, factors identify that prevent the quality practice of advanced midwives included a lack of support, lack of practice, resistance to change, advanced midwives not recognized, reluctance and ignorance, lack of cooperation, misuse and lack of confidence. See: Figure 2.2.

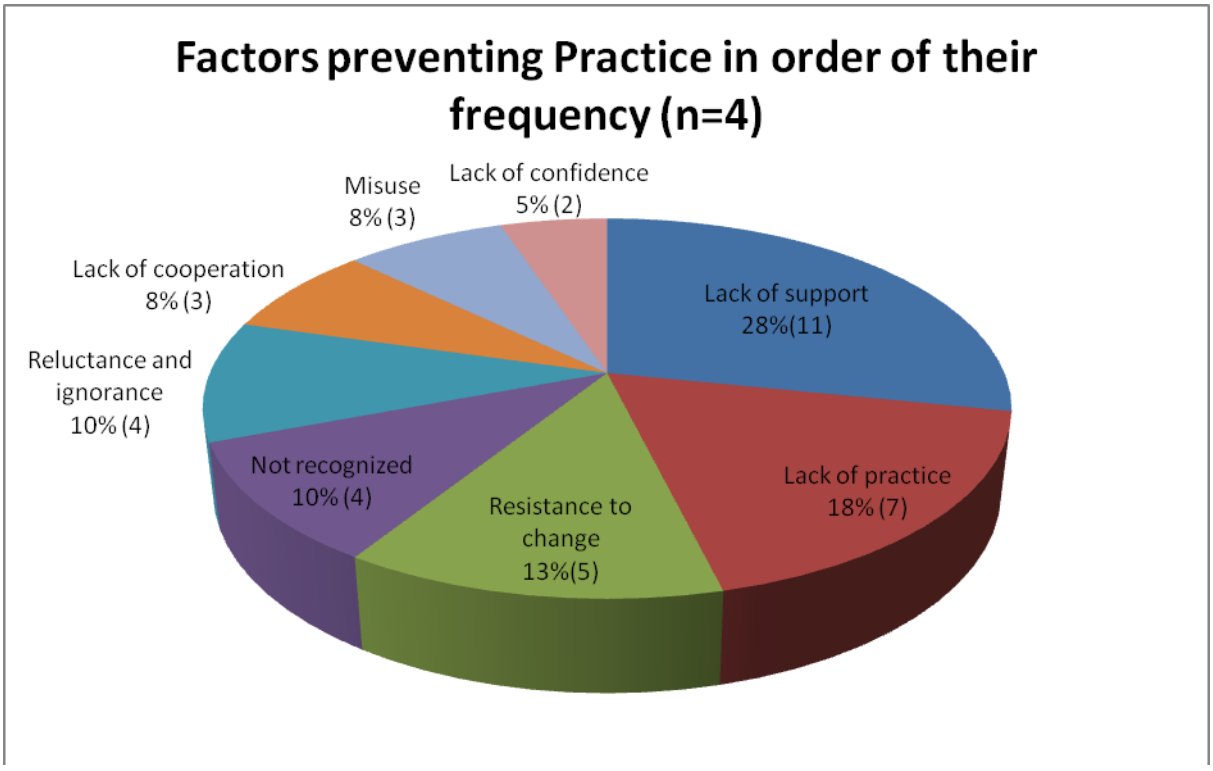

FIGURE 2.2: FACTORS PREVENTING PRACTICE N=4

Lack of support as one of the most factors preventing quality practice, was emphasized by three of the respondents who indicated more than eleven times that there was a lack of support from their colleagues. A lack of support between colleagues causes problems such as disharmony including poor work results (Answers.Com: Why is it Important to help Develop and support your Colleagues,

2010: Online), and it increases the sickness absence rate (De Vries & Mol, 2009: Online; Supportive Colleagues Make a Difference, 2009: Online). Respondents mentioned the following:

"…you come with your advanced knowledge; you don't get any support from your regular colleagues".

"…you feel alone when you don't get support".

"Lack of support is the most problem".

"I think by being alone, you don't get support when they rigid to change, you feel alone when you don't get support"

In order to stay competent, it is important to practice continuously whenever the opportunity arises as this is helpful in shaping skills. **A lack of practice** is indicated by three of the respondents as a factor that prevents advanced midwives from practicing what they have learned.
Factors identified indicating that were not given chance to practice are the following:

"You even forget what you have learned because you don't practice your ..."

"Doctors take all the work: don't give us chance at the hospital situation"

"when the advanced midwife is about to do forceps, there are talks like "but the doctors here do not do these procedures"

If they do not practice and exercise their knowledge and skills, they might forget what they worked hard to obtain. In order to stay competent and perfect in midwifery issues, advanced midwives should practice midwifery continuously as "practice makes perfect" (The Free Dictionary, Thesaurus and Encyclopedia, 2002: Online).

Advanced midwives indicated that **resistance to change** is a factor that prevents them to practice as specialist in midwifery and as a result, this prevents them from assisting clients. Resistance to change is described as the action taken by individuals and groups when they perceive that a change that is about to occur is a threat to them (Brown, 2002-2010: Online).

This attitude in the workplace, among colleagues, emerges when there is a threat of losing something the individual value or when there is a fear of leaving a comfort zone. With regard to the midwifery practice, it might be the fear of adopting a new way of doing things which advanced midwives have learned and the others not. Respondents said that colleagues that were resistant to change are:

“Not interested to adapt to new ways of doing thing”

“Very rigid to change”

Practice right things when the advanced midwife is present

“They stick to the old method of doing things even though you can show them the advantage of that...”

Participants were of the opinion that they **are not being recognized** where they are working. Employee’s recognition is very important as it serves as a communication tool that reinforces and rewards the most important outcomes people create for whatever they are doing (Heathfield, [n.d]: Online). All respondents in the focus group state that their knowledge and skills are not being recognized by colleagues. Respondents indicated this by stating that:

“Advanced midwives not in charge of maternity units"

..They (colleagues) would say...agh...Advanced midwifery is nothing; I can do it myself as well”

“We feel that we must be recognized”

All (four) respondents identified **reluctance and ignorance** as factors preventing advanced midwives to practice to their best level. Reluctance and ignorance implies that it was hard for colleagues to accept the knowledge advanced midwives have acquired. This was verified by the fact that colleagues were reluctant to learn from respondents, and they were also ignorant to acquire new knowledge and skills of practicing midwifery according to expected current practice. This was stated as follows:

“They practice the right thing to please the advanced midwife”

“They seem not to understand that it is done for the good of the patient”

“I’m not going to study”

Lack of cooperation was also identified as the other factor that prevents advanced midwives to practice what they have trained for. This was indicated by all (four) respondents when stating that there was a lack of cooperation between them and their colleagues.

“…They are being jealous’.

“After intubation the patient successfully; there were talks like “it is just by luck that she succeeded with the intubation of the patient”.

In order to ensure that comprehensive and quality care is rendered in midwifery practice, cooperation among colleagues should be the norm as this serves as building blocks for confidence needed (Sondak & Moore, 2005: Online). Cooperation among colleagues enhances and assists in the development of a profession especially independent practitioners like advanced midwives (IAIPSIG, 2006: Online) and should be maintained in midwifery practice.

The majority (three) of the respondents indicated that they are being **misused** by colleagues. They felt that they as advanced midwives are used incorrectly. They illustrated this opinion by stating that they were only given a chance when doctors are not available.

"..given chance conditionally: when working night duty with an inexperience doctor

Given chance when the doctor is not there; or when doing night duty"

Advanced midwives felt misused by saying: "After helping colleagues you still have to go back and start with your allocation"

A **lack of confidence** was also indicated by three of the respondents in the focus group interview. The concept "confidence" means a feeling of self-assurance arising from an appreciation of one's abilities (South African Concise Oxford Dictionary, 2002: 241), which was not the case with the practicing advanced midwives. Respondents experienced a low esteem in the workplace. They reported that by being not supported; cause them to lose confidence in themselves. Below are the words used to express their feelings with regard to lack of confidence.

"Lack of support pushes you to do what you were not supposed to do"

2.9.2. FACTORS ENHANCING PRACTICE

In Figure 2.3: factors enhancing the practice of advanced midwives are indicated.

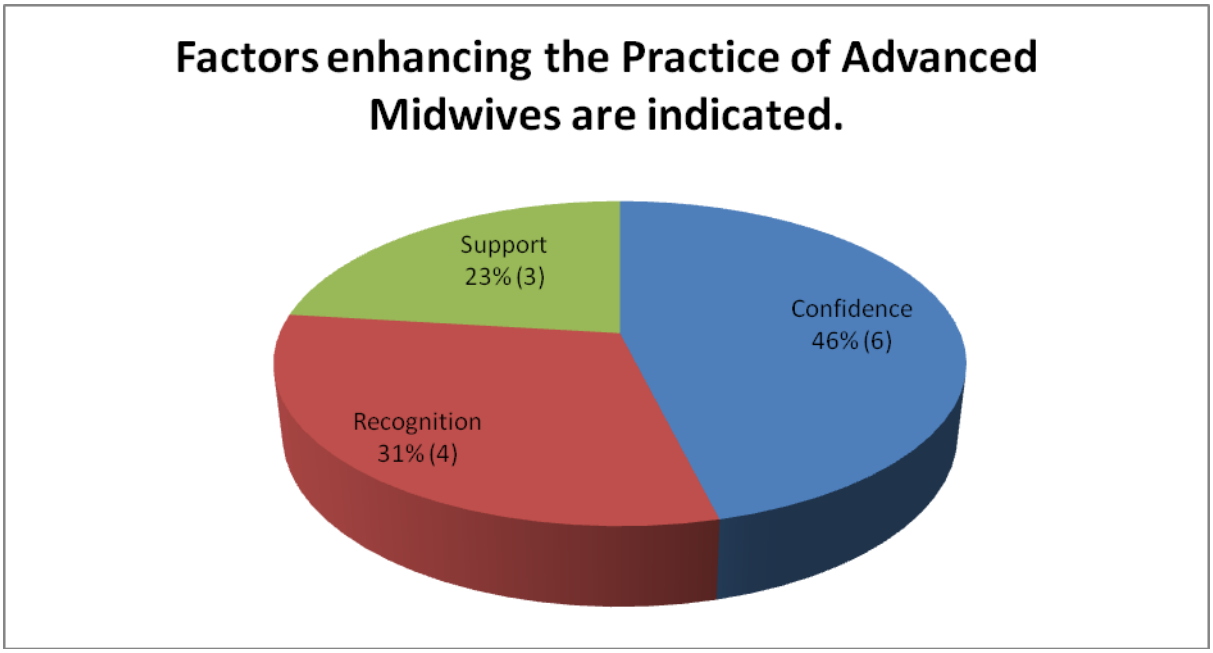

FIGURE 2.3: FACTORS ENHANCING THE PRACTICE

Out of four respondents that took part in the focus group interview, only one repeated six times that she/he **feels confident** about the work she is doing where she is placed and utilized. The demands expected from independent practitioners are countless; therefore, their level of confidence should be high as this will portray their competence (Abisgold, 2011: Online).

"That she/he is being recognized" was repeated four times, indicating that it is important for advanced midwives to be recognized in the workplace as it reinforces the behaviour the employer wants to encourage (Heathfield, [n.d]: Online). Unfortunately it was only one respondent, and this was expressed as follows:

"Recognized well on night duty"

"It is nice to have an advanced midwife on duty"

"One is accepted well by students if you do forceps…"

It is of concern that only three responses concerning the **suppor**t of advanced midwives were reported. Practicing advanced midwives should always be supported by their colleagues in order to gain and maintain confidence in the workplace. Supportive colleagues can make a difference in the workplace as in such an environment, one might enjoy being at work as a result, quality care will be provided to health consumers (De Vries & Mol., 2008: Online). That she/he is being supported was expressed as follows:

Get support from people that know what all is about in the course of Advanced Midwifery

Get support from younger staff: students and inexperienced doctors

"In my situation, colleagues know that if there is a problem, they can call me"

Although claiming to be supported by students and junior colleagues, the respondent was not being supported by everybody (senior colleagues) in the workplace)

From the focus group interview results, it is clear that that the three aspects; Support, Recognition and Confidence forms the pillars of mutual relationship between colleagues in the workplace, and should be maintained and considered for ensuring a warm work environment.

2.10 ETHICAL CONSIDERATION

The study was approved by the expert committee of the School of Nursing, the head of the School of Nursing and the Ethics Committee of the Faculty of Health Sciences of the UFS, after examining the ethical issues. Written permission including an ethical number was issued to the researcher before embarking on the study.

Conducting research ethically starts with identification of the topic and continues until publication of the study (Burns & Grove, 2009: 184). Therefore, honesty and integrity was considered by informing respondents about the aim and purpose of the focus

group interview. Confidentiality of data collected was also maintained by making sure that the tapes were destroyed after transcription was done, and only the researcher and the co-coder had an access to the data collected.

2.10.1 INFORMED CONSENT:

Informed consent means that the respondents have adequate information regarding the research, and are capable of comprehending the information and have the power of free choice, enabling them to consent voluntarily to participate in the research or declining to participate (Polit & Beck, 2008: 177).

In order to abide with the demands of the informed consent, respondents were informed about: the purpose of the study, the duration of the interview and the process of data collection; final use of the research findings; and the identity of the researcher and contact information.

2.10.2 CONFIDENTIALITY

Respondents were assured that any data they provide during the interview will be kept in the strictest confidence (Polit & Beck, 2008: 180).

The raw data were only accessible to the researcher, the co-coder and the supervisor. There were no names used on the tapes and the transcripts. Respondents were assured of confidentiality throughout the interview.

2.11 CONCLUSION

Focus group interview as well as the process of the interview was fully outlined. Data analysis of the collected information was done. Factors indicating prevention of effective as well as those enhancing practice were described. Data was only to be used to enable the researcher in compiling the questionnaire Ethical aspects used in qualitative studies were also considered. The next chapter will be based on the literature review.

CHAPTER 3

LITERATURE REVIEW

3.1 INTRODUCTION

This chapter focuses on a review of the relevant literature as a background to the problem statement and the development of the questionnaire. Multiple data sources for addressing similar issues were used to obtain a wide range of the existing information about the practice of advanced midwives. A general background for understanding current practices and knowledge of advanced midwives and the skills they have obtained will be outlined.

The focus will be based on the definition of an advanced midwife, placement and utilization, education/training and theoretical knowledge of an advanced midwife, evidence-based practice, drugs that can be prescribed by an advanced midwife; an advanced midwife as a researcher, administrator and an autonomous practitioner. Factors that influence the practice of advanced midwives will also be discussed.

3.2 THE ADVANCED MIDWIFE

According to the agreed scope of practice guidelines stipulated by the National Council for the Professional Development of Nursing and Midwifery in Dublin (2009: Online), the advanced midwife is recognized as a responsible and an accountable health care provider who promotes wellness, offer healthcare interventions and advocate healthy lifestyle choices for patients/ clients, their families and careers in a wide variety of settings in collaboration with other health care professionals.

In order to ensure that advanced midwives are delivering the most excellent care to clients (women in their childbearing age), it would be important for them to inherit the following attributes as suggested by the National Council for the Professional Development of Nursing and Midwifery in Bublin (2008: Online).

3.2.1 AUTONOMOUS/INDEPENDENT PRACTICE OF AN ADVANCED MIDWIFE

Autonomous midwifery practice entails having freedom to act on behalf of childbearing women, working in partnership with them and other members of the health-care team when it is in the best interests of the woman, fetus or newborn (Fraser et al., 2010: 6). These authors further indicate that ensuring quality care based on autonomous practice to clients, the following principles should be maintained:

3.2.1.1 PROVISION OF WOMEN-CENTRED CARE

Every woman expects to be treated as though she is special and important; but unfortunately this is impossible because of the workloads midwives/ advanced midwives are experiencing in their day-to-day work.

It is important for skilled attendants to have an understanding of social, cultural and context differences so that they respond to the needs of women and their families in a variety of care setting by prioritizing and managing work properly (Fraser et al., 2010: 7).

To ensure the continuity of care, they should advocate for a doula. A doula is a support person or a woman caregiver during labour identified by the woman during pregnancy. This person can be a family member, a partner or a friend (Marshall, Kennell & Klaus, 2002: 3). The doula has to be supervised and be given instructions of what is expected from him/her by midwives. For example must help with the breathing exercises, walk around with the woman, read a story/book or by massaging the woman's back as a non-pharmacological pain relief method (Fraser et al., 2010: 494).

A well trained doula is very helpful to the hospital staff especially in situations where it is impossible for them to be with a woman in labour all the times (Marshall et al., 2002:20).

3.2.1.2 ETHICAL AND LEGAL OBLIGATION

The behaviour of advanced midwives in relation to such things as confidentiality, respect and personal responsibility for ethical choices should be maintained (Fraser et al., 2006: 6). In case of a termination of pregnancy, they should keep confidentiality and respect the woman's wishes. Counseling services should be provided for woman facing ethical dilemmas and stressful situations (American Physical Association: FAQ, 2010: Online). This will help a woman to make informed choices.

3.2.1.3 RESPECT FOR INDIVIDUALS AND COMMUNITIES

As women under the care of advanced midwives are from different cultural, ethnic and religious backgrounds, care provided should be in a non-discriminatory way and without injustice and this will make the woman to feel very special and respected (Stanhope & Lancaster, 2002: 57). In cases where they feel that they do not have skills or expertise to provide effective care, they must seek assistance to ensure that the patient is provided with quality care For instance in the case where the woman do not speak the local language, an interpreter should be asked to ensure that the woman understand well what has been said (Henderson & Macdonald, 2004: 1133).

3.2.1.4 QUALITY AND EXCELLENCE

Advanced midwives should strive for continual improvement and excellence in midwifery practice. This can be maintained by auditing of standards and discussion of difficult maternity care scenarios where skilled attendants (advanced midwives) will have to come together and discuss ways of improving the service being rendered (Pillitteri, 2002: 20). Clients receiving care should be involved by evaluating care and by being allowed to give suggestions for areas that need improvement.

3.2.1.5 EVIDENCE-BASED PRACTICE AND LEARNING

Evidence-based practice refers to research-based practice intended for the need of sound evidence for effective care (Davidson et al., 2008: 20).The advanced midwife should adopt the changing nature and context of midwifery practice by being involved in research projects that formulates the evidence-based practice.

Therefore, as independent practitioners; should perform procedures that are effective and beneficial to clients and avoid practices that are done routinely (Fraser et al., 2009: 8). Procedures like cutting of episiotomy, giving of enema including shaving, should be done only when there is a need. The reason behind this is the fear of creating a source/way for the entrance of microbes including transmission of HIV (South African Department of Health: Better Birth Initiative. [n.d]: Online).

3.2.1.6 LIFE-LONG LEARNING

As autonomous practitioners, advanced midwives should adopt a life-long learning style which will help them to be up-to-date with different way of solving problems. To achieve this, they should be involved in different styles of learning where now databases can be used to search for topics relevant to their daily practices.

The opportunity of learning from colleagues and other health care providers through observing and discussing different ways of practicing and by seeking out an education or training event, can be of great help to advanced midwives as independent practitioners (Fraser et al., 2006: 7).

Autonomous practice should occur when quality care is provided to both the mother and her baby independently without seeking doctor’s prescription (Pairman, Pincombe & Thorogood, 2006: Vii). This will be achieved by being accountable and responsible for advanced level of decision-making which may occur through management of specific client case loads.

Advanced Midwifery practice is designed for independent practitioners who are passionate about their practice, and wish to develop their skills and knowledge to an advanced level (Fraser et al., 2006: 5). Therefore, this passion for the work they are doing may enhance positive impact to the care offered to health consumers.

Pairman et al., (2006: vii) further state that an autonomous practitioner should have an extensive knowledge and skills to provide care independently. However, emphasize is that a team approach should always be adopted in isolated complicated incidents. In other words, an advanced midwife should work in partnership with midwifery colleagues and other relevant members of health care team for the best interest of health consumers. Autonomy in clinical practice is demonstrated by being accountable and responsible for advanced level of decision-making.

3.2.2 KNOWLEDGE AND SKILLS OF AN ADVANCED MIDWIFE

Advanced midwives, should ensure that the advancement of midwifery knowledge is based on activities that protect the rights of women as persons. Therefore, on no account should a vaginal or rectal examination be made without the woman's consent and privacy being maintained as a sign of respect for a human being.

Neither enema nor suppository should be given to a woman suffering from an APH or PPH, as these procedures may exacerbate the bleeding or may be the source for infection (SANC Regulation No.R.2488. 26 October 1990, amended). Instead, a speculum examination can be performed as to avoid inducing more bleeding (De Kock & Van Der Walt, 2004: 21-6).

In cases of severe bleeding, skilled attendants should be able to resuscitate both adults and neonates by inserting or putting-up a drip as well as by intubating [indotracheal intubation] independently while waiting for the doctor or for transport if transferring of a patient is needed (Davidson et al., 2008: 1165).

Emergencies such as cord prolapsed; placenta abruption or threatening rupture of the uterus should be managed well or are transfer to the appropriate levels of care (Fraser et al., 2009: 628. According to the South African National Department of Health: Saving Mothers Report (2002-2004: 8), there is an increased death rate caused by failing to diagnose, treat or transfer patients that need the skilled attendant's capability.

In order to ensure that practicing midwives are in line with current ways of midwifery practice, it is important that they should be conversant with the research processes and be able to educate subordinates and colleagues in this regard. In essence, advanced midwives should be expert in the clinical diagnosis and treatment of midwifery emergencies. They should also be expert practitioners and consultants that are governed by critical thinking skills acknowledged by their peers as exemplary.

3.2.3 ADVANCED MIDWIFE AS AN ADMINISTRATOR, PROFESSIONAL LEADER AND A CHANGE AGENT

3.2.3.1 ADMINISTRATOR (MANAGER)

Advanced midwives should form part of the team of managers in all areas providing maternity services. They should be engaged in planning of policy and protocol writings suitable for areas where they are to execute quality care independently (Wiley & Sons, 2000-2011: Online). There should therefore be enough resources such as enough staff and equipment to facilitate quality care (Lukosius, DiCenso & Pinelli, 2011: Online).

As administrators/managers, they should act as role models that will periodically organize in-service trainings which could form platforms for tackling the daily midwifery challenges (Sullivan & Garland, 2010: 22).

They should see to it that during the antenatal care, intrapartum, pueperium and neonatal period; quality midwifery care rendered is holistic and culturally congruent in nature as set up by the South African National Health Act, 2003 (Act No. 61 of 2003).

3.2.3.2 PROFESSIONAL LEADER

As professional leaders, advanced midwives should guide and coordinate colleagues and subordinates to render quality midwifery care in their day-to-day activities (Wiley & Sons, 2000-2011: Online). In order to guide them well, they must be value-led leaders [leadership based on norms and values] as well as situational leaders [taking task maturity of staff and the care to be rendered in consideration], should know when to be a autocratic leader [emergency and disaster situation] and democratic leader [by including staff in decision making] (Muller, Bezuidenhout & Jooste, 2006: 293).

As value-led leader and manager, advanced midwives must also ensure that there are enough staff within the limits of safe staffing, enough resources to render quality care and should ensure that the environment is free from any kind of accidents, should secure safety of mothers and babies, and should prevent nasocomial infections to both staff and patients (Sullivan & Garland, 2010: 27).

Professional leadership should be demonstrated by showing respect and genuine interest to both patients and staff through avoidance of arrogant and rude or judgmental attitude towards them (South Africa: Department of Health, 2002: 6).

When caring out her/his duties, an advanced midwife should always maintain the ethical principles by acting in a way that promotes and safeguards the wellbeing of clients (mothers and babies) under her/his care (Dreyer, Hatting & Lock, and 2004: 9).

3.2.3.3 CHANGE AGENT

Advanced midwives as change agent, must do regular total quality of the maternity unit, and based on the end result, in other words; should always advocate for ways of improving the service delivery of the maternity units during pregnancy, intrapartum and postpartum period.

It should be noted that mothers are members of the communities, therefore, advanced midwife should be a change agent for the community by empowering women with information that will help them to take charge of their health.

In order to achieve this, an advanced midwife should identify members in the community who can be counted on to offer a consistent level of commitment and support. The contact numbers of such clients or members of the community should be known by the community of that region so as to be traced easily should they be needed (Prown, 2001: Online). In other words, there is a need for professional leadership that should serve as change agent who will initiate and implement changes in the healthcare services.

An advanced midwife should be a researcher and an educator that is responsible for advancing the knowledge of identifying and intergrading midwifery research in areas of the healthcare environment that can incorporate best evidence-based practice to meet and improve maternal and child health.

3.2.4 RESEARCH FUNCTION OF AN ADVANCED MIDWIFE

Research is a systematic inquiry or investigation that validates and refines the existing knowledge and generates new knowledge (Burns & Grove, 2009: 2). Advanced midwives should have knowledge on research as it will empower them with experiences and judgment needed for independent practitioners (Page & McCandlish, 2006: 251). As research is relevant to daily practices of midwifery, their involvement in research may improve the care they are to render to women and their babies

The quest to discover ways of encouraging midwives to become aware of the importance of research in their daily practice, should be strengthen as this may align them with the present practices.

Research is needed for evaluation of community involvement as a strategy for improving maternal and neonatal death. As independent practitioners, midwives should involve themselves in the advancement of knowledge through research so that women can be provided with the best quality care based on evidence- practices (ICM: Definition of the Midwife, 2005: Online).

Through research, skilled attendants/advanced midwives might be engaged in promoting and participating in the design, implementation and evaluation of studies within their areas of expertise (ICM, Essential Competencies for Basic Midwifery Practice, 2010: Online). Moreover, by being involved in research, the advanced midwife may be able to support and promote holistic care as well as evaluation of effective use of technology as an intervention during pregnancy and childbirth.

The knowledge of research; should then be conveyed to colleagues and other health care workers. This will be managed by being an educator or change agent in the field of midwifery.

3.2.5 EDUCATIONAL FUNCTION OF AN ADVANCED MIDWIFE

In daily practices, advanced midwives as independent practitioners, should act as a clinical preceptors who should have an obligation of educating subordinates and colleagues. As facilitators, should be able to integrate theoretical as well as the practical knowledge which will serve as guidelines and principles that will demonstrate the best practice in midwifery (Meyer, Naude, Shangase & Van Niekerk, 2009: 113).

As a clinical educator, need to provide a favourable learning environment as it may contribute to successful absorption of subject matter to be learned. Advanced

midwives should act as mentors to subordinates and colleagues to ensure preparation for practice (Burns & Perterson, 2005: Online).

In order to ensure the continuity of educational function, advanced midwives should advocate for in-service trainings and refresher causes for colleagues and subordinates. This in turn, may strengthen and help in building the needed relationship with colleagues. It is therefore acknowledged that clinical teaching is a field on its own and cannot be discussed in detail in this study.

3.3 EDUCATION AND TRAINING OF ADVANCED MIDWIVES

The qualification of Advanced Midwifery and Neonatology is preceded by thorough training and education. In order to ensure that advanced midwives are well prepared to practice independently, their training should be prescribed and approved by the following quality assurance bodies:

The South African Nursing Council (SANC). The objectives of the SANC is to control, and to exercise authority in respect of all matters affecting the education and training of registered nurses, midwives/advanced midwives, enrolled and nursing assistants (South African Nursing Act 1978: 5).

The main functions of the South African Qualification Authority (SAQA) was to set standards and to ensure quality; but since 2008, the new Act of NQF, took over this responsibility for the development and quality assurance of HE qualifications (South African Government Gazette: SAQA, 2008: Online). It formulates and publishes policies and criteria for registration and accreditation. The SAQA is also accountable for ensuring that the registered standards and qualifications are internationally comparable (S.A. Government gazette: SAQA, 2009: Online).

The duration of training is one of the critical aspects to be considered in the training of an advanced midwife. Therefore, in trying to ensure that advanced midwifery

students are well equipped with knowledge and skills of practicing independently, during training students should be exposed to theory and practical skills needed for independent practitioners. As a result, to facilitate a better understanding of Advanced Midwifery and Neonatology content matter, theory and practice should be closely intertwined/ integrated (Lisko & O'Dell, 2010: Online).

Therefore, the content of the programme of Advanced Midwifery and Neonatology should include both theory and practical skills. The skills of managing both normal and abnormal midwifery issues should be emphasized and, should form part of content to be learned.

Experiential learning that advanced midwifery students at the UFS have to complete during training is eight hundred and ninety six (896). All these hours are to be worked in different clinical areas dealing with maternity issues including operating theatre where they learn to scrub for caesarean section and intubations of patients during a general anaesthesia procedure (S.A. University of the Free state: Advanced Midwifery and Neonatology study guide. UFS, 2010: 8). The purpose is to integrate theory and practice. In other words the hours that advanced midwifery students spend at clinical areas, assist with better understanding of theory taught in the class room.

The education and training duration differ from one institution to another. According to the curriculum for the Advanced Midwifery and Neonatology designed by the School of Nursing at the UFS (2005: Online), the period of training for an advanced university diploma is one year and for the masters degree is two years while at the University of the Johannesburg; the student may complete a diploma in one year and a masters degree in a one or two years period (South Africa: University of Johannesburg, 2009: Online).

Within this period of training, advanced midwifery students have to be equipped with knowledge and skills of assessing and taking a thorough history including physical examination, counseling, diagnosing and managing different conditions which form the base for the care to be offered.

The education and training that advanced midwives receive, should empower them with knowledge and skills of making internal adjustments and decisions with regard to assessment and referral of patients to tertiary levels of care for the doctor's intervention in time (S.A. National Department of Health: Saving Mothers, 2002-2004: iv).

Based on the knowledge acquired during basic midwifery training, the advanced midwife should know thoroughly the basic midwifery practice. Through this basic knowledge, he/she will be able to identify any deviation from normality and this will help in quick decision making in times of emergencies.

In addition to the basic midwifery knowledge, Fraser et al., (2006: 3) suggest that a wide range of skills and personal attributes of working with childbearing women and other health care professionals should form part of the learning content and experiential teaching during learning. This in turn will shape an independent practitioner needed in midwifery practice.

In order to ensure that advanced midwives are competent enough to can practice independently, should be exposed and involved to midwifery issues during antenatal, intrapartum, pueperium periods and also the neonatal care. They will only gain this experience if placed and utilized in areas that offer midwifery services.

3.4 PLACEMENT AND UTILIZATION OF ADVANCED MIDWIVES.

In order to ensure that advanced midwives are practicing what they have trained for, it is important to place and utilized them appropriately.

3.4.1 PLACEMENT OF ADVANCED MIDWIVES

For the purpose of this study, placement will refer to the deployment and allocation of advanced midwives to clinical areas offering midwifery services. The rationale is to

provide quality care to all women during their childbearing ages, including their families. At the same time, this might help with the improvement of health care outcome such as those targeted by the Millennium Development Goals [MDGs] (Human Resource for Health, 2009: Online).

The WHO in their Millennium Development Goals (2006: Online), asserts that there is generally a gross misdistribution of human health resources in rural and Primary Health Care Centres (PHCC) especially doctors. Loewenson & Thompson ([n.d]: Online), also state that in South Africa there is maldistribution of human health resources.

Responding to this misdistribution, the South African Department of Health is offering bursaries and study leave to practicing midwives for “Scaling-up Midwifery” in the community (Belot, 2007/2008: Online). This positive initiative, might give answers to the Millennium Development Goals, where the South African Government believes and hopes that all pregnant women and newborns will be treated by skilled attendants

Skilled attendants are people with midwifery skills (De Bernis, Sherratt, AbouZarh & Lerberge, 2003: 39). They include midwives, doctors and nurses who have been trained to manage normal pregnancies, childbirth and the immediate postnatal period, therefore the term will be used to indicate an advanced midwife. As a result; the correct placement of skilled attendants might imply the survival and safety of a pregnant woman, baby and her family.

The issue of proper placement of advanced midwives was once emphasized at the Regional Meeting for the Review of Midwifery Standards and Practice Regulations held in Johannesburg (WHO: Reginal Meeting for the Review of Midwifery Standards and Practice Regulations, 2004: Online). In that meeting, an agreement was reached where the rural and primary health care centres are to be staffed by skilled attendants who should ensure safe pregnancy.

Not only placement and expertise of an advanced midwife will ensure the safety of mothers and babies, but utilization of these experts could promote and enhance the passion of working in midwifery related areas.

3.4.2 UTILIZATION OF ADVANCED MIDWIVES

Utilization in this study will mean to make practical and effective use of advanced midwives in all clinical areas providing maternity services. In areas where skilled attendants are utilized, they should demonstrate quality care that will help to reduce maternal and neonatal morbidity and mortality (S.A. National Department of Health: Saving Mothers, 2002-2004: 22).

Furthermore, their utilization in maternity areas, should display a picture of competence, sensitive and supportive caregivers that will always facilitate the ease of the birth for both the mother and the child. Therefore, placement and utilization should be directed to areas offering midwifery services especially where there are no doctors.

Advanced midwives, when placed and utilized correctly, should advocate for the provision wellbeing of the mother, baby and her family. This will be managed by ensuring that the workplace is equipped with all resources enhancing and promoting quality midwifery practice (Loewenson & Thompson, [n,d]: Online).

3.5 ENVIRONMENT IN WHICH ADVANCED MIDWIVES SHOULD BE PLACED AND UTILIZED

3.5.1 PHYSICAL ENVIRONMENT

The physical working environment where advanced midwife should be placed and utilized, should be conducive, i.e., should be well ventilated with enough heat, light, air, and water (Dreyer, Hattingh & Lock, 2004: 82). It is therefore important that the availability of clean running water and sanitation services are available as means of preventing infectious agents that are hazardous to human life (Hattingh, Dreyer and Roos, 2006: 33).

The working environment should make provision for disposing of conception products like placentas and any kind of human products. They should be incinerated as stipulated by the SANC (SANC. Human Tissue Act, 1989: 513) or be buried. This may contribute to a safe environment to both health providers, clients and the community. Accordingly, the disposal of waste medical products like sharps should be done correctly as they can be hazardous to the community if not properly disposed (Naude & Setswe, 2000: 123).

3.5.2 EQUIPMENT

The environment, in which the advanced midwife is placed and utilized, should encompass all the necessary equipment needed for clinical areas conducting maternity services. For instant, the temperature and humidity in the nurseries and in the deliver suit, linen and laundry, sterilizing equipment, accommodation and facilities for both mothers and infants should be available (South African Section 250: General Requirements for All Maternity Departments, 2010: Online). Clean linen should be used between patients as a means of reducing the possibility of cross infection; including different sizes of gloves which should be obtainable at all times.

Equipment for monitoring vital signs should be accessible and be in good working conditions so that they can be able to give accurate results. Hand-held Doppler instrument for fetal heart auscultation and a vaccum extractor should also be available. Effective communication system such radio or telephone and a reliable 24 hour transport service for emergency transfer to hospital should be available. A sterile delivery pack for emergency births should also be on hand should it be needed (S.A. National Department of Health: Guidelines for Maternal Care, 2007: 14).

Drugs for obstetric emergencies such as Pitocin for any emergency post partum bleeding that may occur, Ringers-Lactate solution, magnesium sulphate, hexoprenaline and oxygen should be available at all times at the antenatal clinic (SANC. Government Notice No.R.2488).

The necessary stationery including H10 card should always be available so that all the information obtained during history taking and care offered are documented for reference purposes for at least three years. This is done in order to follow the SANC Regulation No. R. 2488, 26 October 1990 (as amended), which stipulate that “a registered midwife/advanced midwife shall keep a clear and accurate records of the progress of pregnancy, labour and the pueperium of all acts, including emergency acts, which he/she performs in connection with a mother and child”.

3.5.3 EMERGENCY MEASURES

For emergency measures support services like on-side transport and communication means (phones, fax-machines or E-mails) for any emergency situation at the antenatal clinic, might be helpful for preventing any kind of missed opportunities to the client under the care of an advanced midwife (De Kock & Van Der Walt, 2004: 33). Therefore, independent practitioners should advocate for such equipment as a means of facilitating quality care.

The International Confederation of Midwives: Definition of a midwife (2005: Online), indicate that midwives do not only need the support of transport service to be able to

function independently, but also a clear and an ongoing communication is needed for attainment of quality care in maternity areas.

Means of communication such as landline phones, cellphones, computers and fax machines should be available in all maternity areas so that emergencies can be communicated in time (S.A. National Department of Health: Guidelines for Maternity Care, 2007: 14). This might be of help as consultations and referrals need to be communicated in advanced with colleagues for quicker service. Lack of communication equipment may lead to missed opportunities to clients and therefore, advanced midwives should advocate for these devices to ensure that proper and quality service is delivered.

3.5.4 ADDITIONAL RESOURCES (HUMAN RESOURCES)

Another aspect that is very important in an environment where an independent practitioner is placed and utilized is the availability of enough human resources that contribute to safe and effective practice. Therefore, the required number of employees must match with the required skill and work offered (Muller, Bezuidenhout & Jooste, 2006: 248).

Thus, the work environment in which advanced midwives are placed and utilized should be staffed with enough competent staff that will be able to work independently in the absence of medical doctors. Advanced midwives should then maintain this by adhering to the nurse staffing norms confirmed by Zondagh, (2004:20) that suggest one midwife for four clients during antepartum, one midwife for eight clients during postnatal and one midwife for two clients during labour and birth.

Not only midwives should be allocated at antenatal clinics, but also other health professionals so as to cover all needed work to ensure a safe workplace. The South African Guideline for Maternity Care (S.A. National Department of Health: Guidelines for Maternity Care, 2007: 13-16), and the Saving Babies (2003-2005) suggest the staffing norms should be according to different categories of health providers per level of care so as to ensure quality care as follows:

For the Clinic (a unit which normally functions only on weekdays during working hours) there should be midwives, enrolled nurses, nursing assistants, community health worker and a visiting medical officer.
For the Community Health Centre (CHC); there should be advanced midwives, midwives, and enrolled nurses, nursing assistants, community health worker and a visiting or resident medical officer.
Level 1 Hospital; advanced midwives, midwives, enrolled nurses, nursing assistants, social workers, community health workers, full time medical officers and visiting specialist obstetricians.
Level 2 Hospital; advanced midwives, midwives, enrolled nurses, nursing assistants, full time medical officers and full time specialist obstetricians.
Level 3 Hospital; advanced midwives, midwives, enrolled nurses, nursing assistants, full time medical officers and full time specialist obstetricians, including subspecialty skills like fetal medicine.

The involvement of a multidisciplinary health team is important in any workplace as it ensures a smooth referral to different levels of care; for example, on discharge, a community health care worker would continue with a follow-up care. In some cases where an advanced midwife is unable to manage, a doctor would also be required for further management.

According to the Saving Babies (2003-2005: 25), the staffing norms should be as follows:
Maternity: Labour and postnatal wards; Sixteen [16] midwives per deliveries per month on the staff establishment at a level one [1] health care facility.
Antenatal care: two to three (2-3) midwives per 100 bookings per month on the staff establishment.
Newborn care: intensive care (level three), ideal is one nurse to one patient. Acceptable: one nurse to two patients (professional nurses).
High care (level two): ideal, one nurse to two patients. Acceptable; one nurse to three patients (They can be enrolled nurses or enrolled nursing assistants. There should be Professional Nurse cover (plus-minus one per 12-15 patients).

Level one care: ideal; one nurse to four patients. Acceptable; one nurse to 6/7 patients. (These could be enrolled nurses or enrolled nursing assistants with professional nurse cover

By adhering to enough human as well as physical resources might help in delivering the best quality service that might assist in reducing maternal and neonatal morbidity and mortality

A comprehensive care that will ensure lifelong health to a woman, baby and her family should start at antenatal period and continue during, intrapartum, pueperium or post natal period including the neonatal period.

3.6 THE ANTENATAL PERIOD

The antenatal period refers to the time when conception is confirmed until the beginning of labour (Fraser et al., 2010: 231). During this period, the SANC (Regulation No R.2488, 26 October 1990, as amended) stipulate that “the registered midwife/advanced midwife should visit the patient (pregnant woman) at least once in her own home and should examine the patient at least once a month until the 28th week, thereafter at least once a fortnight until the 36th week, and then at least once a week until the commencement of labour.

The UNICEF: Childinfo, (2011: Online) recommends a minimum of four antenatal visits. During these visits the focus should be the measurement of blood pressure, testing of urine for bacteriuria and proteinuria, and blood tests to detect syphilis and severe anaemia (UNICEF, 2003-2008: Online).

The frequent contact with the pregnant woman, enhance maternal health and normal development. Therefore this period should be considered as critical because the woman’s progress has to be monitored throughout pregnancy (De Kock & Van Der Walt, 2004: 9-2). It should therefore be noted that pregnancy is not disease, but a

normal phenomenon that involves body, mind and spirit (Davies, 2007: 4). Therefore, the woman should therefore be given holistic care throughout pregnancy.

3.6.1 HISTORY TAKING

History taking is essentially a screening tool that identifies factors which might detrimentally affect the course of pregnancy. A general background about the woman's health as the point of departure and a thorough history taking, especially during the first visit to a health institution should be taken as this will form baseline information for care to be provided.

To ensure that optimal prenatal care is maintained, Davidson et al., (2008: 339) suggest that during the first visit, full information from each maternity client at the first antenatal assessment should be obtained. This history should include information about the present as well as of the previous pregnancies.

The present history should be taken because it incorporates valuable information regarding the last normal menstruation period (LMP) which helps in calculating the expected date of birth [EDB] (Fraser et al., 2006: 243). Advanced midwives should be able to calculate the expected date of birth (EDB) correctly by dates using the Naegele's rule which should be based on the LMP (Davidson et al., 2008: 344). This is needed as baseline knowledge useful in determining among others, the fetal growth. (Henderson & Macdonald, 2004: 247).

In order to ensure proper arrangement and preparation for the confinement place, it is also advisable to know the EDB. This is needed if the patient has to be transferred from one level of care to the other as arrangement will be done in time like in the case of elective caesarean section (Cronje & Grobler, 2009: 335).

Knowledge of the EDB will also help in identifying problems such as prematurity or post maturity that may need advanced care in the absence of a doctor. This is suggested as in the absence of a doctor, advanced midwives should be able to insert an intravenous infusion which might be a peripheral, scalp or umbilical in the

absence of a medical doctor before transferring such a baby to hospital for further management if the baby is born at the health centre (Fraser et al., 2010: 839).

With regard to post maturity, wherein a fetus is still in utero after fourty-two (42) weeks; the fetus is usually exposed to decreased blood perfusion and oligohydramnios (reduced amniotic fluid) that causes variable decelerations and as a result, the fetus may suffer from lack of oxygen, fluids and nutrients (Pillitteri, 2002:404). In such a case, the advanced midwife should be able to participate in induction of labour in consultation with a doctor within the hospital setting.

Biographical and personal information like, name, age, address and contact numbers, should always be taken into consideration so as to be able to know more about the client under the advanced midwife's care. Through this history, the next of kin or relatives of the client could be easily traced should they be needed (S.A. National Department of Health: Guideline for Maternity Care, 2007: 20).

The social life style history of a woman such as tobacco smoking and alcohol abuse should also be taken into consideration as it consists of the vital information that should be communicated to expectant women (Green & Wilkinson, 2004; 142). For example, babies born from women who smoke are frequently smaller, they frequently have respiratory problems at birth and in their first year of life; there are also higher rates of prematurity, stillbirth and low birth weight (Cronje & Grobler, 2009: 127, Fraser et al., 2010: 238). Therefore health talks with regard to quitting smoking should be preached during pregnancy.

Fetuses of women who are heavy drinkers (alcohol abusers) are at increased risk for developing fetal alcohol syndrome (FAS) which is characterized by restricted growth, facial abnormalities, nervous system problems and mental retardation (Davidson et al., 2008: 397). In trying to prevent and help such women, it is imperative for advanced midwives to give advices or health talks which might help them to reduce or stop the behaviour/drinking alcohol while pregnant.

History regarding health or pregnancy-related problems since the start of pregnancy is important as minor pregnancy disorders will be known and treated. In cases of

minor pregnancy problems such as heartburn, constipation or nausea and vomiting, the birth attendant should be able to give appropriate advices that will relieve the discomfort the woman is experiencing or reporting (De Kock & Van Der Walt, 2004: 9-6).

It is imperative that the care givers should know whether the current pregnancy was planned and wanted. This information is important in that pregnant women are to be supported holistically especially if there were a period of infertility before she became pregnant (De Kock & Van Der Walt, 2004: 9-6, Davidson et al., 2008: 327).

The previous obstetrical history should also be taken whereby the number of previous pregnancies and the course of each are required to form a baseline plan for the present pregnancy. This information includes miscarriages, progress of labour and purperium. By knowing this history, the possibility of preventing complications and the monitoring of the present pregnancy closely may be increased (Fraser, 2006: 244). Advanced midwives should therefore consider antenatal history as very important for planning the care of the present pregnancy (Cronje & Grobler, 2009: 59).

Information regarding previous operations on the uterus or pelvic floor are significant as it will be known in advanced cases that may need to be transfer to hospital where there are facilities for performing caesarean section should it be needed (Henderson & Macdonald, 2004: 249).Medical history should also be taken as the skilled attendant may be able to know more about conditions such Pre-eclampsia, anaemia or gestational diabetes that normally recur during pregnancies (De Kock & Van Der Walt, 2004: 9-7).

A thorough antenatal history contributes to early detection of problems that could be treated and managed early to prevent complications thus benefiting both the mother and her baby (S.A. National Department of Health: Guidelines for Maternity Care, 2007: 19).In order to ensure that quality care is provided during the antenatal period, physical examination from head- to- toe should be performed as required by the midwifery scope of practice **(**SANC. Regulation No.R.2488, 26 October 1990).

3.6.2 PHYSICAL EXAMINATION

To ensure the best possible antenatal outcomes for women and neonates, advanced midwives should be well equipped with knowledge and skills to perform a thorough physical examination. A physical examination begins with the assessment of vital signs, body, including an abdominal assessment, pelvic and vaginal assessment (Davidson et al., 2008:344). The reason for starting with vital signs is to get stable and accurate vital signs results before the woman become anxious when other routine antenatal care procedures are being performed (South African's Three Centres Consensus Guidelines on Antenatal Care, 2001: Online).

Accurate monitoring of vital signs is very important because, there will be identification of deviations from normal limits. For monitoring the blood pressure, the baumamonometer (sphygmomanometer) should be available and be in a good working order. Cuffs with different sizes should be obtainable in order to cater for all sizes of clients for accurate results (De Kock & Van Der Walt, 2004: 20-1).

It is crucial to measure the blood pressure at each and every visit at the ANC in order to guard against any occurrence of pregnancy induced hypertension or pre-eclampsia [PET] (Fraser et al., 2006: 338). PET is one of the top five maternal killer diseases in pregnancy (WHO, 2011: Online). The blood pressure (BP) should be accurately monitored and if there is any sign of hypertension, the woman should be treated so as to keep the BP within normal ranges; that is, between 110/70-120/80 (Henderson & Macdonald, 2004: 782).

A diagnosis of PET can only be made if the birth attendant has a clear understanding of the condition as well as the management thereof (Green & Wilkinson, 2004: 57). Where the condition was not treated well, the woman can complicate to renal failure, intracerebral haemorrhage or increased intraocular pressure that can cause retinal detachment; leading to blindness (Davison et al., 2008: 507).

Rise in the body's temperature should not be ignored as it may alert the care-giver to respond to a number of issues like infection or pain that might be due to premature labour (Health On the Net Foundation, 2010: Online). As a result, the thermometers

should be available at the antenatal clinic so that any problem with regard to infection signs can be identified treated or the woman can be transferred to the next level of care for further management (Lowdermilk & Perry, 2006: 115).

An increased pulse rate may also imply that the woman is anxious or there is a possibility of cardiac disorders (Davidson et al., 2008: 361). In cases of severe bleeding that may lead to shock, pulse rate can also be increased usually if there is a presence of antepartum haemorrhage caused by placenta praevia (S.A:Essential Steps in Managing Obstetric Emergencies: Facilitators Guide, [n.d]: 37). Therefore, it is important for an advanced midwife therefore to observe irregularities with regard to pulse rate as well as any signs of anxiety and stress.

All facilities offering antenatal services should be equipped with good working weighing scales. This will help with the identification of any abnormalities with drastic weight gain or loss. Where there is a problem of excessive weight gain, gestational diabetes should be suspected.

The effects of diabetes on pregnancy such as; a big baby, polyhydramnios, intrauterine death including congenital abnormalities should be taken into consideration (Cronje & Grobler, 2009: 526). Knowledge of such conditions will help in monitoring the present pregnancy closely so as to exclude the signs mentioned above (Henderson & Macdonald, 2004: 805)

The woman's body mass/weight and height should be assessed so as to establish a baseline for future comparison (Pillitteri, 2002: 242). This is suggested because in the case of overweight; the lie and the presenting part of the fetus are difficult to be determined, cephalopelvic disproportion during the first stage of labour is more common and shoulder dystocia during the second stage of labour becomes a major risk (Cronje & Grobler, 2009: 60).

It is important that the woman's height and sometimes the size of her shoes are ascertained, since stature and size of feet may give indication of pelvic size (Buchmann, 2007: Online). In the case of low body mass, thorough examination should be done to exclude diseases causing weight loss such as tuberculosis and

Aids and therefore food supplementation is beneficial to such women (Moore et al., 1983; cited in Henderson & Macdonald, 2004: 256).

The head and scalp should be checked for symmetry and cleanliness of hair to exclude any source of infection (Pillitteri, 2002: 242). The neck should be examined for lymph nodes which may be due to infection or carcinoma. Chest and lungs should be examined to exclude funnel or pigeon chest that may affect breathing pattern negatively. A lump or bloody nipple discharge should also be investigated to exclude the presence of a malignant tumour (Cronje & Grobler, 2009: 61).

Genitals should be inspected for signs of sexually transmittable diseases presenting with multiple ulcers, purulent discharges and enlarged inguinal lymph nodes (Davidson et al., 2008: 348). Both upper and lower extremities should be examined for signs of eodema which may indicate the presence of PET (Williams, 2011: 9).

3.6.3 ABDOMINAL EXAMINATION

Abdominal examination is carried out to establish and to affirm that fetal growth is consistent with gestational age. It is also done in order to observe the signs of pregnancy like fetal movements, striae gravidarum and linea nigra, to locate fetal parts and also to detect any deviation from normal parameters (Fraser et al., 2010: 247). Skilled attendants should be competent in identifying any deviation from normality like intrauterine growth retardation which if present, should be transferred to the next level of care for doctors' management, where there are facilities for provision of advanced care (Davidson et al., 2008: 618).

Through inspection, the size of the uterus can be determined and multiple pregnancies or intrauterine growth restriction can be observed. (Fraser et al., 2009: 276). The shape of the uterus can also be observed where in the case of posterior position; a saucer-like depression may be seen at or below the umbilicus. Prolonged labour usually occurs in posterior positions due to the fact that the fetal head has to rotate 3/8 of a circle before it can be on the anterioposterior diameter for possible birth (Fraser. et al., 2010: 574).

Presence of scars from previous caesarian sections or cardiac operations should be regarded as a risk factor that needs to be managed by doctors in a hospital situation (Davidson et al., 2008: 618). Due to complications associated with such operations, advanced midwives should be able to manage such clients by transferring them to the next level of care where there are appropriate resources of managing such conditions.

The shape of the abdomen on the other hand, is used for identification of the presenting part. Knowledge regarding the presenting part is useful in determining the possible mode of birth which will be of great help in that arrangements for confinement place will be done in time if there is a need for transferring to other level of care (De Kock & Van Der Walt, 2004: 12-10 and Pillitteri, 2002: 557).

During abdominal palpation, an advanced midwife should be able to determine the following; fetal position, fetal lie, presentation and the engagement of the presenting part. Fetal position refers to the relationship of the landmark on the presenting fetal part to the anterior, posterior, or sides of the maternal pelvis (Davidson et al., 2008: 582). The importance of diagnosing the fetal position enables the skilled attendant to rule out malpositions which could lead to prolong or obstruct labour.

The fetal lie refers to the long axis (spinal column) of the mother in relation to the long axis of the fetus (De Kock & Van Der Walt, 2004:12-9). Therefore, advanced midwives should be aware that the fetal lie is a very important landmark because when the lie is transverse, the normal vertex birth is impossible and therefore, the woman should be transferred to clinical areas where caesarian section could be conducted.

Fetal presentation is determined by the fetal lie and refers to the body part of the fetus that enters the maternal pelvis first and leads through the birth canal during labour (Pillitteri, 2002: 461). Knowledge of fetal presentation is important as breech presentation; especially in primigravidas who might require referral to health facilities where caesarian section could be performed if necessary.

Engagement is the term used to indicate that the largest transverse of the presenting part has passed through the maternal pelvic inlet into the true pelvis (Lowdermilk & Perry, 2006: 320). This reassures the skilled attendant that the maternal pelvis is likely to be adequate for the size of the fetus to allow spontaneous birth that could be conducted by midwives/ advanced midwives.

In the case of a breech or shoulder presentation, advanced midwives should refer such cases to hospital areas where resources for caesarian sections are available if needed. But in the case where the woman arrives at hospital or at a community health centre being in advanced labour, the South African Guidelines for Maternity Care (2007: 99) suggest that such a labour should be supervised by skilled attendants.

Assessing fetal heart rate during the ANC visits is important because audible fetal heart rate indicates a positive sign of an alive fetus (Williams, 2011: 3). The normal fetal heart rate is between 110-160 beats per minute (Fraser et al., 2010: 46).The pinard stethoscope or a hand-held Doppler should thus always be available at the ANC as the results obtained through this device are usually accurate (Cronje & Grobler, 2009: 73b).

If available, the midwife can use a cardiotocograph (CTG) to assess the fetal wellbeing and make possible diagnosis of fetal status. The advanced midwife should be able to insert and interpret the CTG as it gives more accurate results (Fraser, 2006: 440). It is therefore recommended that CTG should be used to women presenting with high risk conditions such as PET, antepartum haemorrhage(APH), women with a history of previous stillbirths as well as in induced labour (De Kock & Van Der Walt, 2004: 13-10).

Urine testing should always be done at each antenatal visit using urine dipsticks for checking any abnormalities such as leukocyte or blood when there is a sign of infection or bleeding (Cronje & Grobler, 2009: 66).

Proteinuria or oliguria in the case of PET is usually detected (Green & Wilkinson, 2004: 59; Fraser et al., 2006: 247). As a result, advanced midwives should

incorporate urine testing in their routine at the antenatal clinic visits. This will ensure that they diagnose all possible abnormalities which may affect a woman; and therefore, should act in a responsible way to prevent complications

During the antenatal period, blood testing should be done routinely especially during the first visit (Lowdermilk & Perry, 2006: 247). This should be done in order to know the blood grouping and to identify the Rh factor of a woman. In most population, the Rh factor is positive (Davidson et al., 2008: 520). In the case where an Rh negative person is exposed to Rh positive blood, an antigen-antibody response occurs, antibodies are formed and this can cause a serious agglutination and hemolysis of red blood cell which are usually the cause for habitual/recurrent abortions (De Kock & Van Der Walt, 2004: 24-7). Therefore in all maternity clinics offering antenatal services, the anti–D immunoglobulin should be available and the protocol be followed on how and when should it be given (Fraser, Cooper & Crawford, 2009: 317).

The haemoglobin level of all pregnant women should be estimated during the first visit to the ANC so that anaemia can be diagnosed and rectified before the woman goes into labour. The South African Guideline for Maternity Care (2007: 116) states that the possibility of postpartum haemorrhage is increased in woman entering labour with a low Hb. Therefore, to make it easy for the blood taking procedure, specimen bottles for blood taking should always be at hand at the ANC so that lack of such equipment should not be the reason for missed opportunities to the client.

Blood testing through the rapid plasma reagent (RPR) or the Venereal Disease Research Laboratory for syphilis should be done to detect reagin antibodies in the mother which will affect the baby negatively. In the case where blood results are positive, Procaine penicillin G: 2,4 mega-units intramuscularly with probenecid 500mg orally four times daily for 10-14 days may be prescribed (Cronje & Grobler, 2009: 453). Therefore, advanced midwives should advocate for standing orders prescription if not allowed to prescribe such treatment without the doctor’s orders and start the treatment as soon as possible. This treatment is important because untreated fetus can be infected and be born with congenital syphilis (Harrison, 2002: 88).

The advanced midwife should consider the risk of mother to child transmission of HIV as a very critical issue. As a result, advanced midwives, should impart information to all pregnant women regarding the importance of testing and also of knowing the HIV status (S.A. Clinical Guidelines: PMTCT, 2010: 8).

Skilled attendants should ensure that community health workers including trained HIV/AIDS counselors adopt the style of “Provider-Initiated Counseling and Testing” to all HIV women attending antenatal care (S.A. Clinical Guidelines: PMTCT, 2010: 8). This is important as women will be able to make informed decision that might be of beneficial to both the mother and the unborn baby

The Clinical Guidelines further state that, in the case where the woman refuses testing, skilled attendants should initiate and pursue the client the aim being to start with the treatment if results are positive.

Advanced midwives, should advocate for clients by making sure that the counseling and testing for HIV is presided by pre-and post counseling, done by a professional counsellor (S.A. Department of Health: PMTCT, 2004: 6-34). Through counseling, women’s emotions will be attended to, thus also helping with the acceptance of the condition. Furthermore, at this stage; women might also be helped to make an informed decision regarding feeding option for her baby (Lowdermilk & Perry, 2006: 705).

All antenatal clinics should be equipped with facilities for testing as well as for preventing transmission of HIV from Mother-to-Child (Fraser et al., 2006:365). Advanced midwives should ensure that antiretroviral treatment such as AZT, TDF and FTC nevirapine; condoms and all other HIV services are available to facilities offering antenatal services in trying to reduce the spread of

The transmission of HIV from mother to child is usually reduced in women that have started early in pregnancy with antiretroviral treatment (Cronje & Grobler, 2009: 428). Consequently, the South African Department of Health (2009: 2014) also recommends the integration of the PMTCT of HIV into the ANC routine.

During physical examination, a stethoscope can be used for listening to lung functioning in order to detect any deviation from normality such as heart murmurs. This device can also be used for auscultation of the fetal heart rate (Green & Wilkinson, 2004: 177). It is therefore important for advanced midwives to keep good working stethoscope at the health care centre for accurate results which might enhance identification of high risk women (S.A. National Department of Health: Guidelines for Maternity Care, 2007: 120).
In order to monitor the fetal growth and to ensure quality antenatal care, advanced midwives should be able to do an abdominal palpation and inspection.

3.6.4 VAGINAL EXAMINATION

Vaginal examination is done to confirm sexually transmitted infections, vaginal or cervical abnormalities and probable signs of pregnancy (Fraser et al., 2006: 195, De Kock & Van Der Walt, 2004: 5-3 and Cronje & Grobler, 2009: 61). It should not be performed in the case of vaginal haemorrhage to avoid aggravation of more bleeding (SANC. Regulation No.R.2488, 26 October1990, as amended). Working in accordance with this regulation, will aid in reducing maternal deaths caused by severe haemorrhages during child bearing age.

In order to master vaginal examination procedure, the advanced midwife should have a basic theoretical knowledge of anatomy and physiology of the female reproductive organs. This knowledge will enable the independent practitioner to be competent in determining the cervical dilatation during labour and also in identifying the presenting part (De Kock & Van Der Walt, 2004: 5:3).

Through vaginal examination, normal vertex and abnormal fetal presentations such as breech face and persistent occipital-posterior can be diagnosed. The advanced midwife should always consider transferring all abnormal fetal presentations such as shoulder presentation, breech especially in a primigravida as well as multiple pregnancy to areas where caesarian section could be done if necessary.

When doing vaginal examination, aseptic technique should always be considered to prevent cross infection (Williams, 2011: 84). Therefore, sterility should be maintained throughout the vaginal examination procedure. Sterility can be maintained by making sure that there are enough gloves of different sizes to be used including cleaning lotions when handling any kind of body fluids (S.A. National Department of Health: Guidelines for Maternity Care, 2007: 13).

While doing vaginal examination during pregnancy, a pelvic assessment can be performed in order to determine the adequacy of the pelvis.

3.6.5 PELVIC ASSESSMENT

A pelvic assessment should be done at 36 weeks of pregnancy when pelvic muscles are relaxed so that the woman may experience less pains during the procedure. Fraser et al., (2006: 89) suggest that at 36 weeks, the size of the fetus is big enough to be compared to the size of the pelvis, and thus able to know the adequacy of the birth canal.

The midwife should do a thorough assessment to ascertain whether the pelvis is adequate for a normal birth and where any doubts exists the woman should be referred to a medical practitioner for possible caesarean section (SANC.Regulation No.R.2488. 30 November 1990, as amended).

The measurements of the three diameters, the anteroposterior, oblique and the transverse diameter should be taken into consideration. Through these measurements, it could be estimated whether the passage (pelvis) is adequate enough for the fetus to pass through during labour (Fraser et al., 2006: 89). Knowledge of the size of the pelvic inlet, midpelvis and pelvic outlet is needed as it will provide a basis for diagnosis of cephalo-pelvic disproportion (Cronje & Grobler, 2009: 306).

The adequacy of the pelvis during pregnancy is important as sometimes transferring from a clinic to the other level of care during labour can be delayed due to transport problems (S.A.Doh, 2002-200: xii).

Appropriate knowledge of the anatomy of the fetal skull and the diameters are essential aspects and can be measured while performing pelvic assessment. This will help in determining the mode of birth and be able to plan for referral in advanced and give the needed information to the expected mother and family to alleviate anxiety (De Kock & Van Der Walt, 2004: 5-3).

Intervention of drugs during antenatal care is sometimes needed, therefore, it is imperative for advanced midwives to have knowledge of drugs that can be used during pregnancy.

3.6.6 DRUGS THAT AN ADVANCED MIDWIFE CAN ADMINISTER OR PRESCRIBE DURING PREGNANCY

Although pregnancy is regarded as a normal phenomenon, sometimes there are problems that may need to be treated with drugs. For professional nurses and midwives practicing in primary and community health care centres, there is a protocol allowing them to prescribe certain drugs in the absence of a medical practitioner/doctor. It is crucial for independent practitioners to be knowledgeable with indications, dosages and side-effects of drugs commonly used during pregnancy.

When a woman presents with a low haemoglobin level (Hb) or multiple pregnancy, the skilled attendant should prescribe iron replacement drugs like; Ferrous Sulphate and Folic Acid in order to avoid the woman entering labour with a low Hb (S.A. National Department of Health: Essential Drug Programme, 2008: 104, Fraser et al., 2006: 319).

For hypertension in pregnancy, Methyldopa orally and for eclampsia; magnesium sulphate can be prescribed before transferring the woman to hospital (The National Department Of Health-Essential Drugs Programme, 2006: 91). Tetanus Toxoid

should also be given during pregnancy. The purpose of this maternal immunization is to protect the neonate against neonatal tetanus (Harrison, 2002:96, Cronje & Grobler, 2009: 409).

Syphilis in pregnancy can affect the unborn child negatively, for example the child may be born with syphilis (neonatorum syphilis). However, advanced midwives can prescribe Benzathine Benzylpenicillin, intramuscularly, weekly for 3 weeks in trying to prevent complications. Allergic patients to penicillin, can be given Erythromycin, oral, 500mg 6 hourly for 28 days (S.A.Department of Health: Essential Drug Programme, 2008: 105).

During the ANC visits, all HIV positive women should be started with antiretroviral prophylaxis or treatment (South African National Department of Health. Clinical Guidelines: PMTCT, 2010: Online). Mothers should always receive nevirapine medication at the antenatal clinic at 28 weeks of pregnancy and must take the medication when they go into labour or when membrane has rupture (Fraser et al., 2006: 368).

Constipation is common during pregnancy; therefore, on top of advices on diet full of roughage, an advanced midwife can prescribe and administer a fleet enema in severe cases (Cronje & Grobler, 2009: 419).

In addition, advanced midwives should bear in mind that midwifery care does not end-up during pregnancy. Therefore, intrapartum period should also be monitored to ensure that any complications that may crop-up, are managed and treated in time.

3.7 INTRAPARTUM PERIOD

The intrapartum period is the time from the onset of labour until the birth of the infant and expulsion of the placenta (Davidsion et al., 2008: 338). During this period, the advanced midwife should stay and provide holistic care to the woman for as long as

the condition of the patient or the child may demand (SANC, Regulation No. R.2488. 30 November 1990, as amended).

For ensuring that labour is progressing well, the care provided should include monitoring the wellbeing of the mother, fetus and the progress of labour which should be documented on a partogram. A partogram is a chart on which the significant features of the progress of labour are entered in a graphic form (Fraser et al., 2006: 429). It should be used from the onset of labour until the end of the second stage of labour (S.A. National Department of Health: Guidelines for Maternity Care, 2007: 37).

Skilled attendants should always consider the use a partogram chart as it provides the opportunity for early identification of deviations from normal (Fraser, Cooper & Crawford, 2009: 472). Therefore, for ensuring quality care, the per vaginum examination's findings, should be correctly plotted on the partogram.

Consequently, it is advisable to use this graphic recording as an indicator for augmentation of labour and also for identifying problems such as prolonged labour which may lead to fetal distress (Cronje & Grobler, 2009: 77). In essence, good monitoring and management of labour progress should depend on the rule of the Ps, i.e.; patient's psyche, passenger, powers and passage (Pillitteri, 2002: 468).

3.7.1 MATERNAL WELLBEING (PATIENT /MOTHER)

During labour, the woman's vital signs should be monitored accurately so that deviation from normal can be identified and treated. In the case of severe bleeding, the blood pressure usually drops. In a woman who has had pre-eclampsia or essential hypertension during pregnancy, labour, the BP may further be elevated. In the case of severe bleeding, skilled attendant should be able to replaced lost fluids and resuscitate the patient by inserting an intravenous infusion (Fraser et al., 2010: 467).

Labour pains, anxiety, infection, haemorrhage or ketoses may increase pulse rate up to 100 beats per minute (Davidson et al., 2008: 653). It is therefore important that an increase in pulse rate is investigated so that appropriate follow-up is initiated to ensure provision of quality care.

Temperature should remain within normal range as pyrexia is indicative of infection or ketosis. Caregivers should ensure a safe environment for the woman and prevent infection by maintaining good standards of hygiene and care correct hand-washing before and after attending the woman, frequent vulva swabbing and changing of vulval pads are also important (Henderson & Macdonald, 2004: 448).

In order to enhance descend of the presenting part, the bladder should be kept empty all the times as full bladder delay engagement (Cronje & Grobler, 2009: 75). Whenever possible, the woman in labour should be allowed to walk around, to take a warm bath if membranes still intact or shower and to assume any position she feels comfortable as this may contribute to pain distraction and respecting the rights of a patient (De Kock & Van Der Walt, 2004:13-7).

The patient (woman in labour), requires high energy resources which can be sustained by adequate fluid and food intake (Fraser et al., 2010: 467). This indicates that in all low-risk cases of normal labour, there should be no restriction of oral intake so as to maintain the energy needed especially during labour (De Kock & Van Der Walt, 2004: 13-7).

Emotional support is very important during labour. The patient in labour should be supported fully by advocating for a doula and reassurance from nursing personnel and family members. Continuous support from a doula has proven dramatically beneficial at this stage and in cases where there is a shortage of staff as patient will be under the care of a doula (Klaus, M.H., Kennel, & Klaus, P.H, 2002: 3).

Through this support, the woman will be calm and labour pains may be less perceived. Informing the woman about the progress of labour and the condition of the baby, may contribute a lot the parents' peas of mind (Pillitteri, 2002: 478).

Non-pharmacological pain relief methods such as rubbing the woman's back, walking around, warm bath or shower including soothing music should always be employed as they distract pains during labour without affecting the wellbeing of the neonate (Davison et al., 2008: 659).

3.7.2 THE FETAL WELLBEING (PASSENGER/FETUS)

During labour the advanced midwife should monitor fetal wellbeing by assessing the following critical aspects; fetal heart rate, fetal movements, colour of meconium and presence of caput and moulding of the fetal skull.

The fetal heart rate should be monitored throughout labour to ensure that it ranges within normal limits which is between 110 and 160 beats per minute (Fraser, Cooper and Crawford, 2009: 481). The role of the advanced midwife should be to monitor it half hourly until the end of the second stage of labour so as to identify any deviation from normality for immediate correction (S.A. National Department of Health: Guidelines for Maternity Care, 2007: 36).

Fetal movements as noted by the midwife or reported by the mother can be an indicator of fetal wellbeing. Davidson et la., 2008: 551) are of the opinion that reduced fetal movements may designate preterm birth, asphyxia, intrauterine growth restriction, and fetal death. In the case of meconium-stained liquor, amnion infusion should be performed to dilute and flush it out with the intent of avoiding meconium aspiration syndrome after birth of the neonate (Lowdermilk & Perry, 2006: 387).

Amnion infusion can also be used to supplement amniotic fluid in the case of premature rupture of membranes, or postmaturity to prevent any risk of variable decelerations because of umbilical cord compression (Galvan, Mullem & Broekhuizen, 2006: Online).

Thick meconium is common in breech presentation (Fraser et al., 2006: 552). However, continuous observation should be done in order to attend to any signs of fetal distress in time (Green & Wilkinson, 2004: 654).

Through vaginal examination, the presence of moulding which may designate signs of cephalo-pelvic disproportion should be identified and in such cases; the woman should be given more information and then be prepare for caesarian section after signing consent (Fraser, Cooper & Crawford, 2009: 566).

3.7.3 POWER (UTERINE CONTRACTIONS).

Powers refers to contractions. Strong and coordinated contractions are required for labour progress, especially when resistance is caused by a larger than usual fetus or small pelvis (Cronje & Grobler, 2009: 304). For ensuring that labour is progressing well, skilled attendants should focus on monitoring factors that determine effectiveness of contractions which are: the intensity, duration and frequency. All this information should be plotted/ recorded accurately on a partogram to serve as a guide to the progress of labour (Fraser et al., 2010: 470).

Poor contractions may be the cause for delay in labour progress, therefore, advanced midwives should be able to differentiate between delay in labour (active phase arrest) which is usually caused by insufficient uterine contractions and obstructed labour which occurs in spite of good uterine contraction (Henderson & Macdonald, 2004: 963).

Certain factors such as a full bladder, dehydration, keto-acidoses, inadequate pain relief, anxiety and tension, may contribute to prolonged labour, therefore, skilled attendants should monitor them for prompt action should they be a problem (Fraser et al., 2010: 562).

In the case of poor contractions, an advanced midwife should consider the augumentation of labour by administering of oxytocin, not more than 10 units at a time (SANC.Regulation No. R. 2488. 26 October, 1990, as amended). Oxytocin should be used with cautions for the fear of complications it carrie such as; uterine rupture, PPH, amniotic fluid embolism, fetal hypoxia and asphyxia (Fraser et al., 2010: 559).

3.7.4 PASSAGE (BIRTH CANAL)

Pelvic assessment should be done in order to determine whether the size and shape of the pelvis are adequate for normal vertex birth (Davidson et al., 2008; 353). This procedure can be done during pregnancy; at 36 week as discussed early in this chapter. Advanced midwives should also make certain that engagement of the presenting part has occurred as this may give indication of whether the size of the pelvis (birth canal) is adequate or not for the fetus to pass through (Cronje & Grobler, 2009; 305).

Vaginal examination is mostly done during labour, it is a stressful and uncomfortable procedure for the woman (Lowdermilk & Perry, 2006: 414). During labour, it should be carried out for ensuring the normal progress which is determined by the cervical dilatation and the decent of the presenting part. The SANC (Regulation No. R2488.as amended) recommend that the procedure be done every four hours during the latent phase of labour and two hourly in the active phase of the first stage of labour.

Throughout the procedure, sterility should be maintained by using sterile packs, gloves and antiseptic cleaning lotions. This is suggested as a means of preventing cross infection which is commonly possible during internal examination (S.A. NDoh: Guideline for Maternity Care in South Africa, 2007: 13).

Normal vertex presentation is by and large conducted by midwives independently in all maternity areas (Pillitteri, 2002: 461). Therefore, it is imperative that skilled attendants be competent in diagnosing malpositions such as breech, face transverse and shoulder as such fetal presentations can be well managed in a hospital situation with all the necessary resources for managing complications (Davidson et al., 2008: 726).

Cord prolapsed is common in breech presentation and may lead to fetal distress or to fresh-stillborn (Lowdermilk & Perry, 2006: 7860). Therefore, cord prolapsed should

be treated as an emergency due to its complications (Fraser et al., 2006: 561). Therefore management of this condition will include transferring and preparing the woman for caesarian section a hospital with facilities for performing caesarian section and with neonatal care unit in the case of prematurity or sick infant (De Kock & Van Der Walt, 2004: 26-39).

As independent practitioners, advanced midwives should be competent enough to can manage assisted births with forceps or vacuum independently (Chapman & Charles, 2008: 136). This is suggested as in the case of prolonged second stage of labour; for an example, it might be difficult to transfer a woman to the next facility for doctor's management (De Kock & Van Der Walt, 2004: 27-1).

Van Dyk (2008: 43) states that more than 60% of cases of transmission of HIV infection from a mother to her baby occur during labour and birth. Due to the fact that HIV transmission from mother-to-child is increased during labour, precaution should be taken to minimize transmission by avoiding the use of invasive obstetric procedures such as routine shaving, episiotomy cutting and should work and practice in accordance with evidence-based obstetric interventions at all times (S.A. National Department of Health: PMTCT Policy and Guidelines, 2008: 17, Better birth Initiative, 2002: Online).

PMTCT of HIV during labour; should be enhanced by initiating testing and counseling when the HIV status is unknown, and if not possible before birth; then it should be initiated as soon as possible after birth (S.A. NDoh. Clinical Guidelines: PMTCT, 2010: 17).

To ensure that in woman labour is protected from any discomfort caused by labour pains, infections or any kind of disease, an advanced midwife should be able to prescribe and administer applicable drugs.

3.7.5 DRUGS THAT ADVANCED MIDWIVES MAY ADMINISTER OR PRESCRIBE DURING INTRAPARTUM

When contractions are identified as the cause for poor progress of labour, the advanced midwife in consultation with the woman may agree on augumentation of contractions by giving oxytocin, starting with a low dose of 2 units (SA. National Department of Health: Augumentation of Labour with oxytocin, 2006: 100).

Precautions should be taken not to use this drug in grand-multiparas or caesarian section clients for the fair of rupture of the already weakened uterine wall from the previous births (PubMed: Oxytocin use in Labour, 2002: Online).

For labour pains, advanced midwives should choose non-pharmacological pain relief methods as they have no side effect to the woman or fetus. Although these pain relief methods are preferred, there are times where sedatives such as; Pethidine and Aterax intramuscularly need to be given. Aterax is recommended because it lessens the incidence of vomiting and nausea caused by Pethidine (Green & Wilkinson, 2004: 313).

According to the SANC (Regulation No.R.2488. 26 October 1990, as amended), midwives cannot prescribe schedule 5 and the abovementioned drugs. In order to have these drugs on hand where advanced midwives worked, skilled attendants should advocate for standing order prescriptions; especially in areas where doctors are not freely available.

Inhalation like Entonox can also be used because the woman is able to administer it herself (Fraser et al., 2006: 462). Lignocain 1%, not more than 20ml can be given as a local anesthesia before performing an episiotomy (Kafali, Litemur, Gozdemir, Simavli & Oztur Turhan, 2008: Online).

Antretroviral therapy such as Nevirapine and Zidovudine can be given to HIV positive patients when they are in labour especially if the membranes have rupture as a means of preventing HIV transmission from mother-to-child (Cronje & Grobler, 2009: 428). Before commencing with the antiretroviral therapy, the woman should have

been gone through the process of pre and post-counselling, but if that was not done during pregnancy, this can be initiated during labour or after labour for the benefit of the fetus (S.A. National Department of Health: Clinical Guidelines: PMTCT, 2010: 18).

3.8 PUEPERIUM (POST NATAL) PERIOD

The pueperium or the postnatal period refers to the six-weeks following childbirth, expulsion of the placenta and the membranes (Pillitteri, 2002: 578). In South Africa the postnatal care is provided by competent midwives that should be well equipped with knowledge and skills of managing a woman and her baby well at this period (Fraser et al., 2010: 649). The focus of care should be on physiological as well as psychological changes that need to be closely observed for any deviation from normality (Davison et al., 2008: 1053).

The physiological changes encompass the involution of the uterus and vagina, production of milk and lactation, restoration of the normal menstrual cycle and the beginning of a parenting role including the postpartum depression (De Kock & Van Der Walt, 2004: 17-3). Therefore skilled attendants should monitor these changes closely in order to ensure that the woman's health returns to pre-pregnancy stage without problems.

Midwives should make sure that all conception products (placenta and membranes) are expelled as this will promote free drainage of lochia and involution of the uterus. To ensure this, the placenta and its membranes should always be examine for its completeness as if not, they can be retained and be a source of infection and involution that may contribute to postpartum haemorrhage (Henderson & Macdonald, 2004: 988) For enhancing and promoting involution, the bladder should be kept empty; clots should be expelled by rubbing the abdomen.

Uterine atony, subinvolution, painful episiotomy or perineal lacerations, deep vein thrombosis (DVD) and mastitis are the postpartum complications that need to be

monitored closely to exclude deviation from normality (Fraser et al., 2006: 611). Breastfeeding should be encouraged as the hormone; pitocin, released during breasfeeding helps with the contraction of the uterus and involution is thus promoted (Lowdermilk & Perry, 2006: 479).

The advanced midwife should measure the fundal height for at least for ten days to ensure that it is contracting and become smaller and harder. During the pueperium, the vagina should be inspected for signs and symptoms of infection and lacerations that could have not been sutured. If present; they should be sutured to avoid occurrence of postpartum bleeding (S.A. National Department of Health: Guidelines for Maternity Care, 2007: 60).

Vital signs should be assessed and monitored closely during the pueperium period so as identify and treat any deviation that could be present such as fever as it is common at this stage Cronje & Grobler (2009: 109). Lochia should therefore be inspected for colour, bad odour which may indicate infection which should be treated (Fraser et al., 2010: 653).

Pueperial infection/sepsis is common, therefore; advanced midwives should adhere to aseptic techniques when managing women during the postpartum period (Momoh, Ezugworie and Ezeigwe, 2010: Online). Postpartum infection can be any infection of the genital canal occurring within twenty eight days after childbirth, induced abortion and is regarded as a major source of maternal morbidity and mortality in the world (Green & Wilkinson, 2004: 494).

So, any sign of pyrexia should be followed and appropriate treatment be started immediately. Low blood pressure may indicate severe haemorrhage and in this case, an advanced midwife should manage severe blood loss by inserting an intravenous infusion/ drip of Ringers-Lactate as suggested by the SANC Regulation No 2488 of 1990, as amended. The food-end of the bed should also be elevated in trying to promote blood circulation to the brain.

Postpartum haemorrhage is one of the leading cause of maternal mortality (WHO: The Millenium Development Goals Report, Causes of Maternal Deaths, 2010:

Online).The major causes of PPH is linked with caesarean section (Lowdermilk & Perry, 2006: 445) This imply that care should continue until the woman's condition is stable and does not show any signs of postnatal complications. According to Cronje & Grobler (2009: 210), PPH is diagnosed when there is a loss of over 500ml at the time of vaginal birth, or more than 1000ml after a caesarean section. Therefore; it is important that the blood loss during labour be measured so as to rule out any sign of PPH (Williams, 2011; 152).

PPH occurring within twenty-four hours post birth is termed primary; and when it occurs after twenty-four hours up to six weeks post-birth, is called; secondary postpartum haemorrhage (Fraser, Cooper & Crawford, 2009: 544). The skilled attendant as might be the first health provider present when haemorrhage occurs, his/her prompt competent action will be crucial in controlling blood loss and reducing the risk of maternal morbidity or mortality.

In the case of a woman with a cardiac problem, postnatal is usually a critical period. The biggest problem is when the failing heart has to cope with the extra sudden addition of blood into the systemic circulation (De Kock & Van Der Walt, 2009**:** 518). Knowledge about the risk of a cardiac problem to the mother may ensure that referral to hospital situations; where doctors or cardiologist are able to deal with such a condition is very important (Fraser et al., 2006: 312).

Precautions like washing of hands after handling body fluids and before breastfeeding should be taken into consideration as means of preventing HIV transmission. Breastfeeding increases the risk of infection, therefore; diseases such as mastitis, cracked nipples should be prevented and treated (Van Dyk, 2008: 43).

Care to the mother, should in-cooperate neonatal care. In other words, the postnatal care should not be separated from the neonatal care as the mother and the baby are supposed to be together, especially within the context of normal birth. Allowing the mother to be with her baby will also promote bonding as well as breastfeeding if is the feeding method chosen by the mother. Rooming-in and breastfeeding on demand should be allowed as this may promote and strengthen bonding between the mother and her baby.

Health education regarding correct attachment of the baby when breastfeeding, which helps in preventing cracked nipples should form part of health education on discharge. The advanced midwife should have skills and knowledge of identifying psychological problems like postpartum blues, postnatal depression and pueperial psychosis as many a times women may be discharged without being noticed and treated (Henderson & Macdonald, 2004: 730). Nevertheless, pueperium period has its complications which will need intervention of drugs.

3.8.1 DRUGS THAT ADVANCED MIDWIVES MAY ADMINISTER OR PRESCRIBE DURING THE PUEPERIUM PERIOD

Postpartum haemorrhage is one of the most common causes increasing maternal mortality rate (S.A. National Department of Health: Saving Mothers, 2005-2007: 5). However, advanced midwives should be in a position of managing this condition by administering oxytocin 10 units intramuscularly or intravenously as stipulated by the SANC. Regulation No.R.2488. 26 October 1990, as amended. Oxytocin, intravenously, 20 units in 1000ml Ringers-Lactate can also be infused rapidly (SA. National Department of Health: Essential Drugs Programme, 2008: 109). The SANC Regulation No R 2488.26 October 1990, as amended), further states that the dose can be repeated.

Anti-D immunoglobulin, 100mcg can be given intramuscularly, to Rh negative mothers if the baby's father is Rh positive during the third trimester, i.e, at 28-32 weeks of pregnancy. After the birth of the baby, within 72 hours; Anti-D globulin 300ug should be given to the mother to prevent formulation of antibody formulation (Cronje & Grobler, 2009; 142).

3.9 THE NEONATAL PERIOD

The neonatal period includes the time from the birth of the baby up-to day 28 of life (Davidson et al., 2008: 793; Harrison, 2002: 1). During this time, the advanced

midwife should assist the neonate to adjust to the extra-uterine environment (International Confederation of Midwives, 2010; Online). The mother should be assisted with the basic care of the neonate (Lowdermilk & Perry, 2006: 532). This should be managed by adhering to the principles suggested by the Guideline for Maternity Care in South Africa (2007: 57-58; Pillitteri, 2002: 719). These principles include the initial care, physical assessment, daily care, observations on discharge and six weeks follow-up.

3.9.1 INITIAL CARE

Immediately after birth the apgar score should be counted or assigned at 1 and 5 minutes as this will form a baseline of care to be provided. For instant, in the case of low apgar score, the neonate should be resuscitated by maintaining a clear airway [suction secretions], spontaneous breathing [40 breaths per minute] and evidence of circulation [pink skin colour] (Fraser et al., 2010: 745).

Cutting of the cord should be done immediately and be clamped to ensure that there is no bleeding occurring. Eyes and face should be cleaned with normal saline to remove excessive mucus or blood so as to prevent entrance of infection including transmission of HIV (Williams, 2011: 169, SANC. Regulation No R 2488 of 1990, as amended).

As the newborn is from the warm intrauterine environment, skilled attendants should maintain this by wiping and keeping the baby warm and dry. Skin-to-skin should be employed as is the cheapest and readily available to keep the neonate warm and at the same time; promoting bonding between the mother and her baby (International Confederation of Midwives: Essential Competencies for Basic Midwifery Practice, 2010: Online).

Identification of the neonate is very important at this stage as a means of avoiding mixing of babies especially in busy maternity areas. Plastic bracelet with permanent locks that requires cutting to be removed are ideal (Pillitteri, 2002:530).

3.9.2 PHYSICAL ASSESSMENT

Thorough physical examination, starting from head to toe, should be performed before discharge in order to exclude any deviation from normality (Harrison, 2002: 12). The length and head circumference should always be measured in order to exclude abnormalities with growth hormones as well as the imbalance between the production and absorption of the cerebro-spinal-fluid resulting to enlargement of the brain ventricles [hydrocephalus] (Lowdermilk & Perry, 2006: 914).

The head should be inspected for size and shape; which if normal; should be round and symmetrical (De Kock & Van Der Walt, 2004: 29-14). Swelling on the fetal head, may be due to caput succedaneum and cephalohaematoma which are common even in normal babies. Parents of such babies, should be reassured that the swellings usually dissolve within few weeks after birth (Hart, 2007: Online).

Fontanels should be checked for its shape and size, and whether they are not bulging or sunken. If they are bulging, it may indicate brain irritation that may cause convulsions. Alternatively, sunken fontannelles may designate dehydration which can be managed by fluids replacement (Fraser et al., 2006: 723; Harrison, 2002: 18).

The face of the neonate should be inspected for the shape and signs of bruises that could have been caused by pressure experienced during the birth process (Fraser et al., 2010: 764). This pressure may also be the cause of nerve damage and paralysis of the face (Davidson et al., 2008:835). Therefore complications should be monitored and the skilled attendant reassured the mother that they will dissolve soon; and does not need any treatment.

Swelling and scars on the face is usually common especially in breech presentation or where forceps or caesarean births were used (Pillitteri, 2002: 643). The position of the eyes and ears should be checked whether they are situated normally in order to rule out signs that may indicate congenital abnormalities such as mongolism (Harrison, 2002: 19).

The mouth should be inspected for the presence of cleft palate or cleft lip which may disturb the feeding partten of the neonate. Neonates can also be born with primary or natal teeth (Fraser et al., 2009: 770). Natal teeth do not have roots and therefore advanced midwives should refer such babies for removal because they may fall out and be aspirated (De Kock & Van Der Walt, 2004: 29-16).The size of the tongue should be checked to exclude mongolism if too big and may disturb with the feeding of the neonate.

The neonate is an obligatory nose breather; therefore patency of the nostrils should be evaluated by counting respirations over a full minute because breathing in neonates is irregular; normal rate is 40-60 breaths per minute (Harrison. 2002: 19). The chest wall should be examined for symmetry and lung sounds should be equal throughout. This should always be done in order to exclude signs of respiratory distress such as grunting, nasal flaring and retraction (Mckee-Garrett, Weisman, Duryea & Kim, 2011: Online).

The neck should be evaluated for cystic hygromas or branchial arch remnents and torticollis that could be caused by a sternocleidomastoid heamatoma from birth traumas (Evaluation and Care of the Normal Neonate, 2005: Online). Through the assessment of the neck, its conditions such as webbing or shortness; may indicate chromosomal abnormalities which if present, parents should be counseled and refer to genetic counsellors for further management (Pillitteri, 2002: 629).

The thorax or chest should also be inspected for the shape and breathing pattern to exclude abnormalities such as deep sternal retraction and any asymmetry in the neonate's body (De Kock & Van Der Walt, 2004: 29-16). The umbilicus should be examined for any signs of infection such as offensive smell, redness and swelling around the cord stump. The mother should be demonstrated on how to care for the umbilical cord using the mentholated spirit (Harrison, 2002: 226).

Congenital abnormalities such as spina bifida or exomphalo, should be referred to pediatricians for medical treatment. Nevertheless, before transferring such babies to medical intervention, immediate measures like covering the openings with sterile

gauze soaked in a warm normal saline for preventing infection should be taken (Fraser et al., 2009: 884).

Evaluate of whether urine and meconium have been passed in 24 hours is important, as delay in voiding; especially in boys , may result from a tight foreskin while in meconium may be due to imperforated anus (Mckee-Garrett, Weisman, Duryea & Kim, 2011: Online).

Both the upper and lower extremities should be inspected for any abnormalities such as extra digits, webbed fingers and toes including dislocation of hips that usually occurs in breech positions. Infants with such abnormalities should be transfer from the clinic to the hospital for the doctor's opinion (Davidson et al., 2008: 857, Pillitteri, 2002: 577). Parents of such infants, should be reassured and given more information so that they could be able to make informed decisions regarding any treatment to be made.

In boys, the penis should be examined for hypospadias, the presence of the testes in the scrotum as if undescended, can be the cause of infertility. The scrotal swelling; hydrocele should also be monitored and the mother be reassured (Matthews, 2009: Online).

In terms of girls, the labia are prominent and there may be discharges (menstruation). Engorged breast can be present due to maternal hormones and in such cases the mother must be reassured that this will stop (Davidson, 2008: 841).

Neonates born with ambiguous genitals (intersex) should be referred to an endocrinologist for evaluation and discussion with the family about the benefits and risks of immediate/against delayed gender assignment (Fraser et al., 2009: 897).

The normal neonate's skin colour is pink; therefore, advanced midwives should teach the mother how to monitor the skin colour in order to exclude neonatal jaundice (Harrison, 2002: 98). In the case of untreated jaundice, hyperbilirubinemia can result into chronic bilirubin encephalopathy (kernicterus) presenting with fever

and increased lethargy (National Collaborating Centre for Women's and Children's Health, 2010: Online).

3.9.3 FEEDING

Harrison, (2002: 29) is of the opinion that breast-feeding poses difficulty for many mothers and therefore; caregivers spent a lot of time explaining or treating various problems such as inadequate sucking reflex, persistent vomiting or; engorged or cracked nipples.

Feeding should be started immediately after birth especially in neonates born from diabetic mothers to prevent neonatal hypoglycaemia (Cronje & Grobler, 2009: 530). Through breastfeeding, bonding between the mother and her infant may be encouraged. The mother should be supported with regard to the feeding method she opted, but be strongly discouraged from mixed feeding her baby as it may increase the risk of childhood infections (S.A. National Department of Health. Clinical Guidelines: PMTCT, 2010: 24).

3.9.4 DAILY CARE

Each day, the newborn should be examined by a skilled attendant to ensure that the baby is comfortable and is feeding well. Parents during this time should be empowered with all the necessary information with regard to attachment process, cleansing and bathing of the baby, care of the umbilical cord including the correct attachment and latching during breastfeeding as this will ensure that the infant is sucking well (Fraser et al., 2010: 766).

Furthermore, the advanced midwives should be aware and able to prevent signs of airway obstruction, prevention of infection and hypothermia to ensure the wellbeing of the baby (Fraser et al., 2010: 767).

The baby ‘skin should be kept clean, and be observed for any signs of bilirubin/jaundice occurring within 24 hours of life. The mother should be shown and adviced to clean the umbilical cord three times a day and three hourly if moist (Harrison, 2002: 33).

3.9.5 OBSERVATION ON DISCHARGE

On discharge of a baby from the clinic or hospital, an advanced midwife should educate parents about danger signs in the newborn and when to bring the infant for follow-up care (ICM: Global Standards for Midwifery Education, 2010: Online). Conditions such as lethargic, jaundiced, dehydration, diarrhea and vomiting, constipation, high temperature and crying continuously are danger signs that communicate to health providers for help. Mothers should be advised to report back to the health facility immediately for preventing such complications (Harrison, 2002: 98).

Sick infants should be nursed in a hospital situation where there are facilities and doctors to care for them. Therefore, should be informed that they must take ill babies to the hospital. Nevertheless, advanced midwives should be able to nurse ill infant and be able to insert a nasogastric tube for feeding purposes and insertion of an intravenous infusion for maintaining fluid balances and the administration of intravenous medication (WHO, 2003: Online; De Kock & Van Der Walt, 2004: 29-27).

3.9.5 SIX WEEKS FOLLOW-UP

Well babies should be examined at least once after discharge. This should be done for routine weighing, milestone assessment and immunizations. The “Road to Health Card” should be used to document all the immunization given to neonates up to the age of five.

Nevertheless, this card should not be regarded as a passport to health, but rather an instrument to be used by doctors and nurses to monitor the development of a child (S.A. National Department of Health: Road-to-Health-Card, 2005: Online).

Immunization with BCG and Polio drops should be given immediately after birth as a means to protect the neonate against any infection.

To ensure the best possible care to the neonate, an advanced midwife should be well equipped with knowledge of prescribing drugs and treating all neonates presenting with problems and also prophylactic treatment to ensure a healthy neonate.

3.9.6 DRUGS THAT ADVANCED MIDWIVES MAY ADMINISTER OR PRESCRIBE TO NEONATE.

After the birth of the baby, the advanced midwife should administer Konakion 1 ml to prevent any bleeding that may occur to the neonate (De Kock & Van Der Walt, 2004: 29-21). During the birth process, contamination to the baby's eyes is common; therefore, chloramphenicol drops or ointment as prophylaxis treatment should be used (Davidson et al., 2008: 870).

Nevirapine syrup should be given to newborn infants as soon as possible after birth as a single dose for PMTCT of HIV (S.A. NDoh: Guidelines for Maternity Care, 2007: 137).

Advanced midwives should be conversant with the Extended Programme on Immunization, which according to Baker, (2010: Online) is as follows:
Birth, TOPV (o) BCG.
6 weeks, TOPV (1) DTaP-IPV (1) HBV (1) PCV (1) RV (1).
10 weeks, DTaP-IPV/HIB(2) HBV(2)
14 weeks, DTaP-IPV/HIB (3) HBV (3) PCV(2) RV(2)
6 months, Vitamin A 100 000u
9 months, Measles (1) PCV(3)
12 months, Vitamin A 200 000u (6monthly)
18 months DTaP-IPV/HIB(4) (measles (2)
2-12 years, Tetanus, diphtheria and inactivated Polio Vaccine (booster every 10 years thereafter), Measles, Mumps, Rubella Vaccine.

Pregnancy, labour and pueprium are normal phenomenon although at other times there can be complications associated with them. Consequently, advanced midwives should be well equipped with knowledge and skills of ensuring that the woman is managed well and she he is able to prevent, identify and treat complications independently.

3.10 RELATIONSHIPS WITH COLLEAGUES

The state of workplace relationship is of essential importance to organizational success and the wellbeing of people at work (New Zealand Department of labour: Partnership Resources Centre, [n.d]: Online). Relationship between colleagues is essential for maintaining a productive and pleasant working environment, especially where people's health is concerned like in maternity settings (Mayhew, 2011: Online). Therefore, good relationship in the workplace should be maintained by adhering to principles of integrity and mutual respect among colleagues.

Advanced midwives as professional practitioners should strive to attain good working relationships and systems of communication that will enhance quality service to clients at all times (The Royal College of Surgions of England: Working with Colleagues, 2010: Online). All communications between colleagues about clients should be on a professional basis which is purposeful, respectful and consistent with the management of confidences as declared to clients

The relationship among colleagues should be conducive as it will help to develop and support each other by learning new skills, and by building confidence needed in independent practitioners. To ensure the sustainability of the relationship, it must be conducted in a spirit of mutual respect. This will also benefit the client because will receive the best possible care governed by a multidisciplinary health team (Answers. Co.: Why is it important to help develop and support your colleagues, 2010; Online).

In a situation where there poor relationships between colleagues, the workplace can be distracting and cause a great deal of anxiety resulting to poor work production such as communication breakdowns leading to missed opportunities to clients (Ekot, 2010: Online). There could also be low morale and high rates of staff turnover with the results of clients not being attended by experts in midwifery.

Competency as combination of knowledge and skills or abilities required for performing successfully in a job should be maintained to ensure quality care (Steele & Kirkpatrick, [n.d], Online). Supported colleagues try by all means to strengthen their confidence and competence in midwifery practices especially in areas where they are working independently. By being supported, advanced midwives may develop passion for the work they are doing which is of beneficiary to health consumers.

Workplace relationships depend on aspects such as emotional support and cooperation with colleagues and situation of the work environment where they need to provide quality care (Dutton, 2006: Online). Working in harmony is very important for the benefit of health consumers as the care will be evaluated for quality assurance. This may be maintained through open and constructive needed for quality care.

3.10.1 TRUST AND HONESTY:

Promoting trust and honesty is essential in building a strong and healthy relationship among colleagues (Gibson, 2011: Online). Such relationship is important to health consumers as they might be treated by a group of health providers; sharing ideas on the possible best care.

To ensure that women receive quality care, the relationship inside the workplace should be built on courage and integrity. Through courage and integrity, both advanced midwives and colleagues will be able to practice in accordance with current midwifery practices (Dutton, 2006: Online).

3.10.2 JUSTICE AND FAIR GUIDANCE

Advanced midwives and colleagues should treat each other with love and kindness as this will help to increase the willingness of working together for the benefit of health consumers (Kerns, 2011: Online). This is suggested because contribution of other health providers, especially in midwifery practices may enhance and encouraged working in midwifery.

3.10.3 MUTUAL RESPECT

Mutual respect is the best building blocks for relationship among colleagues in the workplace (Elements of Effective Workplace Relationships, 2011: Online). Therefore, skilled attendants should respect each other and work well as a collaborative team. As a result, appropriate and correct care might be provided where it is needed (Fraser et al., 2006: 5).

3.11 CONCLUSION.

In this chapter a review of literature regarding description of the practice of advanced midwives was discussed. Theories explaining the role of advanced midwives as independent practitioners, conditions of workplace in which they are to be deployed or placed and utilized were also outlined to ensure safe motherhood and safe environment that will benefit clients in their care. In the next chapter the methodology will be discussed.

CHAPTER 4

RESEARCH METHODOLOGY

4.1 INTRODUCTION

The literature review with regard to the practice of advanced midwives was discussed in the previous chapter. This chapter will provide an overview of the research design, technique used for data collection as well as the process of analysis. The validity and the reliability, the ethical issues, the value of the study and the problems encountered during data collection will also be discussed**.**

4.2 RESEARCH DESIGN

A research design is defined as the overall plan or blueprint used for answering the research questions or testing the research hypotheses (Mouton, 2008: 55). The research design, guide the researcher on how to implement the study in a way that achieves the intended goal (Polit & Beck, 2006: 55) and maximises control over factors that could interfere with the validity of the findings (Burns & Grove, 2009: 236).

A non-experimental descriptive design was used as it was effective in generating information that has never been researched (Burns & Grove, 2009: 238). The practice of advanced midwives who trained at the UFS has never been research since its inception in 1995 (South African.UFS: School of Nursing, 2005: Online).

4.3 THE RESEARCH TECHNIQUE

The research technique used was a questionnaire. The focus group interview was discussed in chapter 2, and was done to enhance the validity of the questionnaire. A questionnaire is a printed self-report form designed to elicit information that can be obtained through written responses of the subject (Burns & Grove, 2009: 717).

4.3.1 ADVANTAGES OF USING A QUESTIONNAIRE

The questionnaire was chosen because it was cost effective in terms of time as it was conducted by a single researcher and could be distributed to all respondents within a short space of time (Neuman, 2007: 186).
With a questionnaire all questions are presented to the participants in exactly the same manner, thus enhancing the reliability of the data-gathering process.

4.3.2 DISADVANTAGES OF USING A QUESTIONNAIRE

One of the disadvantages of using a questionnaire is the possible low response rate (Neuman 2007: 187). To enhance a higher response rate, returned-stamped envelopes can be included with the questionnaire and follow-up reminders can be sent to participants (Babbie, 2004: 260).

In this study the return rate was very slow although the researcher included returned-stamped envelopes with each questionnaire. Follow-up questionnaires and reminders were sent twice to the respondents as a means of trying to improve the response rate.

Another disadvantage of using questionnaires as data gathering instrument is that if it is too long, fewer participants will be willing to respond and they usually then leave questions blank or incomplete (Burns & Grove, 2009:406) In this study, the questionnaire was to be completed within 30 minutes as proved in the pilot study.

Questions can also be misunderstood; therefore a pilot study was conducted to identify whether questions were clearly defined and not ambiguous (Burns & Grove, 2009:409). Delay of mailed questionnaire is another disadvantage of using questionnaires. The delay of mailed questionnaires in this study could have been due to a number of reasons given in the literature such as misplacement by recipients, discarded as junk mail or completed but never mailed back to the researcher (Yegidis & Weinbach (2002: 17). In this study respondents were reminded twice as to try and improve the response rate.

4.3.3 DEVELOPMENT OF THE QUESTIONNAIRE

The questionnaire was based on an already tested one compiled by Roets (1996) as that questionnaire aimed at describing the practice of advanced midwives. Secondly a literature analysis was done to complement and modify the existing questionnaire and thirdly a focused group interview was conducted in order to gain information with regard to the advanced midwives relationship with colleagues (see chapter 2). All these data were used to compile the questionnaire for actual data gathering.

The questionnaire was available in English and Afrikaans, which were the languages used during training. Simple and clear language was used during the formulation of the questionnaire to make it possible for respondents to answer all questions. Open-ended and closed-ended questions were asked in order to collect a variety of information needed (Babbie, 2004:245).

The questionnaire (see annexure D) was structured as follows:
Section A: Biographical information.
Section B: Information regarding utilization and placement of advanced midwives.
Section C: Information regarding the theoretical knowledge.
Section D: Clinical skills during antenatal period.
Section E: Clinical skills during intrapartum period.
Section F: Clinical skills during post natal.
Section G: Neonatology.

Section H: Advanced midwifery actions/ practice.
Section I: Drugs.
Section J: Research.
Section K: Administration.
Section L: Autonomous/independent practice
Section M: Relationship with colleagues (compiled from focus group data).
The questionnaire was accompanied by a covering letter, explaining the purpose and aim of the study as well as the approximate amount of time required to complete the questionnaire. The contact number as well as name of the researcher was also included in the covering letter.

Instructions regarding the returning back process of the completed questionnaire (see annexure) were enclosed in the questionnaire. For instant, enclosed envelopes were addressed to the researcher to make it easy; as respondents would just insert and mail back to the researcher.

An informed consent form, which the participants had to complete if they decided to participate, was also included.

4.3.4 POPULATION AND SAMPLING

Population is defined as all elements that meet the inclusion criteria for a certain domain (Burns & Grove, 2009: 42). The population included all practicing advanced midwives that trained and obtained a qualification in Advanced Midwifery and Neonatology at the UFS between 1995 and 2007.

Due to the limited number of advanced midwives, no sampling was used, and all advanced midwives trained at the UFS between 1995 and 2007 were requested to take part in the study. Hundred and seventy eight (178) questionnaires were distributed, but only seventy were completed and returned. ONE (1) of the questionnaire did not meet the criteria for participating as the respondent was not practicing and therefore, the completed questionnaire was not considered during data analysis. In total sixty-nine (69) questionnaires were used for data analysis.

Seabag (1988:254) and Grinnell and Williams (1990:127) as cited in De Vos, Strydom, Fouche & Delport 92005:195-196) suggest that a 10% sample is sufficient for controlling for sampling errors. The researcher followed Stroker (1985) cited in De Vos et al. (2005: 195-196) when stating that for 200 population, with a number of 64 respondents 32% is enough to elicit the required date.

4.4 PILOT STUDY

A pilot study is a smaller version of a proposed study providing a trial run before embarking on the actual study (Burns & Grove, 2005: 42 and Uys & Basson, 2000: 103). The purpose of the pilot study was to help the researcher to identify unforeseen problems with the questionnaire which could be rectified before commencing with the actual study (Polit, Beck & Hunger, 2001: 41).

Two advanced midwives who trained at the UFS participated in the pilot study. They were conveniently selected because they were available (Polit & Beck 2006: 262), as they were working at the School of Nursing as lecturers. They were involved in the clinical areas where advanced midwives were practicing and therefore they could be aware of conditions under which other respondents were practicing and they were accessible to the researcher.

The pilot study was used to examine reliability, validity and usability of the questionnaire before it could be distributed to respondents (Burns & Grove, 2009: 333). The pilot study members were asked to judge the questionnaire for ambiguity, clarity and the time required to complete the questionnaire. They were also asked to identify intervening variables that could be eliminated. They also indicated the time that it took so that respondents could be informed in the covering letter of the questionnaire. It took them ± thirty (30) minutes to complete the questionnaire.

The questionnaires were sent back to the pilot study members for the second time after corrections were done and no further changes were made and therefore the researcher was convinced about the feasibility of the questionnaire and the data

obtained. The information obtained from the pilot study was not included in the actual study (Burns & Grove 2009: 44).

4.5 VALIDITY

Validity refers to the degree to which an instrument measures what it is supposed to be measuring (Babbie, 2004:143, Yegidis & Weinbach, 2002: 206, and Uys & Basson, 2000: 80). In this study, both face validity and content validity of the questionnaire was assessed.

Face validity verifies basically that the instrument “looks” like or gives the appearance of measuring the content (Polit, Beck & Hungler, and 2001:309). Consensus with regard to the validity of the measurement of the questionnaire was approved by the evaluation committee of the School of Nursing.

Content validity refers to whether the questionnaire and items it contains is representative of the content domain the researcher intends to measure (De Vos, et al. 2005:161). Content validity is concerned with adequacy of coverage of the content area being measured (Polit & Beck, 2006: 328). In this study, content validity of the questionnaire was assured using an already tested questionnaire as base and expanding it by structuring questions from the recent literature, as well as information obtained through a focused group interview.

The questionnaire was also submitted to six expert committee members of the SoN for evaluation, one of them being an expert in the field of midwifery. Experts were asked to evaluate the adequacy of the content as well as the relevance of questions and to make suggestions thereof. A pilot study of the questionnaire was also performed to ensure validity.

The sequence of items in the instrument were also evaluated and approved by the expert committee as well as evaluation committee of the School of Nursing at the UFS.

4.6 RELIABILITY

Reliability refers to the degree of consistency with which an instrument measusres the attribute it is desisgned to measusre (Uys & Basson, 2000:75). There are three aspects of reliability of interest to quantitative researchers namely; stability, internal consistency and equivalence. Furthermore, it is suggested that reliability is ensured when the same scores are obtained from the same people on separate occasions (Polit & Beck 2006: 324).

In this study, the stability of a measure was maintained by using the two respondents that took part in the pilot study to complete the same questionnaire for the second time two weeks after the first one. The responses to both questionnaires were nearly the same and therefore, it was accepted that reliability was proven.

Internal consistency was maintained by using the same questionnaire for all respondents. The linguistic was approached to evaluate the questionnaire that was translated from English to Afrikaans and visa-versa, to ensure that the meaning was the same to avoid ambiguity and to ensure reliability.

4.7 DATA COLLECTION

After approval of the study by the Ethics Committee of the Faculty of Health Sciences, as well as the Head of the School of Nursing at the UFS, the questionnaires were posted to all advanced midwives trained at the UFS between 1995 and 2007. Their names and addresses were obtained from the data base of the School of Nursing, UFS.

In order to ensure that ethical issues were maintained, consent forms were included in the questionnaire so that respondents can make an informed decision about participating in the research study. The consent forms were returned back together with the questionnaire (Burns & Grove, 2009: 568).

Strategies to increase the response rate such as enclosing a stamped, addressed envelope and making follow-up mails were implemented. In this study, respondents were requested (as stated in the covering letter) to complete the questionnaire within two weeks and post it back using the enclosed stamped envelope.

Although questionnaires were mailed to all advanced midwives who obtained their qualification at the UFS, the criteria for taking part were that the respondent should be currently practicing. The reason was to get the correct information regarding the practice of advanced midwives from those who are in practice.

The researcher mailed hundred and seventy eight (178) questionnaires of which only seventy (39.33%) were received back after two reminders and were regarded as enough to prove representative for the study as a response rate of 10% is generally acceptable (De Vos et al., 2005: 195).

The data analysis was done from sixty-nine questionnaires, due to the fact that one respondent was not practicing any more.

4.8 ETHICAL ISSUES

In nursing and midwifery, ethical research is essential in generating sound evidence-based practice (Burns & Grove, 2009: 184). Nursing research should not only generate or refine knowledge, but develop and implement ethically acceptable research (Uys & Basson, 2000: 96). Ethics was considered because it helped to define what was or are not legitimate to do or what “moral” research procedure involves (Neuman, 2007: 48). The following ethical issues were adhered to:

4.8.1 OBTAINING PERMISSION

In order to ensure that ethical issues were maintained, the Head of the School of Nursing, the expert committee of the School of Nursing and the Ethics Committee of the Faculty of Health Sciences of the UFS approved the study (protocol) before the

research process was commenced. Written permission including the ethics research number was issued to the researcher before embarking on the study.

Consent forms were signed by respondents as an agreement to continue with the study. The researcher considered the protection of the human rights of respondents, as a result, anonymity and confidentiality was maintained (Burns & Grove, 2005: 188).

4.8.2 RESPECTING HUMAN RIGHTS

The human rights of the participants were respected by ensuring that principles of right to self-determination, privacy, confidentiality and anonimity is maintained.

4.8.2.1 RIGHT TO SELF DETERMINATION

The right of self determination is based on the ethical principle of respect for persons participating in a research study (Burns & Grove, 2009: 189). Respondents were informed through a written letter about the study, the purpose of the study and its possible value. They were also informed that participation is voluntary and can be terminated at any time without any penalty. A guarantee of anonymity and confidentiality was ensured as no names were attached to questionnaires (Mouton, 2008: 244).

The researcher indicated in the covering letter that there will be no penalty imposed on them, should they choose to withdraw from taking part in the study (Mouton, 2008: 244).

A fundamental principle of social research is that participation must be voluntary (Neuman, 2007: 54). Therefore, respondents were allowed to sign an informed consent regarding participation. A short description of the purpose and procedure of completing the questionnaire was fully explained in the covering letter to ensure that respondents understand fully before taking part in the study.

Violation of the respondent's right to self-determination was avoided as there was no coercion, covert data collection or deception practiced. Coercion involves explicit excessive rewards from agreeing to participate (Polit et al., 2001: 78). In the letter accompanying the questionnaire, it was clearly stated that there is no rewards for participating in this study and as a result, participation was voluntary.

Respondents were also informed that although the study may not benefit them directly, it will be published. The information may help by providing information that may perhaps lead to improvement in competency, placement and utilization of advanced midwives.

Respondents were all healthy and currently practicing and as results no advantage was taken of their health status that would force them to take part in the research project (Burns & Grove, 2009: 190).

4.8.2.2 MAINTAINING PRIVACY

The right to privacy refers to the extent and general circumstances under which personal information will be shared with or withheld from others (Burns & Grove, 2005: 186). Therefore, the right to privacy was maintained as data collected was kept in strict confidence and the questionnaire was filed and placed in a secrete place known by the researcher only. To ensure that privacy was maintained, questionnaires were coded as number 1-70. No respondent's names were attached to them; only the researcher and the biostatical person had access to the collected data (Polit et al., 2001: 82).

With regard to focused group discussion, respondents' names were not used during transcription. Participants were referred to as "participant 1" or "participant 2".The transcribed interview was only read by the researcher and the co-coordinator.

4.8.2.3 MAINTAINING ANONYMITY AND CONFIDENTIALITY

The ethical principle of anonymity and confidentiality exist to safeguard participants from the harm that can come to them if they are intentionally or inadvertently associated with any data that is collected (Yegidis & Weinbach, 2002: 40).

Anonymity refers to the act of keeping individuals nameless in relation to their participation in research (Brink, 2008: 198). A guarantee of anonymity and confidentiality was ensured as no names were attached to questionnaires (Mouton, 2008: 244). Respondents were just asked to fill in the questionnaire. The study data was coded so that it could not be associated or linked to participants.

All study data was mailed direct to the researcher and kept in a safe place to which only the researcher had access. The information obtained through the questionnaires and the transcript of the focus group interview was also read by the researcher and the study leader only.

The right to confidentiality refers to the searcher's responsibility to protect all data collected within the scope of the project from being made available to any other persons (Mouton, 2008: 244 and Uys & Basson, 2000:98). Respondents were reassured that all data collected will be treated with confidentiality. In order to abide with this promise, all received data was kept in a safe place to which only the researcher had access (Burns & Grove, 2005: 188).

4.9 DATA ANALYSIS

Descriptive statistics, namely frequencies and percentages for categorical data and means, and statistical variations or medians and percentiles for continuous data were calculated. The analysis was done by the Department of Biostatistics of the UFS.

4.10 CONCLUSION

In this chapter, the research methodology was discussed wherein instruments used for collecting data was fully explained. The validity as well as the reliability of the questionnaire was maintained to ensure that the questionnaire is user-friendly. The aspects of ethical issues were also considered. Data analysis and interpretation of data collected will be discussed in chapter 5.

CHAPTER 5

DATA ANALYSIS AND INTERPRETATION

5.1 INTRODUCTION

The research methodology was discussed in chapter 4. In this chapter, data analysis and the interpretation thereof will be discussed. Data analysis is a systematic synthesis of research that allows and breaks up data collected, into manageable themes that provide answers to questions initially generated by the research activities (Mouton, 2008: 108).

Out of seventy (70) respondents, sixty nine (69) met the criteria for taking part in the research. Thirteen (13) of them reported to be correctly placed and utilized and therefore forms Group A. Fifty six (56) reported not to be correctly placed and utilized, forming Group B. In the discussion that follows, the researcher will refer to these groups as, Group A and group B.

The data will be analyzed and interpreted according to the sequence of the questionnaire and will have the following order:
Biographic information
Information regarding utilization and placement of the advanced midwife
Information regarding theoretical knowledge of the advanced midwife
Clinical skills in the antenatal period.
Clinical skills in the intrapartum period.
Clinical skills in the post partum period.
Neonatal skills.
Expected clinical skills of the advanced midwife.
Drugs.
Research.

Administration.

Autonomous/independent practice of the advanced midwife.

Information regarding relationships with colleagues.

5.2 BIOGRAPHICAL INFORMATION

5.2.1 AGE N= 69

From the 13 respondents who were placed and utilized correctly, the median age was 49 years, while in the group of 56 of those not correctly placed and utilized; the median age was 45 years. Figure 5.1 indicates the ages of respondents

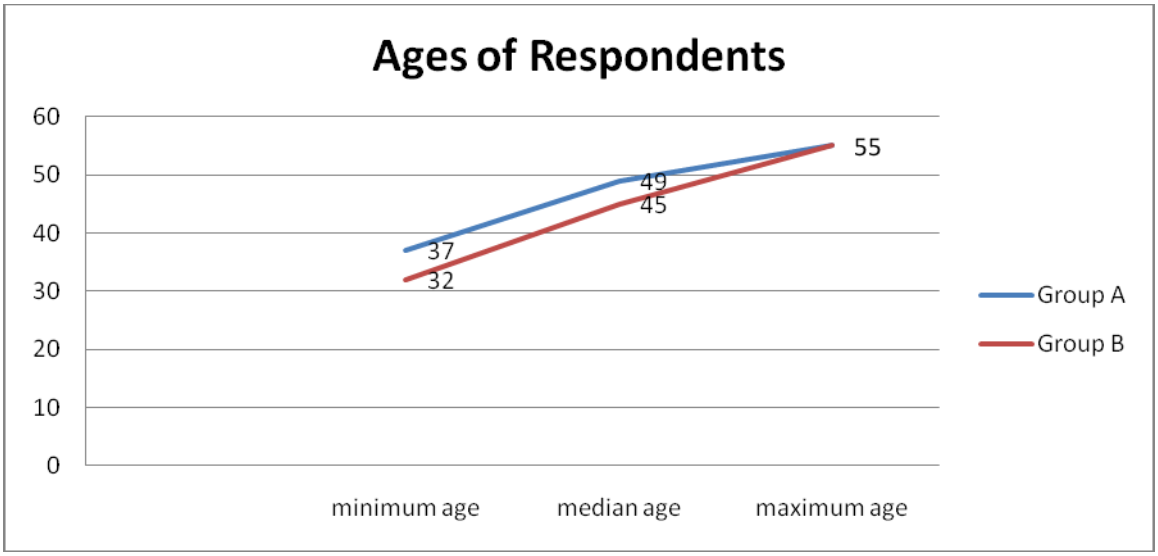

FIGURE 5.1: AGE DISTRIBUTION OF RESPONDENTS (N=69)

Correctly placed and utilized respondents are statistically significant older than those not correctly placed and utilized. Group A might claim to be correctly placed and utilized due to their age that qualifies them to be regarded as more experienced. Clinical experience results in practical wisdom which is an integral aspect of the persona of effective clinical leaders. Therefore the ability to deal effectively with all levels of management is through education and experience which goes hand-in-hand with the age of an individual (Leathered & Cook. 2009: Online).

Group B, which was younger in age, might not have had the experience or the challenges the independent practitioners are faced with in their daily practice. The lack of experience might cause frustration because of being placed and utilized anywhere in the health system irrespective of the qualification that they might have.

5.2.2 GENDER N= 69

In Group A, three of the respondents were males and ten were females. In Group B, one was a male and the rest, 55 were females.

TABLE 5.1 GENDER OF PARTICIPANTS N= 69

Gender	Group A : n=13		Group B: n=56	
	Frequency Group A	%	Frequency Group B	%
Males	3	23,08	1	1.79
Females	10	76.92	55	98.21
Total	13	100.00	56	100.00

Table 5.1 indicates that most of the respondents were females, 10 in group A and 55 in Group B. Most of the midwifery care givers were predominantly females. This is also supported by Fraser et al., (2009: 3) who asserted that throughout the ages, women have depended upon another woman, to be with them during childbirth.

5.2.3 MARITAL STATUS N= 69

The marital status of both groups is reflected in Table 5.2.

TABLE 5.2 MARITAL STATUS N=69

Marital Status	n=13		n=56	
	Frequency Group A	Percentage	Frequency Group B	Percentage
1. Single	0	0.00	15	26.79
2. Married	10	76.92	32	57.14
3. Divorced	2	15.38	5	8.93
4. Separated	1	7.69	3	5.36
5. Widowed	0	0.00	1	1.79

Ten respondents from group A and thirty two from group B were married. Two from group A and from group B were divorced. One from group A and three from group B were separated. From group B, only one was a widower and 15 were single.

5.2.4 TOWNS/CITIES IN WHICH RESPONDENTS WERE PLACED AND UTILIZED

The towns or cities where respondents were placed and utilized are indicated in Table 5.3

TABLE 5.3: CITIES OR TOWNS WHERE PARTICIPANTS ARE PRACTICING N= 69

Towns/Cities	n=13		n=56	
	Frequency (Group A)	%	Frequency (Group B)	%
Bethlehem	0	0.00	1	1.85
Bloemfontein	1	7.69	24	44.44
Botshabelo	8	61.54	6	11.11
De-Aar			1	1.85
Kimberley			2	3.70
Kuruman			1	1.85
Kroonstad			4	7.41

Odendaalsrus			1	1.85
Parys			1	1.85
Qwa-qwa			3	5.56
Senekal			1	1.85
Thaba-Nchu	3	23.08	3	5.56
Upington			1	1.85
Virginia	1	7.69		
Welkom			4	7.41
Winburg			1	1.85
Total	13	100	54	99.99

Most (25), of the respondents were from Bloemfontein. One from Group A and 24 from group B. At Botshabelo the majority, eight were in group A, and six were in group B. Most of the maternity units at Botshabelo were therefore staffed with advanced midwives. This could be a good practice as Botshabelo is classified as a rural area and most of the maternity clinics are being managed by midwives independently.

From Kroonstad and Welkom, there were four from group B. Thaba-Nchu and Qwa-Qwa, there were three, also from Group B. The study results indicated that the majority of advanced midwives reporting to be placed and utilized correctly were in rural areas like Botshabelo where they were practicing independently. Conger & Plager (2008: Online) also suggests that due to the scarcity of health care providers, Advanced Practice Nurses (advanced midwives) should work in rural areas.

The majority located in urban areas like Bloemfontein, Kroonstad and Welkom; where doctors are freely available, felt incorrectly placed and not fully utilized. This might be due to the fact that they are not being given an opportunity to practice what they have learned; doctors might view them as competition and threat in their profession (Hirsch & Ural, 2008: Online).

5.2.5 CLINICAL AREAS WHERE ADVANCED MIDWIVES WERE PRACTICING.

To ensure quality care in midwifery, maternity wards should be managed by experts in midwifery (Roets, 1996: 15). It is therefore important to know where advanced midwives are placed and utilized to evaluate whether they are practicing what they have trained for. Table 5.4 indicates clinical areas where respondents were placed and utilized.

TABLE: 5. 4: CLINICAL AREAS= 69

Clinical areas	n=13		n=56	
	Frequency (Group A	%	Frequency (Group B)	%
Primary Health Care	13	100	4	7.4
Community Health Care Centre	0	0.00	11	19.64
District Hospital	0	0.00	17	30.36
Regional Hospital	0	0.00	13	23.21
Tertiary Hospital	0	0.00	8	14.29
Private Hospital	0	0.00	1	1.79
Other	0	0.00	2	3.57
Total	13	100	56	100

All respondents working in primary health care centres from Group A, felt that they were placed and utilized correctly. Advanced midwives in these areas might enjoy the practice as indicated by the Dublin National Council for the Professional Development of Nursing and Midwifery, (2004: Online) because they practice autonomously.

In group B, most seventeen were placed and utilized in district hospitals, followed by thirteen, from regional hospitals and eleven from Community Health Care Centres. The minority, eight and one were from tertiary and private hospitals respectively.

The results indicate that the majority felt that they were incorrectly placed and utilized. In hospital situations, doctors are available to take charge of all midwifery challenges (Bellybelly, Australian family websites, 2002-2011: Online) and advanced midwives might not practice as they should have been when doctors are not available. Advanced midwives should therefore be deployed to areas where there are fewer doctors in order to demonstrate their capability in Midwifery (Fraser, Cooper and Crawford, 2009: 7) so that they can be utilized effectively.

5.2.6 EDUCATIONAL LEVEL OF RESPONDENTS

Education equips an individual with skills necessary to practice independently (A Glimmer of Hope Foundation, 2009: Online). The level of education of advanced midwives should therefore be known. Table 5.5 illustrates the educational level of respondents.

TABLE 5.5: EDUCATION LEVEL N=69

Educational Level	n=13		n=56	
	Frequency Group A	%	Frequency Group B	%
Diploma	10	76.92	29	51.79
Degree	3	23.08	27	48.21
Total	13	100.00	56	100.00

Ten respondents from Group A and 29 from Group B indicated that they hold a diploma qualification, while, three and twenty seven respectively were in possession of degree in Advanced Midwifery and Neonatology.

5.2.7 YEAR OF OBTAINING QUALIFICATION

Figure 5.2 indicates when respondents have acquired the qualification of Advanced Midwifery and Neonatology.

n=13 n=56

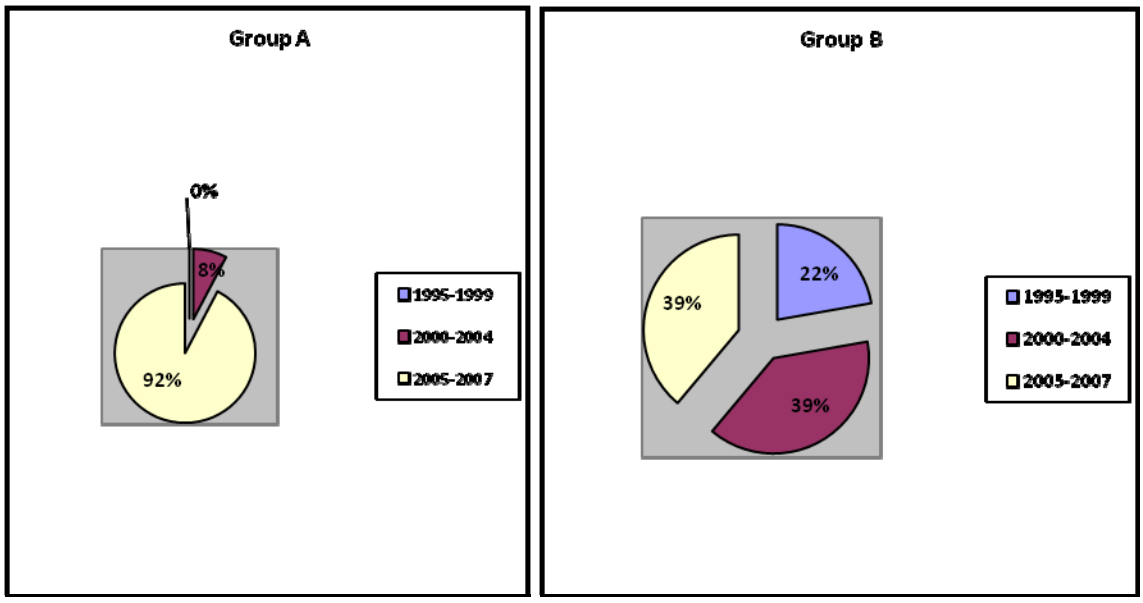

Figure 5.2.: Year of obtaining qualification N= 69

Between 1995-1999, no respondent from Group A reported to have obtained the qualifications of Advanced Midwifery and Neonatology, whilst in Group B, twelve reported to have obtained their qualification between that period. In 2000-2004 there was one from Group A and 21 from Group B reporting to have obtained the qualification. Between 2005-2007 there were 12 from Group A and 21 from Group B. Correctly placed and utilized respondents were statistical significantly less in the beginning years (1995-2004) than those claiming to be correctly placed or utilized in the time frame of 2005-2007.

5.3 UTILIZATION AND PLACEMENT

The government of South Africa initiated Primary Health Care Centres in 1994 (South African Health Education | Health System Trust, 2010: Online). To contribute to these health centres, it was necessary that they should be staffed by competent care givers. Therefore the programme of Advanced Midwifery and Neonatology was introduced at the local university. The aim of training midwives as independent

practitioners as suggested by the Committee of the University; was to place and utilize them in areas where doctors are not freely available (Fichartdt, 1996: 6).

The utilization of advanced midwives in Primary Health Care Centres (PHC) is very important as there are few or sometimes no doctors available on a daily basis and the midwives are most readily available practitioners in an emergency situation to assist the community (Fraser et al., 2010: 6).

An independent practitioners, has to diagnose, treat or refer clients to the next level of care (Fraser, Cooper & Nolte, & 2010: 08). The utilization of advanced midwives in primary health care centres might improve maternal and newborn health status as PHC are supposed to be accessible to health consumers and to function over twenty-four hours (WHO, Millennium Development Goals: Making Pregnancy Safer, 2007: Online). Health consumers should thus be able to get care from competent birth attendants (advanced midwives).

5.3.1 CORRECTLY UTILIZED

TABLE 5.6: REASONS FOR BEING CORRECTLY UTILIZED N=69

Reasons	n=13	
	Frequency: Group A	%
Informal teaching	0	0.00
Working in midwifery	12	92.31
Working in management	0	0.00
Act as a consultant		0.00
Act as a mentor	1	7.7
Total	13	100

The majority, 12 indicated that they correctly utilized because they are working in midwifery department. One gave the reason of being a mentor.

TABLE 5.7: REASONS FOR NOT BEING CORRECTLY UTILIZED N=56

Reasons	n=56 Frequency Group B	%
Not working in midwifery department	4	50.00
No support from colleagues	1	12.50
Not working as an advanced midwife	3	37.50
Total	56	100

Fifty six of respondents reported to be not correctly utilized as they are not working in midwifery department and also are not being supported by colleagues. Of great concern is the fact that the majority working in midwifery units, claimed to be incorrectly utilized. Advanced midwives should be utilized correctly so as to practice and gain confidence of what they have trained for. This might encourage and build the passion for working in midwifery and avoid the temptation of leaving the country to other placed/countries where their knowledge and skills are highly needed (SA. Nursing Update, 2010)

5.3.2 CORRECTLY PLACED

After obtaining the qualification in a field of specialization, it is important to be placed in that area of one's specialty because this will enhance skills, competency and interest. Table 5.7 shows responses with regard to being correctly placed.

TABLE 5.8: REASONS FOR BEING CORRECTLY PLACED N = 69

Reasons	n=13		n=55	
	Frequency Group A	%	Frequency Group B	%
1.Working at college	0	0.00	1	1.85
2.Teaching at hospital	0	0.00	4	7.41

3.Working in Midwifery	13	100.00	50	92.6
Total	13	100.00	55	

All respondents from Group A reported to be correctly placed because they were working in midwifery departments

TABLE 5.9 REASONS FOR NOT BEING CORRECTLY PLACED N=56

Reasons	Frequency Group B	%
Working in Primary Health Care setting and the system do not allow	56	100
Total	56	100

All respondents in Group B reported to be incorrectly placed because of working in Primary Health Care setting and that the system do not allow. For the fact the advanced midwives are specializing in midwifery, it is ideal to place them in maternity units to practice what they have been trained for; as a result, their knowledge and skills will be sharpened by being in the field of their specialty.

5.3.4 COMPETENCY

As skilled attendants, advanced midwives are expected to render quality care, and will be able to do this only if they are competent enough to practice independently. Figure 5.3 below displays the responses regarding competency.

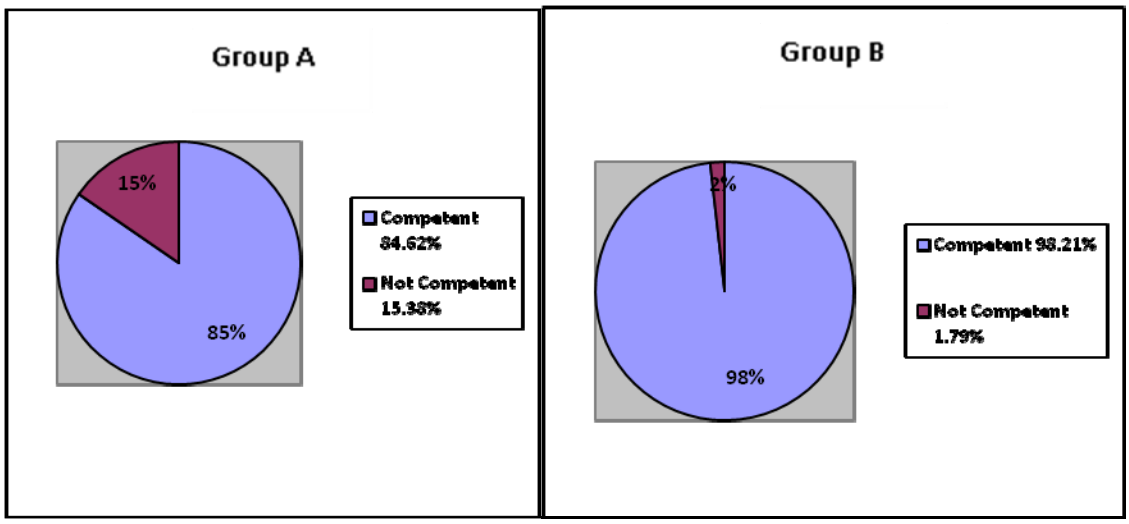

FIGURE: 5.3: COMPETENCY, GROUP A (N=13) AND COMPETENCY, GROUP B (N=56).

Eleven of the respondents who were placed and utilized correctly, reported to be competent, and two reported to be not competent. In Group B, 55 reported to be not competent and one claimed not to be competent. It is therefore demonstrated that irrespective of placement and utilization, only three respondents felt competent.

5.3.5 REASONS FOR COMPETENCY

As independent practitioners, advanced midwives should be competent enough to deal with the midwifery challenges in their daily practice. In Table 5.8, respondents indicate reasons for confirming that they are competent to practice independently**.**

TABLE 5.10: REASONS FOR BEING COMPETENT N=69

Respondents Reasons	n=11		n=55	
	Frequency Group A	%	Frequency Group B	%
1.Competent in midwifery practice	9	81.82	44	80.00
2. Act as a consultant	0	0.00	1	1.82
3. Informal teaching	0	0.00	1	1.82
4. Independent midwife	1	9.09	8	14.55
5. Working in managerial position	1	9.09	0.	0.00
6. Act as a mentor	0	0.00	1	1.82
Total	11	85	55	98

[Due to two respondents from both groups not indicated their reasons for not being competent, the respondents from both groups could not count to 13 and 56]

The majority, nine from Group A and fourty-four from Group B, claimed to be competent because they were working in midwifery areas. One and eight from both Groups respectively, stated that they are competent because they were working as an independent midwife. Practicing in areas offering midwifery also strengthens the confidence of practicing independently.

5.4 INFORMATION REGARDING TRAINING AND THEORETICAL KNOWLEDGE

5.4.1 THEORETICAL KNOWLEDGE

Advanced Midwives are expected to have theoretically knowledge as well as practical competence so that they can be able to identify risk factors early in pregnancy, refer when needed and manage normal pregnancy and labour (S.A. National Department of Health: Guidelines for Maternity Care, 2007: 8). Theoretical knowledge is needed to ensure that advanced midwives are competent. Table 5.9 indicates the advanced midwives' responses on how should their theoretical knowledge level be with regard to anatomy.

TABLE 5.11: THEORETICAL KNOWLEDGE WITH REGARD TO ANATOMY N=*69*

Responses	n=13		n=56	
	Frequency Group A	%	Frequency Group B	%
Reasonable	3	23.08	11	20.00
Good	3	23.08	12	21.82
Excellent	7	53.85	31	56.36
No knowledge	0	0.00	1	1.82
Total	13	100	56	100

Seven from Group A and thirty one from Group B of respondents reported that theoretical knowledge of anatomy should be excellent. Three from Group A and twelve from Group B felt that the theoretical knowledge of anatomy should be good Three from group A and eleven from Group B said the knowledge should be reasonable.

Knowledge of anatomy of the birth canal is the foundation for midwifery (De Kock & Van Der Walt, 2004: 5-3). It is therefore unusual for an advanced midwife to say there should be no knowledge of anatomy. Nevertheless, it is crucial for advanced midwives to be knowledgeable with regard to anatomy and physiology of the female reproduction organs.

5.4.2 THEORETICAL KNOWLEDGE REGARDING PHYSIOLOGY

It is important for advanced midwives to have knowledge regarding physiology of the reproduction organs because physiology concentrate on the way in which a living organism or bodily part function (De Kock & Van Der Walt, 2004: 5-3). Therefore, it is expected for advanced midwives to know the functions of the reproduction organs. Table 5.10, illustrates responses of advanced midwives with regard to how should their level of physiology knowledge be as independent practitioners.

TABLE: 5.12: THEORETICAL KNOWLEDGE LEVEL REGARDING PHYSIOLOGY N= 69

Responses	n=13		n=56	
	Frequency Group A	%	Frequency Group B	%
Reasonable	5	38.46	11	20.00
Good	2	15.38	11	20.00
Excellent	6	46.15	32	58.18
No knowledge	0	0.00	1	1.82
Total	13	100	56	100

Table 5.9 demonstrates that the majority (6 and 32%) of the respondents from both groups respectively, felt that the theoretical knowledge should be excellent. This

might be because of the physiological changes occurring during pregnancy, labour and pueperium that must be known to ensure best care (Davidson et al., 2008: 315).

5.4.3 THEORETICAL KNOWLEDGE REGARDING HIGH RISK PATIENTS

In order to ensure that quality care is rendered to midwifery clients, advanced midwives must be able to identify and treat high risk conditions. Most of the maternal deaths are caused by a failure to identify and treat the top five (non-pregnancy related infections, complications of hypertension, obstetric haemorrhage, Pregnancy related sepsis and pre-existing maternal disease) maternal deaths related conditions in time (S.A. National Department of Health: Saving Mothers, 2005-2007: 5; WHO, 2010: Online). Table 5.10 designates respondents' opinion with regard to how should their level of theoretical knowledge on high risk conditions be.

TABLE 5.13 THEORETICAL KNOWLEDGE REGARDING HIGH RISK PATIENTS N= 69

	N=13				N=56			
	Frequency Group A				Frequency Group B			
Theoretical knowledge	Reasonable	Good	Excellent	No knowledge	Reasonable	Good	Excellent	No Knowledge
PET/Ecalmpsia/Hypertension	3	1	9	0	10	4	41	1
Heart disease	3	2	8	0	9	9	37	1
Diabetes Mellitus	3	3	7	0	9	6	40	1
Anaemia	3	1	9	0	9	4	42	1
Ante-partum haemorrhage	3	1	9	0	9	5	41	1
HIV/AIDS	3	3	7	0	9	6	40	1
Drugs and alcohol abuse	3	3	7	0	9	12	33	1

Indicated in Table 5.10 most of respondents from both groups reported that the theoretical knowledge regarding high risk patients should be excellent. For PET/Eclampsia and Hypertension, there were 9 from Group A and 41 from Group B of respondents stating that the knowledge should be excellent. For anaemia, there were 9 and to 42 from both Groups respectively stating that the knowledge should be excellent. This might be due to the fact that hypertension and anaemia are classified under the top five (5) maternal deaths 'conditions (S.A. National Department of Health: Saving Mothers, 2005-2007: 5).

Knowledge about Diabetes mellitus, according to Group A (seven) and Group B (40) should be excellent. Advanced midwives should be well equipped with knowledge of diabetes mellitus in pregnancy as this condition is a high risk with complications leading to perinatal mortality including congenital anomalies (Davidson et al., 2008:451). Therefore, women with Diabetes mellitus should be treated by doctors.

Responding to the question of ante-partum haemorrhage (APH), nine from Group A and forty-one from Group B also indicate that the knowledge should be excellent. This might be due to complications attached to APH, and therefore, it is imperative for advanced midwives to be knowledgeable with this condition. Cronje & Grobler, (2009: 202) also state that all patients with ante-partum haemorrhage (APH) who present to a clinic must be transferred urgently to the nearest hospital as APH is an important cause of maternal death.

Seven from Group A and fourty from Group B also felt that the knowledge of HIV must be excellent. This is important as all infected women with HIV, should receive regimens to prevent mother-to-child transmission of HIV or lifelong ART if CD4 cell count = 350cells/mm3 (S.A. National Department of Health: Clinical Guidelines; PMTCT, 2010: 6).

Seven from Group A and 41 from Group B stated that the knowledge concerning drugs and alcohol abuse also should be excellent. This knowledge is important is because of the high rates of complications such as prematurity, stillbirth and low birth-weight (Fraser, Cooper & Crawford, 2009: 268).

5.4.4 RISK ASSESSMENT AND MANAGEMENT

In order to ensure that pregnancy and birth process are safe, advanced midwives should be equipped with knowledge and skills to recognize, prioritize, obtain help if unable to solve problems and plan for the care to be provided. Table 5.11 illustrates the ability of respondents in a clinical area in conjunction with the aid *of* other health providers.

TABLE 5.14: RISK ASSESSMENT AND MANAGEMENT N= 69

	N=13			N=56		
	Frequency Group A			Frequency Group A		
Risk assessment and management	Always	sometimes	Never	Always	sometimes	Never
Recognize patient's problems	12	1		55	1	
Prioritize patient's problems	13			56		
Solve patient's problems unaided	8	5		37	18	
Obtain help if unable to solve a problem	10	3		50	5	
Use a specific method to plan nursing care	12	1		51	5	

Table 5.11 indicates that the majority (12) of respondents from Group A and (55) from Group B assured that patients' problems should be recognized. This is assuring as complications should be recognized early so as to prevent any further complications. Immediate and appropriate actions to complications in pregnancy and labour can increase the survival rate (Lowdermilk & Perry, 2006: 649)

All respondents from both Groups stated that they always prioritize patient s' problems. Prioritizing problems is important as treatment intervention will be commenced in time before complications set in, and midwives should minimize complications.

Eight from Group A and 37 from Group B reported to be always able to solve patient's problem independently, whilst five and 18 of the respondents stated to sometimes solve patients problems

The majority of respondents, eight and 37 respectively, stated that they always obtain help if unable to solve patient's problem. This is a good practice as advanced midwives should interact with other health professionals such as doctors for consultation and referral of patients. This also gives an impression of cooperation needed between health providers for the benefit of the health consumers.

Twelve (92.31%) from Group A and (91.07%) from Group B reported to be always using specific method when planning midwifery care. One of the best principles in midwifery practice is to deliver effective care and support based on evidence that will benefit the mother, baby and her family.

5.4.5 TRAINING INSTITUTIONS.

Training institutions should have all the resources needed for effective educational learning. This should be attained by making sure that the functioning of all training institutions are approved by the SANC and SAQA which are the educational bodies responsible for the regulating nursing education/training and practice (South African nursing Council, Circular 13/2001: Online). Figure 5.5 below gives an indication of institutions suggested by respondents for training as an advanced midwife.

GROUP A: n=13 GROUP B: n=56

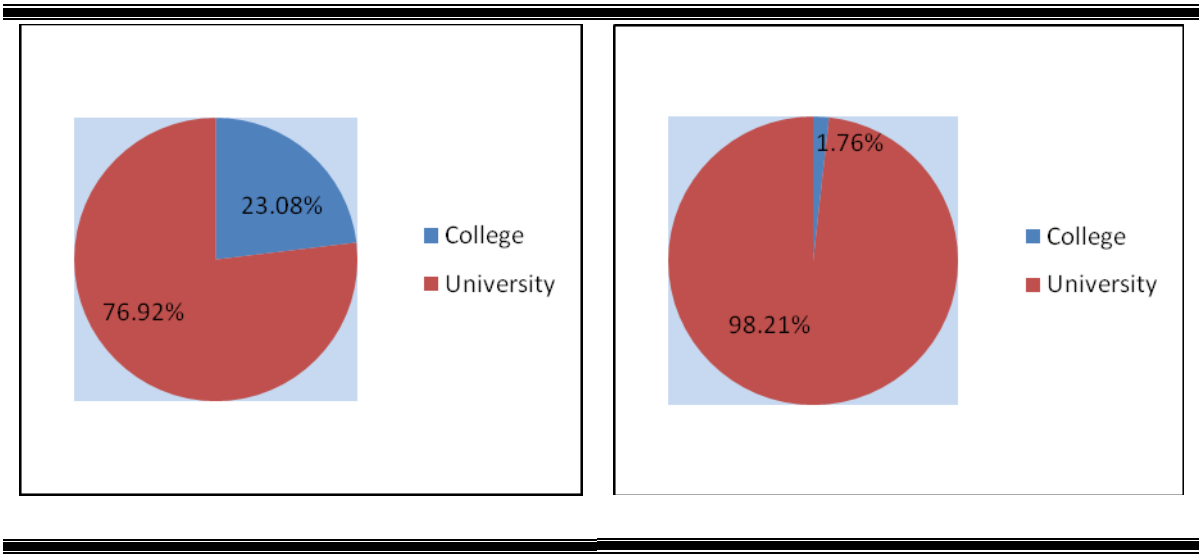

FIGURE 5.4: TRAINING PERIOD N = 69

5.4.5 TRAINING INSTITUTIONS.

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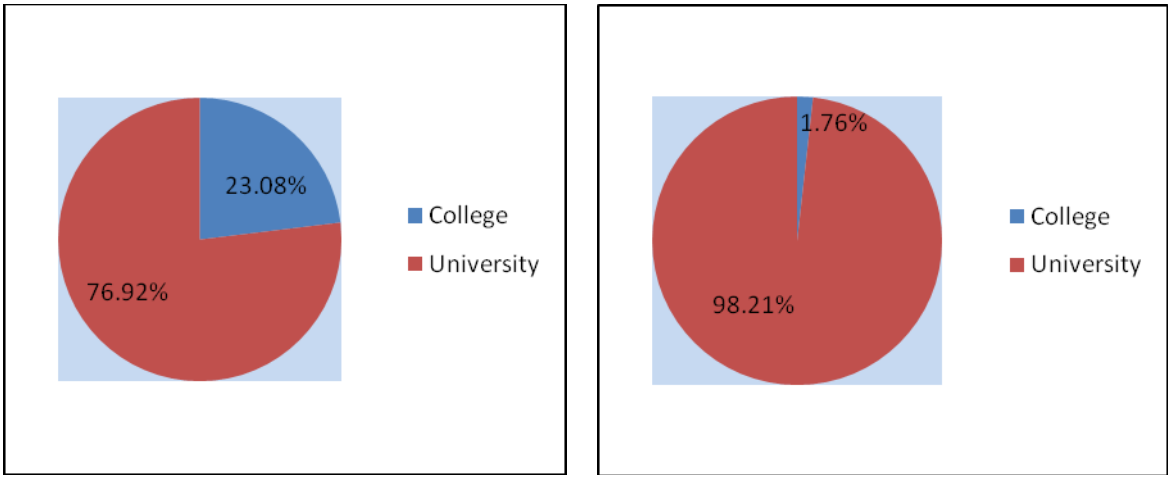

FIGURE 5.5: TRAINING INSTITUTE N=69

Ten from group A. and fifty-five from group B gave an indication that training should be studied at the university. There is a low percentage from both groups, three (23.08%) from group A and one (1.79%) from group B that indicated the college as the institution to be considered. This implies that most (65 out of 69) respondents strongly felt that the training should occur at the university. This might be due to the fact that respondents have trained at the university.

5.4.6 DURATION OF TRAINING

The prescribed period for training as an advanced midwife is at least one year at the local university (SANC: Advanced Midwifery and Neonatology Curriculum, 1995: Online). Table 5.12 indicates respondent's views on how long should the training period take.

TABLE 5.15: TRAINING PERIOD N = 69

Responses	n=13		n=56	
	Frequency Group A	%	Frequency Group B	%
1. One year	10	76.92	21	37.50
2.One ½ year	1	7.69	22	39.29
3.Two years	2	15.38	13	23.21
Total	13	100	56	100

The majority, ten of the respondents from group A felt that the training period should be one year. This could be because of the background of basic midwifery that they pose. Nevertheless, in group B, the majority, twenty-two felt that one-and half year should be considered. Two from group A is of the opinion that two years should be suitable for the programme and from group B, thirteen is also for the idea of two years. The study results pointed out that most (38) respondents, felt that one year was not ideal/enough for the programme. The extension of time is requested to cover the workload and practicals (codes for question 16).

5.4.7 MOTIVATION REGARDING PROPOSED DURATION OF TRAINING

Most of the respondents stated that one year is not enough or suitable for completing all the requirements for the programme. Table 5.23 designates respondents' motivations for the duration of training.

TABLE 5.16: MOTIVATION REGARDING TRAINING PERIOD N= 69

Responses	n=12		n=55	
	Frequency Group A	%	Frequency Group B	%
Previous experience of basic midwifery	8	66.67	19	34.55
To cover practical's	1	8.33	19	34.55
To cover workload	2	16.67	15	27.27
Irrelevant	1	8.33	2	3.64
Total	12	100	55	100

[Due to two respondents from both groups, not indicating reasons for the extension of the training period, lead to the total of 12 and 55].

Eight respondents from Group A suggested a period of one year due to the fact they have the experience of basic midwifery that qualifies them to complete within one year's time. The two from Group A suggested one and half year, reasoning that 18 months is needed to cover the practical work that is always behind due to the fact that there is a lot of midwifery students looking for the same requirements in almost all the academic clinical areas, and therefore they are experiencing problems to finish in time.

From group B, nineteen suggested one year while another nineteen one and half year for the same reasons stated by respondents in group A. This implies that most respondents from Group B are for the extension of the training period. The duration of one year might not affect the masters' students in any case as they do the course over the period of two years.

5.4.7 SUGGESTED THEORY/CONTENT TO BE ADDED IN THE PROGRAMME OF ADVANCED MIDWIFERY

Table 5.13; illustrate responses of respondents suggesting which theory should be included in the programme of Advanced Midwifery and Neonatology.

TABLE 5.17: THEORY/CONTENT TO BE ADDED IN THE PROGRAMME N = 69

Responses	n=13		n=56	
	Frequency Group A	%	Frequency Group B	%
Sonor	1	20	9	36.0
Central venous pressure (CVP)	1	100.00	3	100.00
More on abnormal midwifery, neonatal, HIV and CPR	1	20	7	28.00
Pharmacology	0	0.00	1	4.00
C/ section	0	0.00	1	4.00
Research	1	20.00	2	8.00
PPIP programme	0	0.00	2	8.00
Herbal and massage technique	0	0.00	1	4.00
Not applicable	1	20	4	16.00
More time on practical	0	0.00	2	8.00

From Group B, Nine suggested sonar, and seven suggested HIV and CPR to be added. From group A, only a small percentage from all items suggested should be added in the programme. This implies that although group B claiming to be not correctly placed and utilized, they still felt that the knowledge of an advanced midwife should be increased with all the possible midwifery procedures. Through this knowledge, as suggested by Roets (1996:174) the utilization of an advanced midwife in primary health care centres might ensure quality care to health consumers.

Research was requested by three respondents, this might give an indication that it should be really strengthen as it is important for ensuring evidence-based practice.

5.5 CLINICAL SKILLS DURING ANTENATAL PERIOD

South Africa is faced with the challenge of an increasing number of women dying due to pregnancy and child birth related conditions (South African's 9th Annual Congress of Midwives, 2008: Online, Fraser.et al., 2006). Based on the statement given above, Figure 5.6 - 5.13 illustrates respondent's responses with regard to procedures that they should perform as an attempt to make pregnancy safe.

5.5.1 GENERAL PHYSICAL EXAMINATION

The first person that a client or a pregnant woman meets at the health care centre is the midwife. Therefore it is imperative that advanced midwives should be able to do physical examinations through which any deviation from normality will be identified (Roets, 1996:114). Figure 5.6 indicates the respondents' responses regarding their level of capability towards physical examination of a pregnant woman.

GROUP A: n=13 GROUP B: n=56

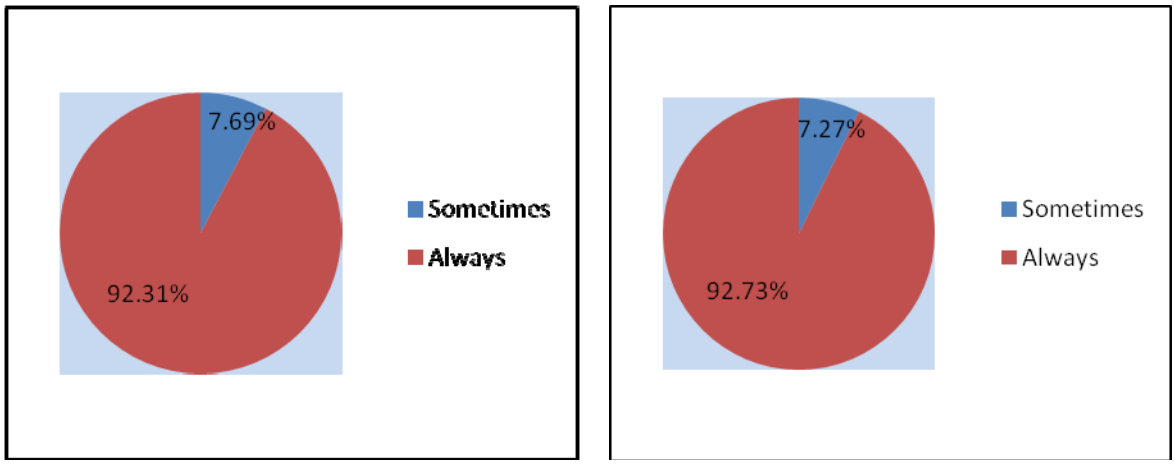

FIGURE 5.6: GENERAL PHYSICAL EXAMINATION. N=69

Figure 5.6, illustrates that the majority (12) from Group A and (51) from Group B always do perform physical examination during antenatal visits. Physical examination is important as it gives an examiner a chance of looking holistically at

the woman and thereafter enables the examiner to recognize deviation from normality and thereafter refer in time (Fraser et al., 2010: 242).

5.5.2 VAGINAL EXAMINATION.

One of the indications for vaginal examination during antenatal period is to assess the adequacy of the pelvis (Davidson et al., 2008: 353). Therefore, it is crucial for an advanced midwife to be competent in assessing the measurement for adequacy of the pelvis during pregnancy to prevent complications during labour. Figure 5.7 specify whether respondents perform this procedure or not.

GROUP A: n=13 GROUP B: n=56

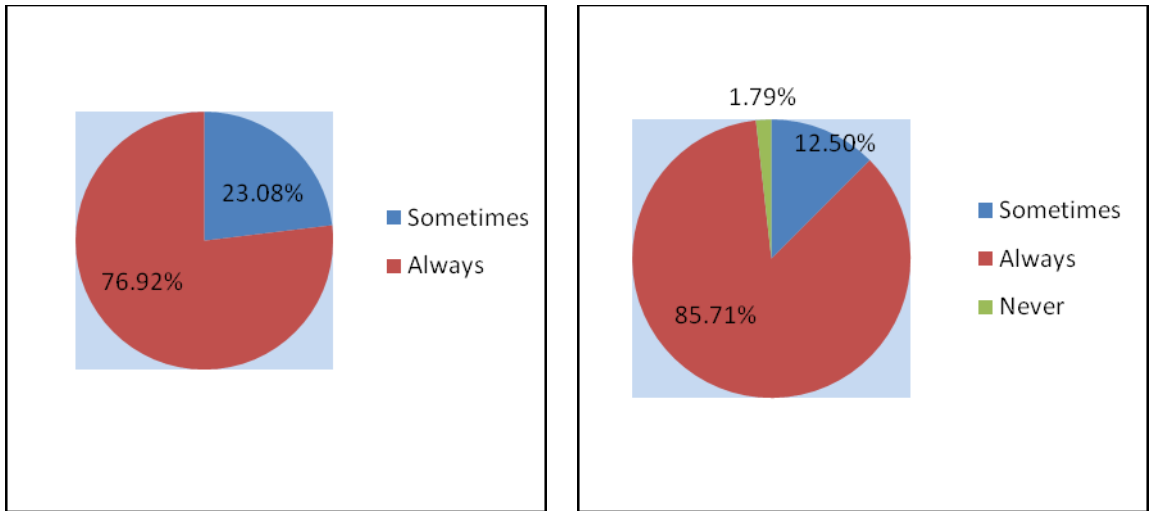

FIGURE 5.7: VAGINAL EXAMINATION. N=69

Ten of the respondents from Group A and 48 from group B, indicated that they always perform vaginal examinations during the antenatal period. Two from group A and seven from group B performs it sometimes. One from group B stated that he/she never attempted a vaginal examination during the pregnancy, which might because of his/her placement.

5.5.3 BIMANUAL EXAMINATION

Through bimanual examination, some vital obstetrical information such as the abnormal size of the uterus can be detected (Davidson et al., 2008: 352). Figure 5.8 denote the responses regarding how often respondents perform bimanual examination.

GROUP A: n=13 GROUP B: n=56

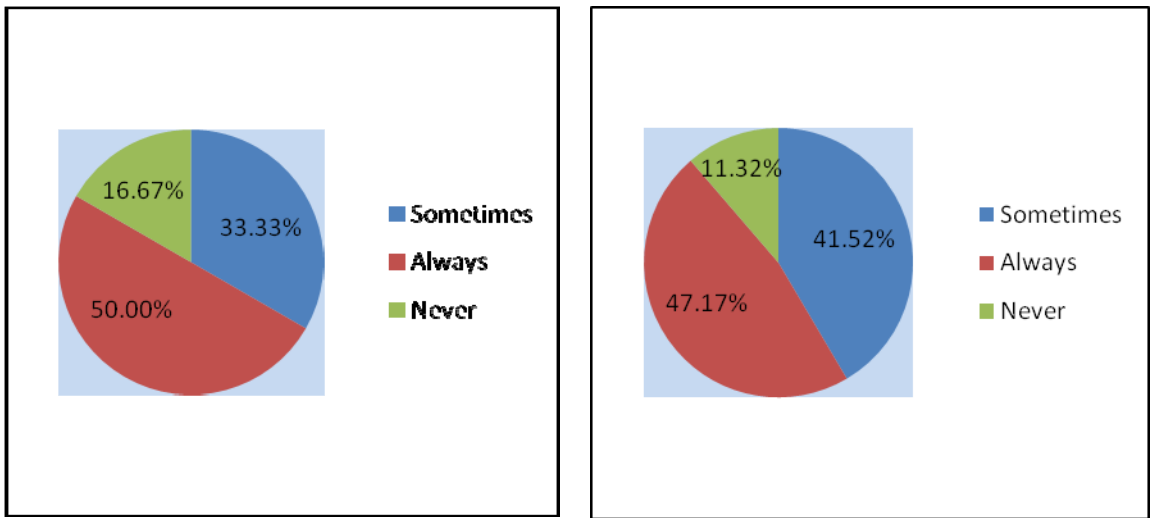

FIGURE 5.8: BIMANUAL EXAMINATION N= 69

Figure 5.8 illustrates that most of the respondents (6 and 25) from both groups respectively, always do bimanual examination. Four from group A and 22 from group B indicated that they do the procedure, but sometimes. Only a small percentage from both groups stated that they never perform the procedure. This is an indication of good practice as this procedure is important because through it, the cervix's position, shape and lesions can be determined (Lowdermilk & Perry, 2006: 90).

5.5.4 PELVIC ASSESSMENT

Pelvic assessment is the measurement of the dimensions and proportions of the bony pelvis in order to assess whether it is large or adequate enough to

accommodate birth (Cronje & Grobler, 2009: 305). Table 5.25 indicates whether advanced midwives do perform pelvic assessment in their practice.

TABLE 5 .18: PELVIC ASSESSMENT N = 69

Responses	Frequency Group A	%	Frequency Group B	%
Always	7 0	53.85	48	85.71
Sometimes	6	46.15	7	12.50
Never			1	1.79

Table 5.14 displays that the majority of respondents from groups, seven and 48 respectively, always perform pelvic assessments. Six from group A and seven from group B indicated that they do it sometimes. Pelvic assessment should be done to identify high risk patients for possible arrangements of confinement place, for example for caesarean section.

5.5.5 ABDOMINAL PALPATION

Abdominal palpation should be carried out to establish and affirm the fetal lie, position, presentation and whether the fetal growth is consistent with gestational age during the progress of pregnancy (Fraser et al., 2010: 247). Table 5.15 illustrates respondents indicating that they perform abdominal palpations in their daily practice.

TABLE 5: 19: ABDOMINAL PALPATION = 69

Responses	n=13		n=56	
	Frequency Group A	%	Frequency Group B	%
Always	12	92.31	54	96.43
Sometimes	1	7.69	1	1.79
Never	0	0.00	1	1.79
Total	13	100.00	56	

Twelve from Group A and 49 from Group B stated that they always perform abdominal palpations in their practice. One from Group A and one from Group B reported to be performing the procedure sometimes. This might indicate that any deviation from normality can be identified and be managed in early stages. Fraser et al., (2006: 250) are also of the opinion that through abdominal examination, fetal growth can be determine whether is consistent with gestational age during the progression of pregnancy.

5.5.6 HISTORY TAKING

Antenatal history is important because it forms the basis for care to be provided (De Kock & Van Der Walt, 2004: 9-5). Table 5.16 gives an indication of how often should respondents took the history of a pregnant woman when rendering antenatal care service.

TABLE 5.20: HISTORY TAKING N=69

Responses	Frequency Group B	%	Frequency Group B	%
Always	12	92.31	55	98.21
Sometimes	1	7.69	1	1.79
Total	13	100.00	56	100.00

As seen in Table 5.16, most of the respondents, 12 from Group A and 55 from Group B indicated that they always take antenatal history. Antenatal history taking is vital because it gives direction for care to be provided, risk assessment and midwifery process to be followed.

5.6 FORMULATION OF MIDWIFERY DIAGNOSIS

History taking is one of the cues used by midwives in trying to make the correct diagnosis (Burvill, 2002: Online). Table 5.17 displays whether respondents do formulate midwifery diagnosis.

TABLE 5.21: FORMULATION OF MIDWIFERY DIAGNOSIS N= 69

Responses	n=13		n=55	
	Frequency Group A	%	Frequency Group B	%
Always	11	84.62	53	96.36
Sometimes	2	15.38	1	1.82
Never	0	0.00	1	1.82
Total	13	100.00	55	

Due to one respondent not indicating how often he/she formulates midwifery diagnosis, the respondents of Group B thus counted to 55.

Most of the respondents from groups, 11 from Group A and 53 from Group B indicated that they always formulate a midwifery diagnosis. Two from Group A and one from group B reported to formulate the midwifery diagnosis sometimes.

5.6.1 DRAWING OF BLOOD SPECIMEN

During pregnancy, the essential screening investigations for identifying syphilis, Rhesus D, haemoglobin (Hb) including HIV status is diagnosed through blood testing (S.A. National Department of Health: Guidelines for Maternity Care, 2007: 26). Figures 5.8 illustrate how many advanced midwives in this study draw blood from women for diagnostic purposes during the antenatal care.

Group A: n=13 Group B: n=56

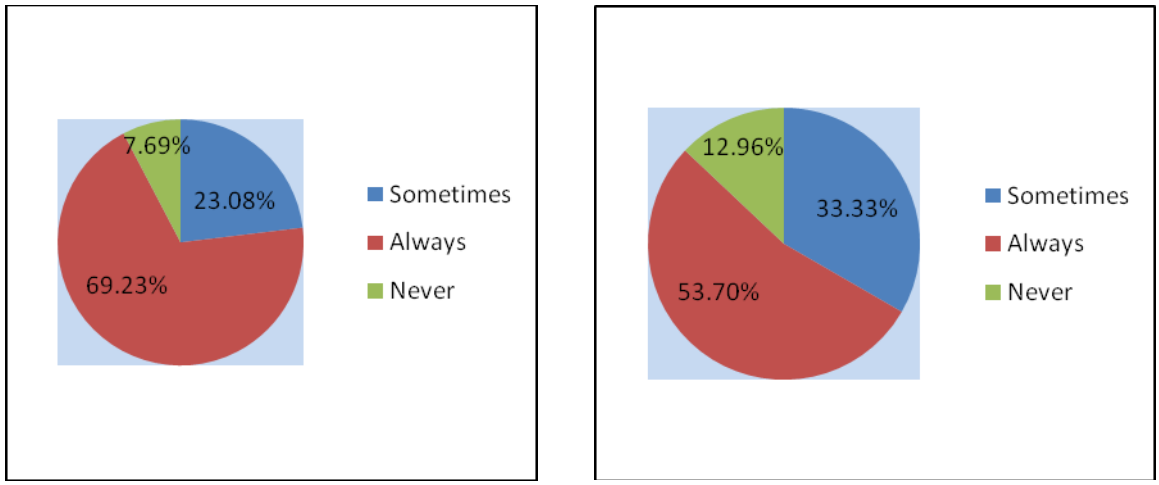

FIGURE 5.9: DRAWING OF BLOOD SPECIMEN N= 69

As seen in Figure 5 8, most (9 and 29) from both groups respectively, indicated that they always draw blood as part of antenatal assessment.

5.6.2 CIRCUMSTANCES UNDER WHICH RESPONDENTS PERFORM ACTIONS MENTIONED IN QUESTION 18.8

TABLE 5.22: CIRCUMSTANCES UNDER WHICH ACTIONS WERE UNDERTAKEN N= *69*

Responses	Frequency Group A	%	Frequency Group B	%
Haemorrhage (Medical conditions,low Hb, PET).	0	0.00	5	9.62
Emergency	1	8.3	5	9.6
Routine antenatal care	9	75	33	63.5
When on call /when needed. When necessary.	6	50	17	32.7
Not applicable	1	8.33	1	1.92
Dr. always present. Dr does all the work. Do not perform, anything	0	0.00	1	1.9

From table 5.18 above, it is apparent that most nine from Group A and 33 from group B attend to women actions mentioned in Table 5.18 because they are important procedures during ANC period. For example, the antenatal history is useful for planning and implementation of care to be provided during pregnancy, labour and postnatal period (Fraser et al., 2010: 234).

Six (50%) from Group A and 17 (32.7%) from Group B perform these procedures when it is necessary. This implies that respondents are able to carry on with the necessary antenatal procedures independently. Therefore, it is crucial for midwives to take the necessary measures in the doctor's absence, such as immediate resuscitation or manual removal of the placenta to ensure best care (Fraser et al., 2010: 6).

5.6.3 INTRAVENOUS INFUSION:

Fluid replacement through intravenous infusion is more effective than any other route in the management of postpartum haemorrhage (S.A. National Department of Health: A Monograph of the Management of Postpartum Haemorrhage, 2010: 30). The Scope of Practice for the registered midwife, also stipulate that, a midwife may insert an intravenous infusion (at least 1000ml x 2 of 5% Dextrose in a normal saline solution) in a case of ante-partum haemorrhage (SANC Rules and Regulations R2488 of October 1990, as amended). Table 5.19 indicates the respondents' responses regarding insertion of an intravenous infusion without a doctor's prescription.

TABLE 5.23: INTRAVENOUS INFUSION WITHOUT DOCTOR'S PRESCRIPTION N= 69

Responses	n=13		n=56	
	Frequency Group A	%	Frequency Group B	%
Always	8	61.54	43	76.79
Sometimes	4	30.77	13	23.21
Never	1	7.69	0	0.00
Total	13	100.00	56	100.00

Eight from Group A and 43 from Group B, always insert intravenous infusion without the Dr.'s prescription. This is good practice as fluid replacement is needed during the resuscitation of a patient in an emergency. The Guideline for Maternity Care in SA, (2007: 14) also suggest that equipments for intravenous infusions should be available for any emergency at all health care centers.

5.6.4 CIRCUMSTANCES FOR INSERTING INTRAVENOUS INFUSION

In the case of ante-partum, intra-partum or post-partum haemorrhage, an intravenous infusion should be inserted before the patient can be transferred from the primary health care centre to the hospital to maintain the fluid balance (Pillitteri, 2002:395). Table 5.31 depicts responses of participants regarding circumstances under which they insert intravenous infusion.

TABLE 5.24: CIRCUMSTANCES FOR PUTTING UP AN INTRAVENOUS INFUSION N= 69

Responses	Frequency Group A	%	Frequency Group B	%
Emergency.Haemorrhage	6	54.5	33	61.1
When necessary/when in labour	3	27.27	17	31.5
Pre-operative	0	0.00	6	11.1
Sick pts. Low BP.Dehydration	3	27.27	17	31.5
Maintenance/replacing infiltrated drip	0	0.00	1	1.85

As seen in Table 5.20, respondents insert intravenous infusion for almost all the indications stated. Cronje & Grobler (2009: 79) are also of the opinion that the administration of intravenous fluids is needed in cases like poor labour progress that last for more than 4-6 hours, if abnormal fetal heart pattern are noted, or ketonuria develops. Therefore it is important for advanced midwives to be able to master the intravenous infusion procedure.

5.6.5 ASSESSMENT OF THE FETAL WELLBEING AND UTERINE ACTIVITY

Monitoring of the fetal wellbeing and the uterine activity should always be done in order to ensure safe pregnancy. Illustrated in Table 5.32 advanced midwives indicate how often they assessed fetal wellbeing through procedures stated in Table 5.21

TABLE 5.25: ASSESSMENT OF FETAL WELLBEING AND UTERINE ACTIVITY N=69

	n=13			n=56		
	% Group A			% Group A		
Assessments	Always	Some-times	Never	Always	Some-Times	Never
Non stress test	18.18	9.09	72.73	21.57	21.57	56.86
Oxytocin test	0.00		100		10.42	89.58
Ultrasound examination	8.33	8.33	83.33	3.85	25.00	71.15
Amniocentesis		0.00	100		41.08	95.92
Doppler	46.15	0.00	53.85	25.00	17.31	57.69
Biophysical profile	33.33	0.00	66.67	8.16	16.33	75.51

Eight from Group A and 29 from group B of the respondents stated that they never performed the non-stress test procedures. This procedure is important for checking the wellbeing of the fetus throughout pregnancy (Davidson et al., 2008: 552).

No respondents from Group A and 43 from Group B reported that they never performed the Oxytocin test. The reason for not using the drug might be due to complications it causes such as uterine rupture especially in cases of previous caesarian section women (Cronje & Grobler, 2009: 345).`

It was clear that ultrasound procedure was being done by doctors mostly as 10 and 37 from both groups respectively reported not performing the procedure.

Not one of the respondents indicated to perform amniocentesis, dopplers or biophysical profiles. This procedure is not in the scope of practice of midwives.

5.6.6 INTERPRETATION AND ANALYSIS OF THE CARDIOTOCOGRAPH (CTG) RESULTS/FINDINGS.

Cardiotocograph is the electronic device used to monitor the fetal heart rate and the uterine contraction accurately (Henderson & Macdonald, 2004: 869).

Table 5.22 indicates the response of participants regarding interpretation and analysis of the CTG.

TABLE 5:26: INTERPRETATION AND ANALYSIS OF THE CARDIOTOCOGRAPH (CTG) RESULTS/FINDINGS N= 69

n=13			n=55	
Responses	Frequency Group A	%	Frequency Group B	%
Always	7	53.85	44	80.00
Sometimes	2	15.38	2	3.64
Never	4	30.77	9	16.36
Total	13	100.00	55	

Due to one respondent not indicating how often does she/ he interpret and analyze the CTG, respondents of Group B thus counted to 55.

From table 5.22 it is clear that the majority of respondents from both groups; seven from Group A and from Group B, were always able to analyze and interpret CTG data. This is an important competency as advanced midwives have to interpret and analyze the CTG as it assist in monitoring high-risk pregnancies when complications such as fetal distress are diagnosed and advanced midwives should act upon that (Cronje & Grobler, 2009: 278).

5.6.7 PLANNING OF DIET FOR SPECIFIC NEEDS IN PREGNANCY

Planning of a diet for a pregnant woman is very important as clients with medical conditions such as cardiac failure, diabetes mellitus and PET, should be given special diet with low salt, sugar and fat free diet (Green & Wilkinson, 2004: 58). Table 5.34 indicates whether respondents do plan diet for specific needs in pregnancy.

TABLE 5.27: PLANNING OF DIET N= 69

n=13			n=56	
Responses	Frequency Group A	%	Frequency Group B	%
Always	8	61.54	41	73.21
Sometimes	4	30.77	11	19.64
Never	1	7.69	4	7.14
Total	13	100.00	56	100.00

Table 5.23 illustrate that respectively, eight and 41 of respondents from both groups plan diets for women during pregnancy. It is important that advanced midwives plan and give women advices on healthy as this will promote normal weight gain which have an important influence in fetal growth and in infant birth weight (Davidson et al., 2008: 421).

5.6.8 INDUCTION OF PREGNANCY

Determining the inducibility of the pregnant woman seemed to be an important responsibility of the advanced midwife as a way of preventing complications that may affect either the mother or the fetus (Fraser et al., 2009: 558). Figure 5.9 illustrate whether respondents inducibility of pregnancy or not

Group: n=13 Group B: n=56

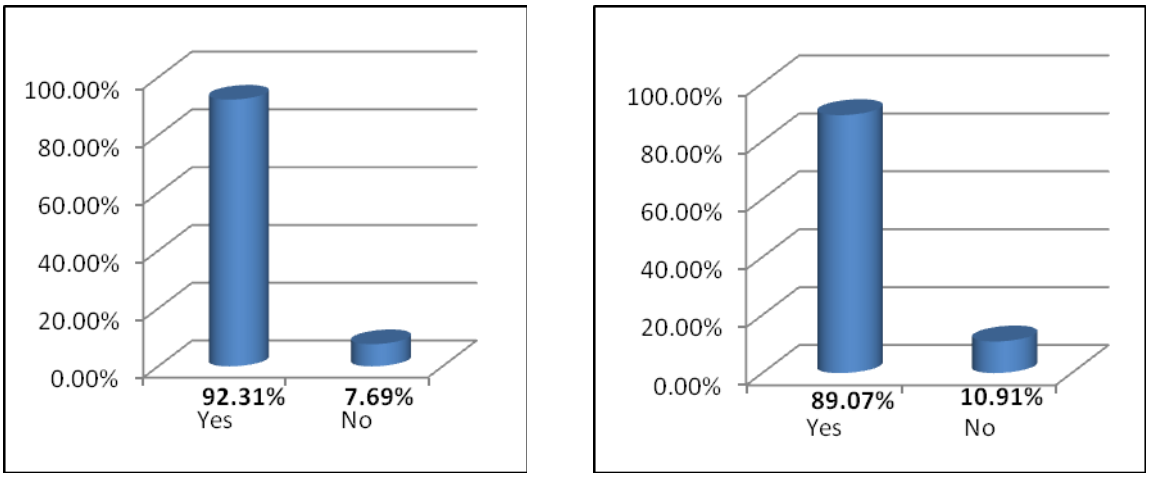

FIGURE 5.10: DETERMINING INDUCTION OF A PATIENT N=13 GROUP A AND N=56 GROUP B

The majority of respondents, twelve from Group A and 49 from group B reported to be determining the inducibility of clients.

5.6.9 INDUCTION OF PATIENTS BY ADVANCED MIDWIVES

Most of the respondents from groups, 11 from group A and 44 from group B reported to be not inducing patients themselves. Induction procedure was mostly done by doctors as it carries risks that may need emergency caesarian section which is to be performed by doctors (Labour Induction, 2010: Online). The scope of midwifery practice state that induction should be done under the supervision of doctors in a hospital situation for the fear of complications that may need an emergency baby.

TABLE 5.28 INDICATES HOW OFTEN RESPONDENTS PERFORM INTRAPARTUM PROCEDURES. TABLE 5.25 PROCEDURES DONE DURING INTRAPATUM N=69

n=13				n=56		
Frequency Group A				Frequency Group B		
Procedures	Always	Sometimes	Never	Always	Sometimes	Never
CTG. Set up the monitor and interpret results	6	1	6	43	2	9
Apply scalp electrodes	1	0	12	1	5	47
Insert intran for monitoring contractions	1	1	11	1	6	48
Interpret data	6	1	6	39	3	10
Identify problems	6	3	4	51	0	4
Treat uterine abnormalities	4	3	6	27	16	9
Treat fetal heart pattern abnormalities	3	5	5	33	16	5
Insert amnion infusion	7	3	3	32	20	2

Forty nine of respondents from both reported to always set up the CTG monitor and interpret results. Scalp electrodes and intran procedures are no more being performed because of the fear of HIV transmission from mother to child (S.A. National Department of Health, Clinical Guidelines: PMTCT, 2010: 27). Therefore none of the respondents indicated to be performing these procedures.

Thirty-six of the respondents from both Groups reported that they always treated fetal heart rate pattern abnormalities. This is good practice, as results obtained from this machine, gives accurate results about the fetal wellbeing which will direct the advanced midwife to plan accordingly (Cronje & Grobler, 2009: 278).

5.7.1 VAGINAL DELIVERY IN BREECH, FACE, POSTERIOR POSITION AND MULTIPLE PREGNANCIES.

Table 5.26 indicates whether respondents are able to conduct vaginal births in cases of breech, face, posterior positions as well as multiple pregnancies.

TABLE 5.29: VAGINAL BIRTHS N=69

n=13				n=56		
% Group A				% Group B		
PRESENTA-TIONS	Always	Sometimes	Never	Always	Sometimes	Never
Breech	0.00	100.00	0.00	30.36	67.86	1.79
Face	7.69	38.46	53.85	21.43	26.79	1.79
Persistent posterior position	0.00	84.62	15.38	16.07	53.57	30.36
Multiple pregnancy	0.00	92.31	7.69	21.43	75.00	3.57

All respondents in Group A and 38 from Group B reported that they sometimes conducted breech births. Seven from Group A and 29 From Group B stated that they conducted face births. Eleven from Group A and 30 from Group B affirmed that they never conducted face births. Eleven from Group A and 30 from Group B confirmed that they sometimes perform persistent births, 12 and 42 from both Groups also declared that they sometimes conduct multiple pregnancy.

5.7.2 PARTOGRAM

To access progress of labour and plan the care, a partogram should be used (Lowdermilk & Perry 2006: 414). As reflected in Table 5.27 respondents stated how often does they evaluate progress of labour, identify causes of prolonged labour as well as treat the causes.

TABLE: 5. 30: EVALUATION AND INTERPRETATION OF A PARTOGRAMME. N=69

n=13				n=56		
Percentage group A				Percentage group A		
Evaluation and interpretation	Always	Some-times	Never	Always	Some-times	Never
Evaluate progress	92.31	7.69	0.00	98.21	0.00	1.79
Identify causes of prolonged labour	92.31	7.69	0.00	96.43	1.79	1.79
Treat cause	76.92	23.08	0.00	89.29	8.93	1.79

The majority, 12 and 55 respondents from both Groups affirmed that they always assess the progress, identify causes of prolonged labour and treat the causes of prolonged labour. This is a good practice that advanced midwives should always practice in accordance with it in their daily practices

5.7.3 FORCEPS AND VACUUM

In the case of prolonged second stage of labour, forceps and vacuum should be used in order to assist birth as quick as possible. Table 5.28 indicates how often respondents perform these procedures.

TABLE 5.31: FORCEPS AND VACUUM PERFORMANCE N=69

n=13				n=56		
% Group A				% Group B		
Procedures	Always	Sometimes	Never	Always	Sometimes	Never
forceps	6	0	7	23	22	10
Vacuum	5	0	8	21	22	12

Six and 23 respondents from both groups indicated that they always do forceps births. Five and 21 respondents confirmed that they always use vacuum when it is necessary. Advanced midwives should conduct assisted births in conditions that put the woman's health at risk such as heart disease, prolonged second stage of labour,

or exhaustion; for the fetus, they should be used for non reassuring fetal status, prolapsed umbilical cord and in premature placental separation (Davidson et al., 2008: 777).

5.7.4 CIRCUMSTANCES UNDER WHICH ADVANCED MIDWIVES PERFORM FORCEPS AND VACUUM BIRTHS.

TABLE 5.32: UNDER WHICH CIRCUMSTANCES FORCEPS AND VACUUM ARE PERFORMED N=69

Circumstances	Frequency Group A n=13	%	Frequency Group B n=56	%
Poor maternal effort	8	61.54	28	59.6
Emergency	0	0.00	4	8.5
Maternal conditions (PET or heart disease	4	44.4	7	14.9
In the absence of a Dr.	0	0.00	12	25.5
When guiding, teaching students or midwives	0	0.00	0	0.00
N/A, irrelevant	0	0.00	4	8.51

Eight and 28 respondents from Groups A and B respectively, indicated that they perform assisted births for poor maternal effort, four and seven respectively due to PET and heart diseases as stipulated by Lowdermilk & Perry,(2006: 796) to shorten the second stage of labour.

5.7.5 COUNSELLING AS ALTERNATIVE METHOD FOR PAIN RELIEF

The woman in labour should be empowered with information regarding alternative methods of pain relief methods including positions to enhance the labour progress. Method of feeding the infant should also form part of information the woman should

know so that informed decisions can be made. Table 5.30 illustrate the respondents' opinion regarding counselling patient with regard to different positions to be maintained during labour.

TABLE 5.33: COUNSELLING OF WOMEN RE-DIFFERENT POSITIONS DURING LABOUR N=69

n=13			n=56	
% Group A			% Group A	
Counseling (health education) regarding different positions during labour	Yes	No	Yes	No
Alternative method of pain relief	84.62	15.38	98.21	1.79
Alternative positions during labour	100		94.64	5.36
Mother and child bonding	100		100	
Breastfeeding	100		100	

Table 5.30: indicates that most respondents from both groups do empower women with information regarding alternative methods of pain relief, alternative birth positions that can be maintained during labour. Advanced midwives should attend to the comfort of women by giving them information that will lead to taking informed decisions (Davidson et al., 2008: 646).

5.8 POSTNATAL

Postnatal is the period of physiological adjustment and recovery following the end of pregnancy and continues until six weeks post-birth (Fraser et al., 2006: 612). The main focus of the postnatal period, is to monitor the mother's physical recovery from the effects of pregnancy and labour and also to establish infant feeding patterns (De Kock & Van Der Walt, 2004: 17-3). Table 5.31 indicates how often do respondents evaluate and treat physical changes occurring during the pueperium period.

TABLE 5.34: EVALUATION AND TREATMENT OF PHYSICAL CHANGES OCCURRING DURING POSTNATAL PERIOD N=69

n=13				n=56		
% Group A				% Group A		
Physical changes	Always	Some-times	Never	Always	Some-times	Never
Evaluating involution	13		0	54		2
Treating perineal infection	8	4	1	40	11	4
Determination of hydration status	11	2	0	54	1	1
Treating engorged breasts	9	3	1	50	2	4

All respondents from Group A and 54 from Group B; affirmed that they always evaluate the uterus for involution. Eight and 40 from both groups confirmed that they always treat perineal infection. Eleven and 54 respectively, declared that they always determine hydration status in cases of PPH and start with the treatment and management thereof. Advanced midwives must evaluate the involution of the uterus and start with treatment as women are in danger of haemorrhage from the uterus until involution is complete (Pillitteri, 2002:602).

5.8.1 RECORDS AUDITING ON DISCHARGE

Auditing of records is important as this ensures that protocols are followed and quality care is rendered to clients (What Is the Importance of Audit, and Its Advantages & Disadvantages, [n.d]: Online). Table 5.32 illustrate the responses of respondents on whether they do audit records on discharge.

TABLE 5.35: AUDITING OF RECORDS. N=69

n=13			n=56	
Auditing of records	Frequency Group A	%	Frequency Group B	%
Yes	13	100.00	48	85.71
No	0	0.00	8	14.29
Total	13	100.00	56	100.00

As seen in Table 5.32, it is clear that all respondents in Group A and 48 from Group B do audit patients' records on discharge. This implies that evaluation of care is being done for ensuring quality service.

5.9 NEONATAL CARE

Pillitteri (2002:629) asserts that two thirds of all deaths occur in the first year of life. Therefore advanced midwives should be critical when observing the neonate. The opinions of respondents regarding the identification of high risk neonates are illustrated in Table 5.33 below.

TABLE 5.36: IDENTIFICATION OF HIGH RISK NEONATES PROBLEMS N = 69

n=13				n=56		
% Group A				% Group A		
High risk neonates	Always	Some-times	Never	Always	Some-times	Never
Sick neonates	12	1		55	1	
Congenital abnormalities	10	3		40	16	
Premature neonates	12	1		55	1	
Neonate with respiratory distress	12	1		56		
Neonate with jaundice	12	1		50	3	3
Neonate with hypothermia	11	2		51	4	
Neonate with potential or actual HIV positive results	8	5		24	29	1
Small for dates neonates	9	4		51	5	

Twelve from Group A and 55 from Group B respondents indicated that they have the ability to identify a sick neonate. Advanced midwives need to have the ability to identify congenital abnormalities. Ten and 40 respondents from both groups respectfully stated that they always do identify congenital abnormalities in neonates. Identification of congenital abnormalities in early stages is important as failure could lead to impaired fetal development that could have been avoided (Harrison, 2002: 113).

Twelve and 55 respondents from both groups confirmed that they are able to diagnose/ identify a premature neonate. Identification of premature neonates is very important as parents to these babies usually become affected emotionally. The mother may feel like a failure for not carrying the baby to full term (De Kock & Van Der Walt, 2004: 28-6). Therefore advanced midwives should be there to give support to parents.

Twelve and 56 of respondents from both groups, declared that they are able to identify/diagnose neonates with respiratory distress. Respiratory distress is common in high risk neonates and should be identified and managed to decrease mortality rate in neonates.

Twelve and 50 respondents from both Groups respectively always identify neonatal jaundice and in so doing, they may prevent the possibility of damaged cells of the central nervous system (CNS), kernicterus or bilirubin encephalopathy (Davidson et al., 2008: 1009).

Eleven and 51 of respondents confirmed that they were always able to diagnose neonatal hypothermia. This indicates possible good practice in that; they may be able to prevent complications such as increased oxygen consumption, lactic acid production and apnoea (Fraser et al., 2006: 7840).

Regarding identification of HIV positive infants, eight respondents from Group A stated that they were always able to identify these neonates while in Group B 29 respondents stated that they were able to identify these neonates sometimes.

Identification of HIV Positive neonates is important as Antiretroviral Therapy (ART) will be started early to ensure that the effect of the virus is reduced thus maintaining a healthy baby (S.A. National Department of Health: Clinical Guidelines; PMTCT, 2010: 12).

As seen in Table 5.33, it is illustrated that nine and 51 of respondents from both groups stated that they are always able to identify small-for-dates neonates. It is crucial as such infants are at risk of possibility of growth retardation and by being noted in time continuous care may be carried out (Harrison, 2002: 77).

5.9.1 ASSESSMENT AND MANAGEMENT OF THE NEONATE

Immediately after birth, advanced midwives should perform a physical examination to a neonate in order to identify high risk neonates and obtain baseline data. If necessary, advanced midwives should be able to do a nasogastric intubation, insert an intravenous infusion through a scalp, peripheral or umbilical vein (Pillitteri, 2002: 22). Table 5.34 indicates how often respondent perform these procedures.

TABLE 5.37: INTERVENTIONS BY ADVANCED MIDWIVES N =69

n=13				n=56		
% Group A				% Group A		
Procedures	Always	Some-times	Never	Always	Some-times	Never
Physical examination	13			51	3	2
Nasogastric intubation	2	6	5	16	20	20
Ivi infusion without Dr's prescription	5	3	5	18	25	13
Drawing blood without Dr's prescription	1	8	4	7	25	24

All respondents from Group A and 51 from Group B always performed physical assessment of the neonate. See table 5.34.

High percentages from both groups (46.15% and 35.71%) respectively; showed that nasogastric intubation is being done sometimes. This might be because the procedure is mostly done to ill neonates and thus is not an intervention needed by all neonates (Harrison, 2002: 70).

With regard to the insertion of scalp, peripheral or umbilical infusions, five and 18 respondents from both groups indicated that they do not to perform these interventions. In Group B there were 25 indicating that they perform the procedure. Not all neonates need these kinds of interventions that might increase the mortality statistics. Advanced midwives are expected to act as a second level of protection against over-hydration or under-hydration of neonates and therefore should master this procedure (Pillitteri, 2002: 1104).

Eight and 25 of the respondents reported that they were drawing blood from neonates without doctor's prescription.

5.10 SPECIALIZED ACTIONS

After qualifying as an advanced midwife, a lot of responsibilities are expected from this birth attendant. They are expected to facilitate the improvement of emergency obstetric care (S.A. National Department of Health, Essential Steps in Managing Obstetric Emergencies [ESMOE], n.d: 1). They should act as consultant, source of information and knowledge, a unit manager, a skilful person and a liaison between her subordinates and tertiary levels (Fichardt, 1996:13). Table 5.35 illustrates participants' responses with regard to performing and identifying some midwifery procedures and conditions.

TABLE 5.38: ADVANCED MIDWIFERY' SPECIALIZED ACTIONS N=69

n=13				n=56		
% Group A				%Group A		
Procedures	Always	Some-times	Never	Always	Some-times	Never
Speculum examination in case of vaginal examination	8	2	3	36	15	5
Carry out fetal scalp pH			13	1	3	49
Interpret and treat fetal scalp pH			13	1	6	46
Diagnose placenta abruption			13	1	4	48
Treat placenta abruption	6	3	3	33	10	11
Identify threatening rupture of the uterus	10	2		42	13	
Treat threatening rupture of the uterus	5	5	2	27	20	6
Perform external version	0	5	8	2	24	30
Assist at c/section	0	2	11	10	11	34
Perform c/section if a doctor is not available			13		1	54
Perform symphysiotomy			13		1	55

According to the SANC Rules and Regulations (R2488 of October 1990, as amended), "An internal examination shall not be carried out by the registered midwife in the case of vaginal haemorrhage". Contradicting is the fact that eight and 36 respondents (40%) seems not to know this regulation or even act upon its stipulations.

All respondents from Group A reported that they do not perform fetal scalp pH, while from Group B, the 49 respondents indicated that they do not perform this procedure. In the case of fetal distress, the pH of the blood is estimated through blood sampling

test from the fetal scalp (fetal scalp pH assessment). If the blood pH is below 7, the brain cells may perish or blood become acidotic (Pillitteri, 2002:504). Therefore the reason of respondents for not doing this procedure might be the perforation made during this procedure. The use of this procedure is discouraged because of the high incidence of HIV + patients with the possibility of mother-to-child-transmission of the HIV (Fraser, Cooper & Nolte, and 2010: 480).

All and 48 respondents from both groups respectively denoted that they do not diagnose and manage placenta abruption. It is important that advanced midwives are able to diagnose placenta abruption because it may cause death of both the woman and the fetus if not diagnosed and managed well (Cronje & Grobler, 2009: 202).

Ten and 42 respondents indicated that they always manage to identify and manage a threatening rupture of the uterus. Davidson et al., (2008:607) assert that the risk of maternal and fetal morbidity and mortality is increased in the case of uterine rupture. Therefore it is crucial that advanced midwives be able to diagnose and treat this condition.

External version can be done at least at 36 weeks of pregnancy while there is still enough amniotic fluid that makes turning the fetus easy (Pillitteri, 2002:581). The majority, eight and 30 of respondents never perform this procedure. This might be because of the complications of this procedure, which entails things such as placenta abruption, premature rupture of membranes including knotting of the umbilical cord (Fraser et al., 2006: 553).

The majority, 11 and 34 of the respondents from both groups respectively, reported that, they are not performing nor assisting during the caesarean section procedures. This might because of the complications that may occur and need the assisted of another (second) doctor; should the operating one is unable to carry on with the procedure. The procedure is not covered in the scope of midwives. Nevertheless, it is crucial that an advanced midwife should be able to diagnose and identify condition that my need caesarean section births so as to inform or transfer such cases to well equipped medical institutions such as the hospital.

All respondents from Group A, and 54 from Group B; reported that they never perform the symphysiotomy. This might be due to the fact that the procedure is rarely performed in modern obstetrics, where risk factors such as cephalopelvic disproportion is being detected in time (De Kock & Van Der Walt (2004: 27-18).

5.10.1 RESUSCITATION

Resuscitation follows an organized process which specifies that the airway should be clear by removing any obstruction that might be the cause. Breathing should be initiated by giving oxygen in trying to improve circulation (Harrison, 2002: 172). Advanced midwives should be able to perform resuscitation in case of respiratory failure. Table 5.47 shows whether respondents are able to resuscitate a client and perform actions needed.

TABLE 5.39: RESUSCITATION N=69

n=13				n=56		
% Group A				% Group B		
Actions	Always	Some-times	Never	Always	Some-times	Never
Identify the cause	10	3		49	6	
Remove/treat the cause	10	3		47	8	
Ensure a clear airway	11	2		56		
Ventilate with face mask	10	3		55		1
Perform indotrachial intubation	2	6	5	13	21	21
Perform external heart massage	5	7	0	31	20	3
Insert umbilical catheter	2	6	5	16	25	15
Administer Sodium bicarbonate	6	2	5	18	25	13
Administer dextrose	9	1	3	22	33	1
Administer adrenaline	7	5	1	23	32	1

Respondents stated that they always follow the primary principles of resuscitation; ABC as indicated by the South African Saving Mothers: Essential Steps in the management of Common conditions associated with Maternal Mortality, (2007: 23). Respondents from both Groups, 10 and 55 from both Groups reported that they always use a face mask when resuscitating patients as emphasized by De Kock and Van Der Walt, (2004: 31-6).

Drugs used for resuscitation such as sodium bicarbonate, dextrose and adrenaline also scored a high percentage (46.15%) from Group A while in Group B lower percentage (38.46%), (69.23%) for Group A, (39.29%) for Group B and (53.85% and 41.07%) of respondents stated that they always administer these drugs in times of emergencies. Advanced midwives should be competent with regard to resuscitate so as to prevent cause death (De Kock & Van Der Walt, 2004: 31-7). Therefore it is important for advanced midwives to know how and when to use these drugs in an emergency.

5.10.2 POST PARTUM HAEMORRHAGE (PPH)

PPH is the most serious complication of the third stage of labour. The woman's life depends on the midwife's prompt and intelligent action after diagnosing (Fraser et al., 2010: 54). Table 5.37 indicates how often respondents identify, perform manual removal of the placenta, carry out bimanual compression and insert a central venous pressure catheter in trying to manage PPH.

TABLE 5.40: *POST PARTUM HAEMORRHAGE* (PPH) N= 69

N=13				N=56		
% Group A				% Group A		
Procedures	Always	Some-times	Never	Always	Some-times	Never
Identify	84.62	15.38		98.21	1.79	
Perform manual removal of the placenta	33.33	41.67	25.00	51.79	30.36	17.86
Carry out bimanual compression	8.33	58.33	33.33	21.43	53.57	25.00
Insert central venous pressure catheter (CVP)	0.00	0.00	100.	3.57	3.57	92.86

The majority, 11 and 55 of respondents from both groups respectively reported to always identify PPH. It is very crucial that an advanced midwife is able to manage PPH due to the fact that a number of women dying because of this condition is high (12.4%) in South Africa (S.A. National Department of Health: Saving Mothers, 2005-2007: 5).

Four respondents from Group A stated that they perform manual removal of the placenta while in Group B responses were high; 29, which reported to remove the placenta manually. A person carrying out this procedure should be competent due to the danger of rupturing the lower uterine segment (Fraser et al., 2010: 544). Therefore, advanced midwives should be careful and competent.

All and 52 respondents from both groups respectively, indicated that they never perform the CVP procedure. This gives the impression that the procedure is being performed by doctors as also suggested by Fraser, Cooper & Crawford, (2009: 643).

5.11 DRUGS

It is imperative that an advanced midwife should be equipped with knowledge of different drugs to be administered during pregnancy, intrapartum and pueperium. Table 5.38 designate whether advanced midwives do administer drugs to patients without a doctor's prescription.

TABLE 5.41: ADMINISTRATION OF DRUGS N=69

n=13				n=56		
Percentage group A				Percentage group A		
Administration	Always	Some-times	Never	Always	Some-times	Never
Pethidine	6	0	7	13	10	33
Neonatal narcan	9	4	0	41	13	2
Lignocain	10	3	0	52	3	1
Aldomet	6	7	0	31	10	15
Konakion	11	2	0	51	1	4

Most, seven and 33 of the respondents from both groups stated that they never administer pethidine to patients without the doctors' prescription. This might be due to the fact that the SANC Regulations Relating to the Keeping, Supplying, Administration or Prescribing of Medicines by Registered nurses (Government Notice No. R. 2418) allow midwives to prescribe unscheduled medicines like schedule 1-4 drugs.

The majority, nine and 41 of respondents confirmed that they always administer neonatal narcan without the doctors' prescription. Neonatal narcan is given to reverse pethidine or morphine if the mother has received them during the four hour period before birth as it may affect the respiration of the neonate (South African department of Health: Perinatal Education Programme, 2009: 23).

Ten and 52 respondents affirmed that they always administer Lignocain 1% without the doctor's prescription. This practice is in accordance with the scope of practice of the midwives (SANC Regulations: Scope of Practice. Government Notice No. R. 2598, as amended).

5.12 RESEARCH

Nursing research is a scientific investigation conducted to generate knowledge that will directly influence or improve clinical practice (Burns & Grove, 2009: 2). Therefore, it important for advanced midwives to improve their existing knowledge; by being involved in initiating, facilitating and coordinating research. Table 5.39 designates whether respondents are involved in research.

TABLE 5.42: RESPONSES REGARDING INVOLVEMENT IN RESEARCH N=69

Research	n=13			n=56		
	% Group A			% Group B		
	Always	Some-times	Never	Always	Some-times	Never
Initiate	0	4	9	8	12	34
Facilitate	2	1	10	8	17	30
Coordinate	0	5	8	6	11	36
Write	0	2	11	5	12	37
Evaluate	0	3	10	6	13	35
Collaborate with other team mates	4	4	5	20	9	26
Formulate community diagnosis	4	2	6	12	18	25
Assess: Growth rate	4	5	4	14	11	26
Birth rate	6	3	4	22	7	24
Maternal & child mortality	7	2	4	28	11	15
Facilitate quality control in practice	9	3	1	38	12	4

Table 5.39 shows that the majority of respondents from both groups do not initiate, facilitate, coordinate, write, or evaluate of research. This might be due to lack of interest in research. It is important that advanced midwives, in their daily practice incooperate research because through it, they could gather information that advances knowledge created in the past for solving problems of immediate concern (Songki & Kaist, 2009: Online).

Five respondents from Group A indicated that they sometimes assess the growth rate while in Group B 26 respondents reported that they never assess growth rate. Seven in Group A confirmed that they are always involved in maternal and child mortality and in Group B 28 respondents stated to be sometimes involved in such

assessment. Nine and 38 respondents from both groups respectfully confirmed that they always facilitate quality control in practice.

It is important that advanced midwives should have insight in birth and growth rates because they might advocate for the community they are serving with regard to the distribution of health. For example, high birth rates can cause stress on the government welfare and family programs to support a youthful population. On the other hand, low birth rates can put stress on the government to prove adequate senior welfare systems and also the stress on families to support the elders themselves (Birth Rate, 2008: Online).

5.13 ADMINISTRATION

Table 5.40: indicates how often an advanced midwife performs the administrative functions

TABLE: 5.43: ADMINISTRATIVE FUNCTIONS OF RESPONDENTS N=69

Administration functions	n=13			n=56		
	% Group A			% Group B		
	Always	Some-times	Never	Always	Some-times	Never
Unit management	7	6	0	27	28	1
Demonstrate leadership	11	2	0	47	9	
Staff-coordinate	10	3		46	9	
Staff-support	12	1		48	7	
Delegate tasks	12	1		51	5	
Write policies/protocol	3	8	2	16	31	9
Improve cost effectiveness	8	5	0	36	19	1
Council patients & staff	8	5	0	44	11	1
Have communication skills	12	1		55	1	

Seven and 27 of respondents from both Groups indicated that they always take part in unit management. Eleven and 47 respondents reported that they always demonstrated leadership function. Ten and 46 confirmed that they always coordinated staff. Twelve and 48 declared that they always supported staff. Twelve and 51 acknowledged that they always delegated tasks. The majority, eight and 16, reported that they sometimes wrote policies/ protocols.

Eight respondents from Group A and 36 from Group B indicated that they always improved cost effectiveness. Eight and 44 affirmed that they counseled patients and staff. The majority, 12 and 55 claimed that they have communication skills. Working closely with client/patients, the community and other health professionals, advanced midwives; requires leadership skills as these skills provide resources and information that support decisions (Francis, Bowman & Redgrave, [n.d]: Online).

5.14 AUTONOMOUS/INDEPENDENT PRACTICE

Advanced midwives should be autonomous practitioners, act as consultants, role models and referral agents. They thus have to practice independently. Table 5.41 illustrates whether respondents practice independently

TABLE 5.44: AUTONOMOUS/ INDEPENDENT PRACTICE N= *69*

Characteristics Of the Independent practitioner	Frequency Group A		%		Frequency Group B		%e	
	Yes	No	Yes	No	Yes	No	Yes	No
Acting as consultant	13	0	100	0.00	50	6	89.29	10.71
Acting as a role model	13		100		56		100	
Referring patients that cannot be handled	10	3	76.92	23.08	45	11	80.36	19.64
Practicing independently	10	3	76,92	23.08	43	13	76.79	23.21

Table 5.41 illustrates that all respondents from group A function as consultants as well as role models, while from Group B; 50 and 56 respondents did the same functions as in Group A. Ten and 45 respondents from both Groups correspondingly, reported that they refer high risk cases that they cannot manage in their setting to the next level of care. Ten and 43 respondents from Group A and B respectively, confirmed that the practice independently. This is good practice as respondents should function in accordance with the Guideline for Maternity Care in South Africa (2007: 9) which argues that early referral to the next level of care is essential for the provision of optimal care to all pregnant women in the district where birth attendants should be placed and utilized.

5.15 INFORMATION REGARDING RELATIONSHIP WITH COLLEAGUES.

Good and healthy relationships with colleagues are important in the workplace. Relationships should be based on respect for each other as this will ensure that health multidisciplinary team share same ideas that will benefit health consumers. On the other hand, bad relationships with colleagues can be distractive from doing the job well (Mckay, [n.d]: Online). Table 5.42 shows the responses of respondents with regard to the relationship with colleagues in the workplace.

TABLE 5.45: RELATIONSHIP WITH COLLEAGUES N=69

	n=13				n=56			
	Group A %				Group B %			
Colleagues Responses	Bad	Reasonable	Good	Excellent	Bad	Reasonable	Good	Excellent
Midwives		4	7	2		20	17	19
Supervisor	1	3	7	2	2	19	22	13
Doctors		8	3	2		22	21	13

Nine respondents from Group A and 36 from Group B stated that the relationship with colleagues is good and excellent. With regard to the relationship with supervisors, nine respondents from Group A and 35 from Group B claimed that is good and excellent. In reference to their relationship with doctors, eight respondents from Group A stated that the relationship is reasonable. This might be due to the fact of working closely together on daily basis. Furthermore, this might create a situation where doctors felt threatened by advanced midwives as they more or less do the same procedures like assisted births or intubations.

TABLES 5.46 RELATIONSHIP WITH COLLEAGUES IN THE WORKPLACE N=56

Group A n=13: frequency							Group B: frequency					
Responses	Strongly agree	Moderately agree	Agree	Disagree	Moderately disagree	Strongly disagree	Strongly agree	Moderately agree	Agree	Disagree	Moderately disagree	Strongly disagree
Advanced midwives do get support from colleagues	0	5	6	2	0	0	7	21	16	6	6	0
There is cooperation between advanced midwives and colleagues	1	5	6	1	0	0	7	19	21	5	4	0
Colleagues working with advanced midwives accepts changes easily	0	3	4	6	0	0	4	10	13	22	4	3
Advanced midwives are well recognized by colleagues	1	5	3	4	0	0	9	14	11	15	6	1
Advanced midwives lack confidence in	4	1	4	2	2	0	13	9	17	14	2	1

Group A n=13: frequency							Group B: frequency					
Responses	Strongly agree	Moderately agree	Agree	Disagree	Moderately disagree	Strongly disagree	Strongly agree	Moderately agree	Agree	Disagree	Moderately disagree	Strongly disagree
themselves due to: Lack of support												
Judgmental colleagues	5	0	6	2	0	0	19	5	18	12	1	1
Criticism by colleagues	5	0	6	1	1	0	19	6	17	13	0	1
Lack of opportunities to put skills into practice	5	1	6	0	0	1	14	15	16	9	0	2
Lack of role models	6	1	3	1	0	2	13	11	16	13	1	2
Advanced midwives are given chance to practice procedures they trained for.	0	4	4	4	0	1	8	20	11	7	3	7

Six (46.15%) of the respondents from Group A stated that they agree that they get support from colleagues, whereas in Group B 21 (37.5%) stated that they moderately agree that they get support from colleagues.

Regarding cooperation between respondents and colleague, there were six and 21 respondents from both groups in that order stating that they agree that there is cooperation between them and colleagues.

Most, six and 22 respondents from both Groups correspondingly reported that they disagree that colleagues working with advanced midwives accept changes easily.

The majority, five (38.46%) in Group A stated that they moderately agree that advanced midwives are well recognized by colleagues while in Group B the majority 15 (26.79%) said they disagree with the said statement.

From both Groups, four and 17 (30.77% and 30. 36%) of respondents, agree that advanced midwives lack confidence in themselves due to lack of support.

The majority, six and 19 (46.15% and 33.39%) from both Groups in that order reported that they agree that colleagues are judgmental. Most six and 19 (46.15% and 33.93%) also reported to agree that colleagues are criticizing them.
With regard to lack of opportunities to put skills into practice, the majority six and 16 (46.15% and 28.57%) from both Groups correspondingly said they agree.

The majority six (46.15) from Group A said they strongly agree that there is lack of role models for advanced midwives, while in Group B the majority 16(28.57%) said they agree with the statement.

From Group A, four (30.77%) of the respondents, agree that advanced midwives are given chance to practice procedures they trained for, while from Group B 20 (35.71%) reported that they moderately agree with the said statement.

Table 5.42 above demonstrated that the relationship between respondents and colleagues is not good and it is unfortunate for such association as advanced midwives are to work independently in the absence of doctors for the benefit of health consumers. They need to be supported in order to gain the confidence in order to provide quality care.

5.16 CONCLUSION

In this chapter the analysis of data obtained by means of a questionnaire was done. The responses were presented in tables, graphs and figures forms. The findings of the study, conclusions and recommendations will be discussed in chapter 6.

CHAPTER 6

CONCLUSION, RECOMMENDATIONS AND LIMITATIONS

6.1 INTRODUCTION

The data was presented and interpreted in chapter five. In this chapter, the summary of the findings, conclusion, limitations and recommendations for further studies will be described.

6.2 SUMMARY OF FINDINGS

The aim of the study was to describe the practice of advanced midwives. From the sixty nine respondents that participated, the majority, fifty six (81%) indicated that were not correctly placed and utilized while only thirteen (19%) of them stated to be correctly placed and utilized.

6.2.1 RESPONDENTS CORRECTLY PLACED AND UTILIZED

All 13 respondents who felt that they were correctly utilized worked in rural and Primary Health Care midwifery settings. Twelve (92%) indicated that they worked in midwifery and neonatal departments, and one (8%) acted as a consultant and a mentor for midwives, doctors and students.

Correctly placed and utilized advanced midwives indicated that they were competent in midwifery practice. They were able to do risk assessments, prioritize problems, assess progress of labour, manage complications and refer patients that need further intervention by other health care workers. They were confident about their theoretical knowledge and skills to practice as advanced midwives.

The relationship between advanced midwives and their colleagues revealed contradictory information. Although they mostly felt supported by their colleagues (85%), recognized as advanced midwives (69%), experienced cooperation from other health care workers (92%), they mentioned that their colleagues were judgemental (85%) and criticized them (85%). They expressed that they have opportunities to practice their skills and therefore felt correctly placed and utilized.

They also mentioned a lack of role models. The very reason for them to feel correctly placed and utilized, might be the reason why they experience a lack of role models as well as practicing their advanced skills. In South Africa, at the Primary Health Care centres doctors and specialist health care workers are few and the midwives themselves act as role models. In providing quality care to patients, they prevented complications by referring patients in time, and by doing so, they prevent the practice of their so-called advanced skills like assisted births and intubations.

Of great concern is the fact that none of those who were placed and utilized correctly, acted as a consultant or as a mentor to other midwives. They also indicated that they had never initiated research, facilitated or coordinated research. This might be due to the fact that research did not form a formal part of the curriculum for the advanced diploma programme, and most of respondents completed an advanced diploma in midwifery training.

For advanced midwives, these are competencies and responsibilities that form part of their advanced practice as independent practitioner. They should be competent and be able to assist with emergency procedures used to be done by doctors only (Fraser et al., 2010: 603). The lack of opportunities to practice their skills and competence might cause them to lose their self-confidence, which may result in few of them using these skills in cases of emergency.

6.2.2 RESPONDENTS NOT CORRECTLY PLACED AND UTILIZED

Fifty six (81%) of the respondents were not placed nor utilized correctly. They worked in urban Health Care settings where doctors were freely available. This might have a very negative effect on both the advanced midwife as well as the Health Care System. The advanced midwife looses her/his competencies as they need to practice what they were trained for in order to ensure that they stay competent. It may have a negative influence on midwifery practice as patients in areas (rural) where experts are needed are denied the care of an expert midwife.

It seemed that, even those midwives who claimed not to be placed or utilized correctly do perform most of the skills required as an advanced midwife (70%). Although they claimed that they have a lack of opportunities to practice their skills (80%). These contradictory results might be due to the fact that the advanced midwives felt that even if they do practice their skills, they wanted be given more opportunities to do so. They also stated that they were competent to practice independently, and that the skills and knowledge acquired during training was comprehensive enough to do so.

One should question the cost-effectiveness of the bursaries given by the South African Department of Health, if the trained advanced midwives are not placed and utilized correctly. On the other hand, expert midwives (advanced) are also needed in the urban areas as they can render quality midwifery care.

6.3 RECOMMENDATIONS

The researcher arrived at the following recommendations after completion of this study.

Nurse Academics and Advanced Midwifery Practitioners should publish research articles in other Health Sciences Journals to ensure that their competences as well as the scope of Practice of advanced midwives are made known to other Health Practitioners. This might ensure that they are recognized by their colleagues and given the opportunity to practice what they have trained for.

Institutional management should support and encourage weekly multidisciplinary meetings. In these meetings, advanced midwives equally, with other multidisciplinary team members should present case studies for discussion and contributions. This might be a strategy that will promote and intensify relationships and respect needed among colleagues.

The South African Nursing Council should consider after implementation of the Continuous Professional Development (CPD) that points should be allocated to advanced midwives if they voluntarily work for a two week period in a rural setting. In this way, they might remain competent because they can practice their skills as well as render the most needed quality health care to the community; simultaneously obtain the required CPD points.

Advanced midwives should initiate, facilitate and coordinate midwifery research. Research (scholarship of discovery) together with the scholarship of integration forms the backbone to evidence-based practice, contributing to quality patient/client care and should be encouraged.

A module on professional practice should be developed and be incorporated in advanced Midwifery Programmes. Research methodology is proposed to form part of all the new suggested Post Graduate diploma programmes. This might have a positive effect on the research skills as well as the attitude of all advanced midwives regarding research. Advanced midwives may then be involved in the Scholarship of discovery and they can use these skills to enhance clinical practice.

6.4 LIMITATION OF THE STUDY

The research was conducted among advanced midwives trained at the local university and the findings cannot be generalized to all trained advanced midwives.

Differences between graduate and diplomas students were not calculated in terms of placement and utilization. This might have an influence, especially regarding functions like research and consultations.

The research was done over a long period of time due to personal and health problems of the researcher, therefore; follow-up research might be needed to assess what the current placement and utilization of advanced midwives are.

6.5 CONCLUSION

In this chapter, the findings of the study were concluded. Recommendations were drawn regarding the practice of advanced midwives and the limitations were highlighted.

"Advanced Midwives are effective
in delivering good quality,
timely, holistic and comprehensive care
that is acceptable to patients/clients"

NATIONAL COUNCIL FOR THE PROFESSIONAL DEVELOPMENT OF NURSING AND MIDWIFERY, 2008: ONLINE

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ANNEXURE A

LETTER OF PERMISSION TO CONDUCT THE STUDY FROM THE ETHICS COMMITTEE OF THE FACULTY OF HEALTH SCIENCES OF THE UNIVERSITY OF THE FREE STATE

UNIVERSITEIT VAN DIE VRYSTAAT
UNIVERSITY OF THE FREE STATE
YUNIVESITHI YA FREISTATA

Direkteur: Fakulteitsadministrasie / Director: Faculty Administration
Fakulteit Gesondheidswetenskappe / Faculty of Health Sciences

Research Division
Internal Post Box G40
☎(051) 4052812
Fax nr (051) 4444359

E-mail address: gndkhs.md@mail.uovs.ac.za

Ms H Strauss

2008-10-30

MS NG LESIA
SCHOOL OF NURSING
UFS

Dear Ms Lesia

ETOVS NR 42/02
PROJECT TITLE: THE PRACTICE OF ADVANCED MIDWIVES.

- You are hereby kindly informed that at the meeting on 27 October 2008, the Ethics Committee approved the following:
- ***The project title changed to: "The description of the practice of advanced midwives.***
- ***Changes to the questionnaire***
- ***Approval by the biostatistitian***
- Committee guidance documents: Declaration of Helsinki, ICH, GCP and MRC Guidelines on Bio Medical Research. Clinical Trial Guidelines 2000 Department of Health RSA; Ethics in Health Research: Principles Structure and Processes Department of Health RSA 2004; Dept of Health: Guidelines for Good Practice in the Conduct of Clinical Trials with Human Participants in South Africa, Second Edition 2006; the Constitution of the Ethics Committee of the Faculty of Health Sciences and the Guidelines of the SA Medicines Control Council as well as Laws and Regulations with regard to the Control of Medicines.
- Any amendment, extension or other modifications to the protocol must be submitted to the Ethics Committee for approval.
- The Committee must be informed of any serious adverse event and/or termination of the study.
- A progress report should be submitted within one year of approval of long term studies and a final report at completion of both short term and long term studies.
- Kindly refer to the ETOVS reference number in correspondence to the Ethics Committee secretariat.

Yours faithfully

.....
PROF WH KRUGER
CHAIR: ETHICS COMMITTEE
Cc Dr L Roets, School of Nursing, UFS

339, Bloemfontein 9300,RSA ☎ (051) 405 2812 gndkhs.md@ufs.ac.za
Republiek van Suid-Afrika / Republic of South Africa

ANNEXURE B

LETTER OF PERMISSION TO PARTICIPANTS AND CONSENT FORM TO TAKE PART IN THE STUDY

CONSENT FORM

Dear Respondents

RE: STUDY “A DESCRIPTION OF THE PRACTICE OF ADVANCED MIDWIVES”.

RESEARCHER: MRS N.G. LESIA
I am a Masters student doing research on the placement, utilization and competency of Advanced Midwives who completed at the University of the Free State.

Although the study may not benefit you directly, it will help by providing information that may lead to improvement in competency, proper placement and utilization of advanced midwives that will result in quality health care in maternity.

The study procedure involves responding to a questionnaire which is to be answered and be sent back to the researcher within one week of receiving it. You are free to ask any questions about the study or about being a subject or respondent.

Mrs N.G. Lesia is the contact person and may be contacted at the following telephone numbers:
Cell: 0732620744
Home: (051) 4358208
Work: (051) 4019162

The study data will be coded so that it will not be linked to your name. Your identity will not be revealed while the study is being conducted or when the study is reported or published.

All the study data will be collected by the researcher, stored in a safe place and not shared with any other person without your permission.

Will you please assist me by answering all questions to the best of your ability.

Thank you.

Yours faithfully.

N.G. Lesia

I _____ have read this consent form and voluntarily consent to participate in this study.

_____ _____

SUBJECTS SIGNATURE DATE

I, Miss N.G. Lesia have explained this study in the above letter to the above subjects and have sought her understanding for informed consent.

_____ _____

RESEARCHER'S SIGNATURE DATE

ANNEXURE C

ENGLISH QUESTIONNAIRE

QUESTIONNAIRE

Make a cross(es) in the appropriate box(es)

For office use only

_____

Indicate your title

Mr	1
Mrs	2
Ms	3

[ ] 1

A. BIOGRAPHIC INFORMATION

1. How old are you? _____ years [ ][ ] 2 - 3

2. Gender

Male	1
Female	2

[ ] 4

3. What is your marital status

Single	1
Married	2
Divorced	3
Separated	4
Widowed	5
Living together	6

[ ] 5

4. Are you presently practicing?

Yes	1
No	2

[ ] 6

5. If yes, in which town/city in South Africa?

_____

_____

[ ][ ][ ] 7-9

If NOT practicing, please STOP answering the questionnaire and just post it back to me. If YES, CONTINUE with the questionnaire and then post it back please

6. Where do you practice/work presently?

Primary Health Care Centre	1		10
Community Health Care Centre	2		11
District Hospital	3		12
Regional Hospital	4		13
Tertiary/Academic Hospital	5		14
Private Hospital	6		15
Home confinement	7		16
Other, specify	8		17

7. What is your highest qualification?

Advanced Diploma	1		
Degree/Masters	2		18

8. In which year did you qualify as an Advanced Midwife?

_____ | | | 19 – 20

B INFORMATION REGARDING UTILIZATION AND PLACEMENT

9.1 Do you think you are correctly utilized[1]?

Yes	1		
No	2		21

9.2 If yes, why do you think so?

[1] Utilization: The appropriateness of the responsibilities given to an advanced midwife in a workplace

		22 – 23

9.3 If no, why do you think so?

		24 – 25

10.1 Are you correctly placed[2]?

Yes	1	
No	2	26

10.2 If no, why not?

		27 – 28

10.3 If yes, why do you think so?

		29 – 30

11.1 Do you think you are competent enough to function independently?

Yes	1	
No	2	31

11.2 If yes, why do you think so?

		32 – 33

[2] Placement: A process of allocating an advanced midwife to the workplace they have been trained for

11.3 If no, why do you think so?

_____ | | | 34 – 35

_____

C INFORMATION REGARDING THEORETICAL KNOWLEDGE

Indicate your choice (choices) with a cross(es) in the appropriate box(es) e.g.

	Reasonable	Good	Excellent
How good should nurses wound dressing technique be?	1	2	3 ✖

12. How comprehensive should the theoretical knowledge of an Advanced Midwife in your setting be regarding the following?

		Reasonabl	Good	Excellent	No		
12.1	Anatomy	1	2	3	4		36
12.2	Physiology	1	2	3	4		37
12.3	High risk patients:						
	PET/Eclampsia Hypertension	1	2	3	4		38
	Heart disease	1	2	3	4		39
	Diabetes Mellitus	1	2	3	4		40
	Anaemia	1	2	3	4		41
	Ante partum haemorrhage	1	2	3	4		42
	HIV/STD	1	2	3	4		43

	Medication, drugs and alcohol abuse	1	2	3	4		44

13. As an Advanced Midwife you are able to: [make a cross(es) in the appropriate box(es)]

		Always	Sometimes	Never		
13.1	Recognize patients problems	1	2	3		45
13.2	Prioritize patients problems	1	2	3		46
13.3	Solve patients problems unaided	1	2	3		47
13.4	Obtain help if you are unable to solve a Problem	1	2	3		48
13.5	Use a specific method to plan midwifery care	1	2	3		49

14. At which institution should Advanced Midwives be trained?

College	1
University	2
Other (specify)	3

[ ] 50

15. How long should the training period be?

One year	1
One and a half years (18 months)	2
Two years	3
More than two years	4

[ ] 51

16. Please motivate your answer

_____

_____ [ ][ ] 52 – 53

17. What theory should be included in the training as a whole that you think/feel was lacking in the course you did?

_____

_____ [ ][ ] 54 – 55

_____

_____ [ ][ ] 56 – 57

D CLINICAL SKILLS: ANTE NATAL

18. Do you perform the following actions:

	Always	Sometimes	Never

18.1	General physical examination	1	2	3		58
18.2	Vaginal examination	1	2	3		59
18.3	Bimanual examination	1	2	3		60
18.4	Pelvic assessment	1	2	3		61
18.5	Abdominal palpation	1	2	3		62
18.6	History taking	1	2	3		63
18.7	Formulate midwifery diagnosis	1	2	3		64
18.8	Do you draw a blood specimen without a doctor's prescription	1	2	3		65

18.9 Under which circumstances do you perform the actions mentioned in question 18 above?

_____ | | | 66 – 67

_____ | | | 68 - 69

		Always	Some-times	Never		
18.10	Do you put up an intravenous infusion without a doctor's prescription	1	2	3		70

18.11 Under which circumstances?

_____ | | | 71 – 72

18.12 How often do you assess fetal wellbeing and uterine activity by means of:

	Always	Some times	Never	

Non stress tests	1	2	3		73
Oxytocin tests	1	2	3		74
Ultrasound examination	1	2	3		75
Amniocentesis	1	2	3		76
Doppler	1	2	3		77
Biophysical profile	1	2	3		78

		Always	Some-times	Never		
18.13	Do you interpret and analyze antenatal fetal monitoring stips?	1	2	3		79

		Always	Some-times	Never		
18.14	Do you plan diets for specific needs in pregnant women?	1	2	3		80

19. Are you able to determine the inducibility of a patient?

Yes	1		
No	2		1

20. Do you induce patients yourself?

Yes	1		
No	2		2

21. If Yes, under which circumstances?

3 – 4

22. If “No” why not?

5 – 6

23. Other/additional remarks regarding antenatal care

7 – 8

E INTRAPARTUM

24.1 Do you do or perform the following procedures:

	Always	Some-times	Never		
Cardiotocograph:					9
Set up the monitor and interpret results	1	2	3		10
Apply scalp electrodes	1	2	3		11
Insert intran for monitoring contractions	1	2	3		12

Interpret data obtained	1	2	3		13
Identify problems	1	2	3		14
Treat uterine abnormalities	1	2	3		15
Treat featal heart pattern anomalies	1	2	3		16
Insert amnion infusion	1	2	3		17

24.2 Do you perform vaginal deliveries in the following cases:

	Always	Some-times	Never		
Breech presentation	1	2	3		18
Face presentation if the mentum is anterior	1	2	3		19
Persistent occipito posterior position	1	2	3		20
Multiple pregnancy	1	2	3		21

24.3 On the Partogram do you:

	Always	Some-times	Never		
Evaluate the progress	1	2	3		22
Identify causes of prolonged labour	1	2	3		23
Treat the causes	1	2	3		24

24.4 In the cases of prolonged 2nd stage of labour do you perform:

	Always	Some-	Never		

		times		
A forceps delivery (low forceps)	1	2	3	25
Vacuum extraction	1	2	3	26

24.5 Under which circumstances to you perform procedures stated in 24.4?

27 – 28

25. Do you council patients regarding the following:

25.1 Alternative methods of pain relief

Yes	1	
No	2	29

25.2 Alternative positions during labor

Yes	1	
No	2	30

25.3 Mother-child bonding

Yes	1	
No	2	31

25.4 Breastfeeding

Yes	1	
No	2	32

F POSTNATAL

		Always	Some-times	Never		
26.1	Do you evaluate the uterus for involution	1	2	3		33
26.2	Do you treat perineal infection	1	2	3		34
26.3	Do you determine hydration status in cases of PpH and treat it (postpartum haemorrhage	1	2	3		35
26.4	Do you treat engorged breasts	1	2	3		36

26.5 Do you audit records on discharge e.g. partogram

Yes	1	
No	2	37

26.6 If “No” why not?

_____ | | | 38 – 39

_____

27. Additional remarks regarding postnatal

_____ | | | 40 – 41

_____

G NEONATAL CARE

28.1 Are you able to identify the following high risk neonates:

	Always	Some-times	Never		
Sick neonates	1	2	3		42
Congenital abnormalities	1	2	3		43
Premature neonates	1	2	3		44
Neonate with respiratory distress	1	2	3		45

Neonate with jaundice	1	2	3		46

	Always	Some-times	Never		
Neonate with hypothermia	1	2	3		47
Neonate with potential or actual HIV(+) positive results	1	2	3		48
Small-for-dates neonate	1	2	3		49

28.2 Do you perform the following actions:

	Always	Some-times	Never		
Thorough physical assessment of the neonate	1	2	3		50

Under which circumstances?

_____ | | | 51 – 52

_____

	Always	Some-times	Never		
28.3 Are u able to perform intubation without a doctor's aid?	1	2	3		53

Under which circumstances?

_____ | | | 54 – 55

_____

	Always	Some-times	Never

28.4	Do you commence a scalp, peripheral or umbilical infusion without doctor's prescription?	1	2	3	56

Under which circumstances?

_____ 57 – 58

_____

		Always	Some-times	Never	
28.5	Do you draw blood without a doctor's prescription?	1	2	3	59

Under which circumstances?

_____ 60

_____

28.6 After knowing the blood/results:

	Always	Some-times	Never	
Do you evaluate the neonate's condition	1	2	3	61
Do you treat the neonate	1	2	3	62

If never, why not?

_____ 63

_____

H ADVANCED MIDWIFERY ACTIONS

29. As an Advanced Midwife are you able to perform or identify the following actions or identify the following conditions:

		Always	Some-times	Never
29.1	Speculum examination in cases of			

vaginal haemorrhage	1	2	3		64

29.2 Fetal scalp pH assessment

	Always	Some-times	Never		
Carry out the procedure	1	2	3		65
Interpret the results	1	2	3		66
Treat	1	2	3		67

29.3 Placenta abruption

	Always	Sometimes	Never		
Diagnose	1	2	3		68
Treat	1	2	3		69

29.4 Threatening rupture of the uterus

	Always	Sometimes	Never		
Identify	1	2	3		70
Treat	1	2	3		71

		Always	Sometimes	Never		
29.5	Perform an external version	1	2	3		72

29.6 Caesarian section:

	Always	Some-times	Never		
Assist the doctor	1	2	3		73
Perform a caesarian section if a doctor is not available	1	2	3		74

	Always	Some	Never		

		s	-times			
29.7	Perform a symphysiotomy	1	2	3		75

29.8 Resuscitation:

	Always	Some-times	Never		
Identify the cause	1	2	3		76
Remove/treat the cause	1	2	3		77
Ensure a clear airway	1	2	3		78
Ventilate with face mask	1	2	3		79
Perform endotrached intubation	1	2	3		80
Perform external heart massage	1	2	3		1
Insert umbilical catheter	1	2	3		2
Administer sodium bicarbonate	1	2	3		3

	Always	Some-times	Never		
Administer dextrose	1	2	3		4
Administer adrenaline	1	2	3		5

29.9 Postpartum haemorrhage:

	Always	Some-times	Never		
Identify	1	2	3		6
Perform manual removal of the placenta	1	2	3		7
Carry out bimanual compression	1	2	3		8
Insert a central venous pressure catheter	1	2	3		9

I DRUGS

30. Do you administer the following drugs without doctor's prescription:

		Always	Some-times	Never		
30.1	Analgesics e.g. Pethidine	1	2	3		10

If never, why not?

_____ | | 11 – 12

_____

		Always	Some-times	Never		
30.2	Narcotic antagonists e.g. neonatal narcan	1	2	3		13

If never, why not?

_____ | | 14 – 15

_____

		Always	Some-times	Never		
30.3	Local analgesics e.e. Lignocoin 1% or 2%	1	2	3		16

If never, why not?

_____ | | 17 – 18

_____

		Always	Some-times	Never		

30.4	Anti-hypertensive drugs e.g. Aldomet	1	2	3		19

If never, why not?

_____ | | 20 – 21

_____ | |

		Always	Some-times	Never		
30.5	Coagulants e.g. Konakion	1	2	3		22

If never, why not?

_____ | | 23 – 24

_____ | |

J RESEARCH

31. Do you do the following concerning research:

31.1 Research

	Always	Some-times	Never		
Initiate research	1	2	3		25
Facilitate research	1	2	3		26
Coordinate research	1	2	3		27

If no, why not?

_____ | | 28 – 29

_____ | |

31.2 Research

		Always	Sometimes	Never		
	Write	1	2	3		30
	Evaluate	1	2	3		31

		Always	Sometimes	Never		
31.3	Collaborate with other team mates	1	2	3		32

		Always	Some-times	Never		
31.4	Formulate community diagnosis	1	2	3		33

31.5 Assess the socio graphic characteristics of the population:

		Always	Some-times	Never		
	Growth rate	1	2	3		34
	Birth rate	1	2	3		35
	Maternal and child mortality (death) figure	1	2	3		36

		Always	Some-times	Never		
31.6	Do you facilitate quality control in practice	1	2	3		37

K ADMINISTRATION

32. Do you perform the following administrative functions?

		Always	Some-times	Never		
32.1	Unit management	1	2	3		38
32.2	Demonstrate leadership	1	2	3		39
32.3	Staff – coordinate	1	2	3		40
	Staff – support	1	2	3		41
32.4	Delegate tasks	1	2	3		42
32.5	Write policies/protocols	1	2	3		43
32.6	Improve cost effectiveness	1	2	3		44
32.7	Council patients and staff	1	2	3		45
32.8	Have communication skills	1	2	3		46

L AUTONOMOUS/INDEPENDENT PRACTICE

33. Do you act as a consultant?

Yes	1	
No	2	47

If no, why not?

_____ 48 – 49

_____

34. Do you act as a role model?

Yes	1	
No	2	50

35. Do you refer patients that you cannot handle directly to a specialists?

Yes	1	
No	2	51

If no, why not?

_____ 52 – 53

_____

36. Are you practicing independently?

Yes	1	
No	2	54

If no, why not?

_____ 55 – 56

_____

37. Additions/remarks regarding autonomous practices

_____ 57 – 58

_____

M INFORMATION REGARDING RELATIONSHIPS WITH COLLEAGUES

38.1 How is your relationship with the following colleagues[3]:

	Bad	Reasonable	Good	Excellent	
Midwives	1	2	3	4	59
Supervisors	1	2	3	4	60
Doctors	1	2	3	4	61

Indicate your experience regarding the following:

[3] Colleagues: Midwives, supervisors and doctors that advanced midwives interact with in a work environment

		Strongly Agree	Moderately Agree	Agree	Disagree	Moderately Disagree	Strongly Disagree		
38.2	Advanced midwives do get support from colleagues								62
38.3	There is cooperation between Advanced midwives & colleagues								63
38.4	Colleagues working with Advanced midwives accepts change easily								64
38.5	Advanced midwives are well recognized by colleagues								65
38.6	Advanced midwives lack confidence in themselves due to:								
	Lack of support								66
	Judgemental colleagues								67
	Criticism by colleagues								68
	Lack of opportunities to put skills into practice								69
	Lack of role models								70
38.7	Advanced midwives are given the chance to practice procedures they trained for								71

Thank you very much for your cooperation

ANNEXURE D

VRAELYS

VRAELYS

Maak ‘n kruis(e) (X) in die toepaslike blok(kie)

Slegs vir kantoorgebruik

Dui u titel aan

Mnr	1	
Mev	2	
Mej	3	1

A. BIOGRAFIESE INLIGTING

1. Wat is u ouderdom? _____ jaar 2 - 3

2. Geslag

Manlik	1	
Vroulik	2	4

3. Wat is u huwelikstatus?

Enkel	1	
Getroud	2	
Geskei	3	
Vervreem	4	
Weduwee	5	
Bly saam	6	5

4. Praktiseer u tans?

Ja	1	
Nee	2	6

5. Indien Ja, in watter stad/dorp in Suid-Afrika?

_____ 7-9

_____

XXX

Indien u nie praktiseer nie, moet asseblief nie die vraelys voltooi nie, stuur dit net asseblief terug aan my. Indien u praktiseer, voltooi asseblief die res van die vraelys

6. Waar werk/praktiseer u huidiglik?

Primêre Gesondheidsorgsentrum	1		10
Gemeenskapsgesondheidsorgsentrum	2		11
Distrik Hospitaal	3		12
Provinsiale Hospitaal	4		13
Tersiêre/Akademiese Hospitaal	5		14
Privaat Hospitaal	6		15
Tuisbevallings	7		16
Ander (spesifiseer)	8		17

7. Wat is u hoogste kwalifikasie?

Gevorderde Diploma	1		
Graad/Meestersgraad	2		18

8. Gedurende watter jaar het u as gevorderde vroedvrou gekwalifiseer?

_____ | | | 19 – 20

B INLIGTING OMTRENT DIE WYSE WAAROP U AANGEWEND WORD BINNE WERKSVERBAND

9.1 Dink u u word korrek aangewend?

Ja	1		
Nee	2		21

9.2 Indien Ja, waarom dink u so?

_____

		22 – 23

9.3 Indien Nee, waarom dink u so?

		24 – 25

10.1 Is u korrek geplaas[4]?

Ja	1	
Nee	2	26

10.2 Indien Nee, waarom?

		27 – 28

10.3 Indien Ja, waarom?

		29 – 30

11.1 Dink u u is vaardig genoeg om onafhanklik te funksioneer?

Ja	1	
Nee	2	31

11.2 Indien Ja, waarom dink u so?

		32 – 33

11.3 Indien Nee, waarom dink u so?

		34 – 35

[4] Plasing: ‘n Proses waardeur ‘n gevorderde vroedvrou toegesê word aan ‘n werksplek in ooreenstemming met waaroor sy/hy opgelei is

C INLIGTING AANGAANDE OPLEIDING, TEORETIESE KENNIS

Dui u keuse(s) met ‘n kruis(e) (X) in die toepaslike blok(kie) aan byvoorbeeld:

	Redelik	Goed	Uitstekend
Hoe vaardig moet ‘n verpleegkundige in wondsorg wees?	1	2	3 ✖

12. Hoe omvattend moet die teoretiese kennis van ‘n gevorderde vroedvrou in u afdeling wees rakende die volgende:

		Redelik	Goed	Uitstekend	Geen		
12.1	Anatomie	1	2	3	4		36
12.2	Fisiologie	1	2	3	4		37
12.3	Hoë risiko pasiënte						
	PET/Eklampsie Hipertensie	1	2	3	4		38
	Hart toestande	1	2	3	4		39
	Diabetes Mellitus	1	2	3	4		40
	Anemie	1	2	3	4		41
	Ante partum bloeding	1	2	3	4		42
	HIV/STD	1	2	3	4		43
	Medikasie, dwelms en alkohol misbruik	1	2	3	4		44

13. As ‘n gevorderde vroedvrou is u in staat om:

	Altyd	Soms	Noo	

				it	
13.1	Pasiënte se probleme te herken	1	2	3	45
13.2	Pasiënte se probleme te prioritiseer	1	2	3	46
13.3	Pasiënte se probleme onafhanklik op te los	1	2	3	47
13.4	Hulp te bekom indien u nie ‘n probleem kan oplos nie	1	2	3	48
13.5	‘n Spesifieke wetenskaplike metode te gebruik om verloskundige sorg te beplan	1	2	3	49

14. By watter instansie moet gevorderde vroedvroue opgeleding ontvang?

Kollege	1	
Universiteit	2	
Ander (spesifiseer)	3	50

15. Hoe lank moet die opleiding duur?

Een jaar	1	
Een en ‘n halwe jaar (18 maande)	2	
Twee jaar	3	
Langer as twee jaar	4	51

16. Motiveer u antwoord

_____ 52 – 53

_____

17. Watter teorie moet by die opleiding in geheel ingesluit word wat u in u dink/voel ‘n leemte in u eie opleiding was?

		54 – 55
		56 – 57

D KLINIESE VAARDIGHEDE: VOORGEBOORTE (ANTENATAAL)

18. Voer u die volgende aksies uit?

		Altyd	Soms	Nooit	
18.1	Algemene fisieke ondersoek	1	2	3	58
18.2	Vaginale ondersoek	1	2	3	59
18.3	Bimanuele ondersoek	1	2	3	60
18.4	Bekkenskatting	1	2	3	61
18.5	Abdominale palpasie	1	2	3	62
18.6	Geskiedenisvasstelling	1	2	3	63
18.7	Formulering van verloskundige diagnose	1	2	3	64
18.8	Verkry u ‘n bloedmonster sonder ‘n doktersvoorskrif?	1	2	3	65

18.9 Onder watter omstandighede voer u die aksies genoem in vraag 18 uit?

	66 – 67
	68 - 69

		Altyd	Soms	Nooit	
18.10	Stel jy 'n intraveneuse infusie in werking sonder 'n doktersvoorskrif?	1	2	3	70

18.11 Onder watter omstandighede?

_____ 71 – 72

18.12 Hoe dikwels bepaal jy fetale welsyn en uteriene aktiwiteit deur middel van:

	Altyd	Soms	Nooit	
Non stres toets	1	2	3	73
Oksitosientoets	1	2	3	74
Sonar ondersoek	1	2	3	75
Amniosintese	1	2	3	76
Doppler	1	2	3	77
Biofisiese profiel	1	2	3	78

		Altyd	Soms	Nooit	
18.13	Interpreteer en analiseer jy VFM strokies?	1	2	3	79

		Altyd	Soms	Nooit	
18.14	Beplan jy diëte vir spesiale behoeftes by swanger vroue?	1	2	3	80

19. Kan jy bepaal of ‘n pasiënt geïnduseer kan word?

Ja	1
Nee	2

[ ] 1

20. Induseer jy self pasiënte?

Ja	1
Nee	2

[ ] 2

21. Indien Ja, onder watter omstandighede?

_____

_____

[ ][ ] 3 – 4

22. Indien Nee, hoekom nie?

_____

_____

[ ][ ] 5 – 6

23. Ander/Addisionele opmerkings aangaande voorgeboorte sorg

_____

_____

[ ][ ] 7 – 8

E INTRAPARTUM

24.1 Voer jy die volgende prosedure uit?

	Altyd	Soms	Nooit	
Kardiotokografie				[ ] 9
Stel die monitor op en interpreteer resultate	1	2	3	[ ] 10
Stel ‘n kopvelektrode in werking	1	2	3	[ ] 11
Plaas ‘n intran in werking om kontraksies te monitor	1	2	3	[ ] 12
Interpreteer inligting verkry	1	2	3	[ ] 13

Identifiseer probleme	1	2	3		14
Behandel utrine abnormaliteite	1	2	3		15
Behandel fetale hartpatroon abnormaliteite	1	2	3		16
Stel ‘n amnio infusie in werking	1	2	3		17

24.2 Hanteer jy vaginale geboortes in die volgende gevalle

	Altyd	Soms	Nooit		
Stuitligging	1	2	3		18
Gesigspresentasie indien die mentum anterior	1	2	3		19
Blywende oksipito posterior posisie	1	2	3		20
Meervoudige swangerskap	1	2	3		21

24.3 Ten opsigte van die partogram, doen jy die volgende:

	Altyd	Soms	Nooit		
Evalueer die vordering	1	2	3		22
Identifiseer oorsake van verlengde kraam	1	2	3		23
Behandel die oorsake	1	2	3		24

24.4 In die geval van ‘n verlengde 2de stadium van kraam – doen jy ‘n:

	Altyd	Soms	Nooit		
Tangverlossing (uitgangstang)	1	2	3		25
Suierverlossing	1	2	3		26

24.5 Onder watter omstandighede voer u die prosedures uit soos genoem in 24.4

					27 – 28

25. Doen jy berading met pasiënte rakende die volgende:

25.1 Alternatiewe metodes vir pynverligting?

Ja	1	
Nee	2	29

25.2 Alternatiewe posisies vir kraam

Ja	1	
Nee	2	30

25.3 “Bonding” tussen moeder en kind?

Ja	1	
Nee	2	31

25.4 Borsvoeding

Ja	1	
Nee	2	32

F NAGEBOORTE (POSTNATAAL)

		Altyd	Soms	Nooit	
26.1	Evalueer jy die uterus vir involusie?	1	2	3	33
26.2	Behandel jy perineale infeksie?	1	2	3	34
26.3	Is jy in staat om postpartum bloeding te diagnoseer en te behandel?	1	2	3	35
26.4	Behandel jy gestude borste?	1	2	3	36

26.5 Doen jy ‘n oudit van byvoorbeeld die partogram wanneer ‘n pasiënt ontslaan word:

Ja	1	

Nee	2		37

26.6 Indien Nee, hoekom nie?

_____ | | 38 – 39

_____

27. Addisionele opmerking rakende postnataal

_____ | | 40 – 41

_____

G NEONATALE SORG

28.1 Is jy in staat om die volgende hoë risiko neonate te identifiseer:

	Altyd	Soms	Nooit		
Siek neonate	1	2	3		42
Kongenitale afwykings	1	2	3		43
Premature neonate	1	2	3		44
Neonaat met respiratoriese nood	1	2	3		45
Neonaat met geelsug	1	2	3		46

	Altyd	Soms	Nooit		
Neonaat met hipotermie	1	2	3		47
Neonaat met potensiële of werklike HIV (+) status	1	2	3		48
Klein-vir-datum neonate	1	2	3		49

28.2 Voer jy die volgende aksies uit?

	Altyd	Soms	Nooit	
_____				_____

	Deeglike fisieke ondersoek by die neonaat	1	2	3	50

Onder watter omstandighede?

_____ 51 – 52

_____

		Altyd	Soms	Nooit	
28.3	Is jy in staat om 'n neonaat te intubeer sonder 'n dokter se toestemming?	1	2	3	53

Onder watter omstandighede?

_____ 54 – 55

_____

		Altyd	Soms	Nooit	
28.4	Is jy in staat om 'n kopvel-, perifêre of umbilikale intraveneuese infusie sonder die dokter se toestemming te begin?	1	2	3	56

Onder watter omstandighede?

_____ 57 – 58

_____

		Altyd	Soms	Nooit	
28.5	Verkry jy 'n bloedmonster sonder 'n dokter se toestemming?	1	2	3	59

Onder watter omstandighede?

_____ 60

_____

Nadat die bloeduitslae bekend is:

28.6

	Altyd	Soms	Nooit	
Evalueer jy die toestand van die neonaat?	1	2	3	61
Behandel jy die neonaat?	1	2	3	62

Indien nooit, waarom?

_____ 63

_____

H GEVORDERDE VROEDVROU AKSIES

29. As ‘n gevorderde vroedvrou is jy in staat om die volgende aksies uit te voer of toestande te identifiseer?

		Altyd	Soms	Nooit	
29.1	Spekulum ondersoek by vaginale bloeding	1	2	3	64

29.2 Fetale Kop pH bepaling

	Altyd	Soms	Nooit	
Die uitvoer van die prosedure	1	2	3	65
Interpreteer die uitslae	1	2	3	66

Behandel	1	2	3		67

29.3 Abruptio placenta

	Altyd	Soms	Nooit		
Diagnoseer	1	2	3		68
Behandel	1	2	3		69

29.4 Dreigende ruptuur van die uterus

	Altyd	Soms	Nooit		
Identifiseer	1	2	3		70
Behandel	1	2	3		71

		Altyd	Soms	Nooit		
29.5	Uitvoering van ‘n eksterne kering	1	2	3		72

29.6 Keisersnit

	Altyd	Soms	Nooit		
Assisteer die geneesheer	1	2	3		73
Uitvoering van ‘n keisersnit in die afwesigheid van ‘n geneesheer	1	2	3		74

		Altyd	Soms	Nooit		
29.7	Uitvoering van ‘n simfisiotomie	1	2	3		75

29.8 Resussitasie

	Altyd	Soms	Nooit		
Identifiseer die oorsaak	1	2	3		76

Verwyder/behandel die oorsaak	1	2	3		77
Verseker ‘n oop lugweg	1	2	3		78
Ventileer met gesigsmasker	1	2	3		79
	Altyd	Soms	Nooit		
Intubeer pasiënt	1	2	3		80
Pas eksterne hartmassering toe	1	2	3		1
Plaas ‘n umbilikale infusie in werking	1	2	3		2
Toedien van natrium	1	2	3		3
Toedien van dekstrose	1	2	3		4
Toedien van adrenalien	1	2	3		5

29.9 Postpartum bloeding

	Altyd	Soms	Nooit		
identifiseer	1	2	3		6
Voer ‘n manuele verwydering van die plasenta uit	1	2	3		7
Pas bimanuele drukking toe	1	2	3		8
Inplasing van ‘n sentraal veneuse druklyn	1	2	3		9

I MEDIKASIE

30. Dien jy die volgende medikasie sonder ‘n doktersvoorskrif toe?

		Altyd	Soms	Nooit		
30.1	Analgesie bv Pethidine	1	2	3		10

Indien Nooit, waarom?

_____ | | 11 – 12

_____

		Altyd	Soms	Nooit		
30.2	Narkotiese antagoniste bv Neonatale Narcan	1	2	3		13

Indien Nooit, waarom?

_____ | | 14 – 15

_____

		Altyd	Soms	Nooit		
30.3	Lokale analgesie (verdowing) bv Lignokaïen 1-2%	1	2	3		16

Indien Nooit, waarom?

_____ | | 17 – 18

_____

		Altyd	Soms	Nooit		
30.4	Anti-hypertensiewe medikasie bv Aldomet	1	2	3		19

Indien Nooit, waarom?

_____ | | 20 – 21

		Altyd	soms	Never		
30.5	Koagulante bv Konakion?	1	2	3		22

Indien Nooit, waarom?

_____ | | | 23 – 24

_____

J NAVORSING

31. Doen jy die volgende rakende navorsing?

31.1 Navorsing

	Altyd	Soms	Nooit		
Inisieer navorsing	1	2	3		25
Fasiliteer navorsing	1	2	3		26
Koördineer navorsing	1	2	3		27

Indien Nooit, waarom nie?

_____ | | | 28 – 29

_____

31.2 Navorsing

	Altyd	Soms	Nooit		
Skryf	1	2	3		30
Evalueer	1	2	3		31

		Altyd	Soms	Nooit		
31.3	Werk saam met ander spanlede?	1	2	3		32

	Altyd	Soms	Nooit	

31.4	Formuleer ‘n gemeenskapsdiagnose	1	2	3		33

31.5 Beraam die sosio-grafiese kenmerke van die populasie

	Altyd	Soms	Nooit		
Aanwas tempo	1	2	3		34
Geboortesyfer	1	2	3		35
“moederlike en kinder sterfte syfer	1	2	3		36

		Altyd	Soms	Nooit		
31.6	Fasiliteer jy kwaliteit kontrole in die praktyk?	1	2	3		37

K ADMINISTRASIE

32. Verrig jy die volgende administratiewe funksies?

		Altyd	Soms	Nooit		
32.1	Eenheidsbestuur	1	2	3		38
32.2	Toon leierskappe	1	2	3		39
32.3	Koördineer personeel	1	2	3		40
	Ondersteun personeel	1	2	3		41
32.4	Delegeer take	1	2	3		42
32.5	Opstel van beleide/protokolle	1	2	3		43
32.6	Verbeter koste-effektiwiteit	1	2	3		44
32.7	Doen berading van pasiënte en personeel	1	2	3		45
32.8	Beskik oor kommunikasievaardighede	1	2	3		46

L OUTONOME/ONAFHANKLIKE PRAKTYK

33. Tree jy as ‘n konsultant op?

Ja	1
Nee	2

47

Indien Nee, waarom nie?

_____

_____

48 – 49

34. Tree jy as ‘n rolmodel op?

Ja	1
Nee	2

50

35. Verwys jy pasiënte wat jy nie kan behandel nie direk na ‘n spesialis?

Ja	1
Nee	2

51

Indien Nee, waarom nie?

_____

_____

52 – 53

36. Praktiseer jy onafhanklik?

Ja	1
Nee	2

54

Indien Nee, waarom nie?

_____

_____

55 – 56

37. Bykomende opmerkings oor onafhanklike praktisering

_____

_____

57 – 58

M INLIGTING RAKENDE KOLLEGIALE VERHOUDINGS

38.1 Hoe is jou verhouding met die volgende kollegas[i]?

	Swak	Redelik	Goed	uitsteken d		
Vroedvroue	1	2	3	4		59
Toesighouers	1	2	3	4		60
Dokters	1	2	3	4		61

Dui u belewenis oor die volgende aan:

		Stem beslis saam	Stem geredelik saam	Stem saam	Stem nie saam	Stem geredelik nie	Stem beslis nie saam nie		
38.2	Gevorderde vroedvroue word deur kollegas ondersteun								62
38.3	Daar is samewerking tussen gevorderde vroedvroue en kollegas								63
38.4	Kollegas wat saam met gevorderde vroedvroue werk aanvaar maklik veranderinge								64
38.5	Gevorderde vroedvroue word deur kollegas erken								65
38.6	Gevorderde vroedvroue het nie selfvertroue nie as gevolg van:								
	Gebrek aan ondersteuning								66
	Veroordeling deur kollegas								67
	Kritiek deur kollegas								68
	Gebrek aan geleenthede om								

	hul vaardighede te kan toepas								69
	Gebrek aan rolmodelle								70
38.7	Gevorderde vroedvroue word die geleentheid gegee om die prosedures waarin hulle opgelei is, uit te voer								71

Dankie vir U samewerking.

[1] Kollegas: Vroedvroue, toesighouers en dokters waarmee gevorderde vroedvroue in ‘n werksomgewing mee saamwerk

ANNEXURE E

DECLARATION OF LANGUAGE EDITOR.

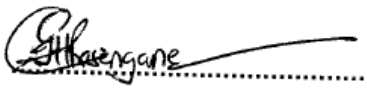
DECLARATION OF LANGUAGE EDITOR.

I Gardiner Rasengane confirm that I edited this study.

I am a graduate with BA (Ed.), BA (Hons), B.Ed (Hons), Post-Graduate Diploma in Education Management from the Universities of the North and Unisa respectively.

I have experience in working for Publishing Companies of which Editing of Manuscripts for publishing was part of my duties

Kind regards,



GARDINER RASENGANE