

Nurse Practitioners in South Australia

Report for the review of processes for
the implementation of the role



Government
of South Australia

SA Health

Government of South Australia Copyright

Published 2008

You may download, display, print and reproduce the material in this publication in unaltered format for work, study and training purposes subject to the inclusion of an acknowledgement of the source and reference to the title of the publication. Not for commercial use or sale. Apart from any use as permitted under the Copyright Act 1968, all other rights are reserved.

Authors: Ms Amanda Adrian - Amanda Adrian & Associates; & Professor Mary Chiarella - University of Sydney

Title: Review of the Implementation of the Role of NPs in South Australia

Publisher: Nursing & Midwifery Office, SA Health, Adelaide, S. Australia: SA Health, 2008.

Table of Contents

FOREWORD	6
RECOMMENDATIONS	7
Strategic clinical services planning	7
The authorisation process	8
Policy & regulatory requirements for prescribing and diagnostics	8
GLOSSARY OF TERMS AND ABBREVIATIONS	10
INTRODUCTION	11
METHODS USED FOR THE REVIEW	13
Ethics approval	13
Literature review – method	13
<i>Background to the literature review</i>	<i>13</i>
<i>Structure of the literature review</i>	<i>13</i>
<i>Method for the literature review</i>	<i>14</i>
<i>Data synthesis</i>	<i>15</i>
Interviews & focus groups of key stakeholders – method	15
Survey of NPs & nurses preparing to be authorised as NPs – method	16
LITERATURE REVIEW	18
Findings of the literature review	18
Narrative summary by barrier & facilitator domains	19
<i>NP role</i>	<i>19</i>
<i>Scope of practice</i>	<i>20</i>
<i>Legislation & authorisation process</i>	<i>23</i>
<i>Education</i>	<i>23</i>
<i>Organisational, strategic & clinical service planning</i>	<i>24</i>
<i>Collaboration</i>	<i>26</i>
<i>Marketing</i>	<i>27</i>
<i>Health consumers, clients, patients/carer factors</i>	<i>28</i>
<i>NP factors</i>	<i>28</i>
<i>Medical practitioner factors</i>	<i>29</i>
<i>Feasibility and sustainability</i>	<i>29</i>

Conclusions from the literature review	30
Summary of barriers and facilitators related to the implementation of the role of NPs identified in the literature review	35
SURVEY OF NPS & INTENDING NPS	45
Demographics	45
Coherence between role importance and role activity	48
Facilitators and barriers to the implementation of the role	50
Prescribing and ordering of investigations	52
Supervision, role support and service planning	53
Performance measures	55
FOCUS GROUPS & INTERVIEWS WITH KEY STAKEHOLDERS	56
Local initiatives of individuals or clinical teams	56
<i>Risks & weaknesses</i>	<i>57</i>
Sustainability of the role & succession planning	57
Lack of understanding of the role	57
Critical need for local support & nursing leadership	58
Workforce vacuum	58
<i>Support in the introduction of the NP role to the health service</i>	<i>58</i>
<i>Strengths & opportunities</i>	<i>59</i>
Passion & commitment of individuals	59
Increasing the capacity of multidisciplinary clinical teams	59
Provision of a recognised expert clinical pathway for nurses	59
State level strategic population health clinical service planning & associated health workforce strategy	59
The authorisation process	61
<i>Bands of practice to be identified for authorisation as a NP</i>	<i>62</i>
<i>The pathways, competency standards and procedural requirements for authorisation</i>	<i>62</i>
<i>Link of prescribing formulary to annual practising certificate</i>	<i>64</i>
<i>The links between authorisation and employment</i>	<i>65</i>
NP access to a medication formulary	65
<i>Generic formularies</i>	<i>66</i>
<i>Access to the general formulary</i>	<i>66</i>
Current national & state funding policy	67
Understanding the role, politics & ‘turf’	68

OVERCOMING THE BARRIERS & BUILDING ON THE FACILITATORS TO IMPLEMENTATION OF THE ROLE OF NPS IN SOUTH AUSTRALIA	70
1. Strategic clinical services planning	71
<i>Recommendations</i>	72
2. Regulatory requirements for authorisation	72
<i>Recommendations</i>	73
3. Policy & regulatory requirements for prescribing & diagnostics	73
<i>Recommendations</i>	75
CONCLUSION	76
REFERENCES	79
APPENDICES	83
Appendix A – Protocols for interviews & focus groups	84
Appendix B – Summary of interviews & focus groups conducted	86
Appendix C – Survey Instrument	89

Foreword

This review was commissioned by the Nursing and Midwifery Office of the South Australia Department of Health and was required specifically to examine the implementation of NP services in South Australia; to identify facilitators and barriers in relation to the implementation to date and, where appropriate, to make recommendations to facilitate the successful implementation of NPs into the South Australian health workforce in the future.

The review comprised a literature review including grey literature and synopses of previous reviews; a series of interviews and focus groups with key stakeholders; the administration of a questionnaire that is a replication of a study conducted in Ireland and NSW, although modified for South Australian conditions; and a positioning of the recommendations within the relevant policy documents.

The overarching principle that the review team used to develop the recommendations was that the health needs of the South Australian community are paramount when planning health services and identifying the health workforce to meet those needs. These requirements should be considered above all vested financial interests, political claims and 'turf' disputes.

The review team has found strong evidence of strategic support for the implementation of the role of NPs in South Australia and proposes that champions of the role should be centrally involved in the strategic service planning so that their vision can form part of mainstream health service planning.

The recommendations address the following key areas:

- > Strategic clinical services planning
- > Regulatory requirements for authorisation
- > Policy and regulatory requirements for prescribing and diagnostics.

Recommendations

The following recommendations are made based upon the evidence from the literature review, the survey conducted of NPs and nurses preparing for authorisation as NPs in South Australia, the interviews and focus groups held with stakeholders and the review of the policy and processes developed for the implementation of NPs in South Australia.

1. Strategic clinical services planning

- 1.1. The use of NPs must become an integral and central part of the clinical service planning and associated health workforce strategy that underpins the implementation of the goals outlined in South Australia's Health Care Plan 2007 – 2016 and other relevant strategic plans.
- 1.2. There is a clear description of the NP role for the purposes of clinical services planning. This identifies that NPs demonstrate expert clinical practice in:
 - Clinical assessment and surveillance
 - Clinical judgment and its implementation
 - Clinical diagnostics and therapeutics
 - Clinical evaluation and re-assessment,and that this expert level knowledge, skill and judgment is transferable across all clinical practice contexts.
- 1.3. A specific strategy is built into future clinical service development that includes education, orientation and ongoing clinical team building initiatives and support to enable clear understanding and integration of all roles within clinical teams.
- 1.4. A dedicated public information/communication strategy is developed and implemented to assist health consumers and health service providers to understand new models of care that may include innovative roles such as NPs, intensive care paramedics and physicians assistants.
- 1.5. To enable the ongoing provision of consistent, effective and safe care for people in the community, where any new clinical roles are to be introduced as part of the roll out of a clinical services plan, consideration must be given to the implementation strategy and the development of the infrastructure to ensure the effectiveness and sustainability of those roles.
- 1.6. The Department and Regions consider opportunities to utilise nurse practitioners in the development of these clinical services plans.

2. Regulatory requirements for authorisation

- 2.1 The authorisation of NPs by the nbsa is separated from any requirements relating to employment or authorisation relating to prescribing or ordering of diagnostic investigations.
- 2.2 The current banding requirements of the authorisation of NPs by the nbsa are reviewed with a view to (preferably) removing them altogether or (in the alternative) ensuring greater flexibility by downgrading their status to guidance only.
- 2.3 The nbsa adopt the Australian Nursing and Midwifery Council National Competency Standards for the NP (ANMC, 2005) as the basis for establishing the competency of nurses to be authorised as NPs in South Australia.
- 2.4 The initiatives being undertaken by the nbsa, in consultation with key stakeholders, to simplify and improve the accreditation processes are supported, as will be efforts to improve transparency of the authorisation process for NPs in line with the national agenda.
- 2.5 A clinically relevant Masters degree for NPs, with a requirement for specified experience in expert clinical practice, prescribing and diagnostics becomes the unequivocally preferred route for authorisation as NPs by the Nurses Board of South Australia, with a sunset provision on the current portfolio pathway of 1 July 2010.

3. Policy & regulatory requirements for prescribing & diagnostics

- 3.1 The policy governing prescribing by NPs is separated from the authorisation processes of the nbsa.
- 3.2 Authorised NPs are considered safe to prescribe medications from a proposed general formulary (state-wide) .
- 3.3 The position description for the role defined by the employer will determine the specific medications a NP may prescribe. The liability of a NP who practises outside their scope of practice is already articulated by the Codes of Professional Conduct and Ethics, National Competency Standards for the NP, the Decision Making Framework and professional conduct provisions of the regulatory legislation. In addition, clinical review, performance management and other clinical governance and risk management strategies are in place to ensure NPs practise within an appropriate scope of practice commensurate with their role, competence and professional obligations.
- 3.4 As a matter of equity, the South Australian Government works closely with the Australian Government to provide access to the PBS for NPs to enable the provision of appropriate medications to all people requiring them.
- 3.5 The policy governing the ordering of diagnostics by NPs is separated from the authorisation processes of the Nurses Board of South Australia.
- 3.6 Authorised NPs are considered safe to order diagnostics.

- 3.7. The position description for the role defined by the employer will determine the diagnostic investigations a NP may order. The liability of a NP who practises outside their scope of practice is already articulated by the Codes of Professional Conduct and Ethics, National Competency Standards for the NP, the Decision Making Framework and professional conduct provisions of the regulatory legislation. In addition, clinical review, performance management and other clinical governance and risk management strategies are in place to ensure NPs practise within an appropriate scope of practice commensurate with their role, competence and professional obligations.
- 3.8. As a matter of equity, the South Australian Government works closely with the Australian Government to provide access to the MBS by NPs to facilitate the provision of appropriate diagnostics for all the people requiring them.

Glossary of Terms & Abbreviations

ANMC	Australian Nursing and Midwifery Council
CNPI	Canadian NP Initiative
CNs	clinical nurses
CPD	continuing professional development
EAAC	nbsa Education and Accreditation Advisory Committee
GP	general practitioner
HCP	health care professionals
ICP	intensive care paramedic
IT	information technology
MBS	Medical Benefits Scheme
MDT	multidisciplinary team
MO	medical officer
Mx	management
nbsa	Nurses Board South Australia
NCPDNI	National Council for the Professional Development of Nursing and Midwifery (Ireland)
N3ET	National Nursing and Nursing Education Taskforce
NP	NP
NPC	NP appointed as a candidate
NPPC	a nurse preparing to be a NP candidate
NPPFASC	NP Prescribing Formulary Approval Sub-Committee
PA	physician's assistant
PBS	Pharmaceutical Benefits Scheme
WHO	World Health Organisation

Introduction

The Review of Processes for Implementation of the Role of NPs in South Australia (SA) was commissioned by South Australia Department of Health to evaluate the regulatory and policy infrastructure that was developed to enable the introduction of NPs into South Australia. It was recommended that NPs be introduced into the health workforce in South Australia as an outcome of the recommendations from the South Australia Nu Prac Project outlined in the NP Project Report (Department of Human Services, 1999). In that report the following important points were made that have been central to this review as they provide the backdrop for the recommendations and the context for some of the issues that have arisen during the project:

“NPs ... have much to offer and in particular can satisfy health service needs in settings where demands for such services are greater than the current availability of health professionals. The area of greatest potential contribution will be in situations where NPs...add value and/or take up or develop areas where existing work is not being done or where no health care services exist. The implementation of such a role however requires a strong framework incorporating government support, professional collaboration, public consultation and shared mutual goals.....

The Report identifies the importance of the establishment of appropriate processes of authorisation ... that are essential to ensure standards are in place to meet both public and professional expectations (Department of Human Services, 1999: iv-v).”

This current review was undertaken with the following project aims using methods suitable for the task at hand, seeking the views of the key stakeholders:

- > Reviewing the ‘framework’ in terms of the documentation supporting the implementation process and providing feedback on the effectiveness of the documentation in supporting NP positions being created in South Australia.
- > Reviewing and providing feedback on the effectiveness of the ‘legal framework’ underpinning the NP scope of practice.
- > Examining and comparing national and international trends and providing feedback on the effectiveness of the processes for implementation of the role of the NP within South Australia.
- > Providing feedback on the documentation used in supporting NP positions being created in South Australia.
- > Reviewing and providing feedback on the Policy Framework for NPs and applicants in gaining an Approved Prescribing Formulary and/or Licence to Supply Medication Authorisation to enable health consumers being prescribed with the medications they require; considering the Prescribing Framework process in terms of streamlined and efficient process and identifying the barriers in relation to the NP prescribing policy framework.

- > Evaluating the current effectiveness of the authorisation system in terms of consistency, efficiency and ensuring streamlined processes for nurses achieving authorisation as NPs.
- > Identifying barriers that impede the establishment of a robust NP workforce giving consideration to: attraction, recruitment and retention of nurses into NP roles; current funding arrangements and health service and the integration of the role within service delivery planning in the regions.
- > Exploring health services', clinicians', general practitioners' and community levels of understanding/acceptance of the NP role, giving consideration to methods of ongoing communication processes, mechanisms to educate the health service of the role and its benefits.
- > Identifying the impact of the processes supporting the implementation and establishment of NPs in South Australia and also their ability to practise to their full scope of the role.

There were three primary means used to achieve these aims. The first was to conduct a comprehensive literature review looking at the key issues relating to the main barriers and facilitators associated with the implementation of the NP role; a survey of NPs and NP candidates preparing for authorisation; and the conduct of a series of interviews and focus groups of key stakeholders. The latter two methods were designed to look at the issues from the perspective of the implementation of the role in South Australia specifically. The literature review was designed to canvass the evaluation evidence from literature in other jurisdictions in Australia as well as internationally. The findings from the literature review provide a valuable foundation for comparing and contrasting the experiences around the implementation of the role in South Australia.

Please note that there will be some inconsistencies within the report in relation to the award classifications used in South Australia as a number of the comments were made before the new career structure was introduced. In addition the terminology used in the literature review is reflective of the confusion inherent in any discussion about senior expert clinical nursing roles as the nomenclature varies significantly. Notwithstanding this confusion, the difficulties and constraints on the introduction and implementation of expert senior clinical nursing roles will be evident. The term used to describe the recipients of health care is also one that arouses passions within some health debates. However, there appears to be no consensus as to which of the terms is most preferred and thus within this text the terms patient, client, individual and consumer are all used interchangeably as they were introduced both within the literature and within the questionnaires and focus groups. Once again, regardless of the nomenclature, the issues for health care recipients in terms of equity of access to services are clear.

Methods Used for the Review

This Review used four methods order to meet the requirements for the project as follows:

- > A literature review
- > Interviews and focus groups of key stakeholders
- > A survey of NPs and nurses preparing to apply to be authorised as NPs
- > A review of relevant regulation and requirements in light of findings from the interviews, focus groups and the survey.

The techniques used for each of these are outlined in the following sections. Ethics approval was required for the Review.

Ethics Approval

The SA Health Human Research Ethics Committee required submission of an application for approval of the components of the Review. The survey instrument, a plain English statement and a consent form for participants in the focus groups were provided and approved by the Committee. The plain English statement and a consent form for participants are provided as Appendix A. The survey instrument is provided as Appendix C.

Literature Review - Method

Background to the Literature Review

A review of the key issues relating to the main barriers and facilitators associated with the implementation of the NP (NP) role was required as an integral part of this Review. This involved comparing and contrasting relevant national and international findings relating to NP implementation. Literature was sought that focused on the enablers (facilitators) and the difficulties (barriers) associated with implementation processes (for example leadership and support; restrictions and limitations to practice). Information on strategies to address the difficulties was also sought.

Structure of the Literature Review

To make efficient use of the time allocated to the literature review and to reduce duplication it was agreed that recent key documents where substantive reviews of the literature had already been performed would comprise the foundation of the literature review. These documents were the Nursing and Nursing Education Taskforce (N3ET) report, NPs in Australia (National Nursing and Nursing Education Taskforce, 2005) and a Report on the Evaluation of Nurse/Midwife Practitioner and Clinical Nurse/Midwife Consultant Roles (NSW Health, 2008) conducted for NSW Health. Another report from ACT Health published in 2007, although focused on an evaluation of the aged care NP also provided useful generic information on the barriers and facilitators associated with the implementation of the NP role (ACT Health, 2007). The main findings and themes from these documents were summarised and updated by relevant information from both peer-reviewed articles and grey literature (which includes national and international

government and non-government reports). Table 1 below sets out the main elements of the structure of this literature review.

Table 1 – Primary Elements of the Review

Overall literature review question	> A comprehensive and comparative literature review on the national and international trends including best practice of the implementation of the NP role.
Objectives	<ul style="list-style-type: none"> > Examine process of and issues associated with implementation of NP role in the health workforce (noting difficulties; challenges; barriers; facilitators; and disincentives) > Examine how the role of NP fits into existing nurse hierarchies and identify issues associated with scope of practice vis-à-vis hierarchies > Compare and contrast international and national policy frameworks
Keywords	<ul style="list-style-type: none"> > NP(s) + > Implementation; policy; policies; scope of practice; legalisation; authorisation; endorsement; registration; politics; policy framework* > Acceptability; acceptance; barrier*; facilitator*; funding model*; challenge*; disincentive*; inhibit*; enable*
Types of studies	<ul style="list-style-type: none"> > Not restricted by study design > Peer-reviewed journal articles > Grey literature (government and non-government policy documents and evaluation reports)
Dates for searching	> 2006-2008 (for documents not included in the documents used as basis. Other highly relevant articles were identified from reference lists. This may have included earlier published documents)
Eligible countries	> Australia, UK, Ireland, Canada (Some papers from USA and other countries may be relevant)
Settings	> All clinical and geographic regions (ie., rural, remote, urban)
Exclusion criteria	<ul style="list-style-type: none"> > Studies evaluating effectiveness of role; quality of care; equivalence of care; cost-effectiveness. > Studies focused on NPs or advanced practice nurses. > Studies in countries other than those stated above (also excludes much USA literature). > Studies not published in English

Method for the Literature Review

The aim of the literature review was to provide 'a comprehensive and comparative literature review on the national and international trends, including best practice of the implementation of the NP role'. This aim was operationalised in terms of extracting the key barriers and facilitators associated with the implementation of the NP role in the health workforce (this includes difficulties; enablers, challenges; incentives and disincentives). Particular attention was given to how the NP role fits into existing nurse hierarchies, identification of issues relating to scope of practice vis-à-vis hierarchies and

examination of international and national policy frameworks.

Summaries of the main findings relating to barriers and facilitators associated with implementing the NP role were obtained from recent evaluations of the NP role. This information was supplemented by recent relevant papers (2006-2008) identified from electronic literature searches using PubMed and Cinhal. These dates were chosen because the most recent evaluation (NSW Health, 2008) included literature up until 2006. Because of the limited time in which to undertake the review, searching and retrieval cannot claim to be exhaustive. Highly relevant documents identified from the reference lists which were published before 2007 were also retrieved. However, the included studies and documentary evidence yielded a consistency of themes through to saturation. It is therefore doubtful that key information was missed.

Only English language papers were sought due to lack of resources for translation. However, relevant examples of NP models of care in countries other than English language were obtained from a recent compendium of nurse-led primary health care examples compiled for the WHO (Chiarella, 2008).

Data synthesis

The key themes were extracted and narratively summarised from the main documents and published studies. A table of barriers and facilitators was constructed that was stratified by the main domains into which most of the barriers and facilitators could be classified (for example, education, legislation, organisational). Once papers ceased to contribute new knowledge (that is, there was a repetition in the barriers and facilitators) information was only included if it provided new or unique insights.

Interviews & focus groups of key stakeholders - method

Five days of interviews, meetings and focus groups were scheduled to obtain the views and opinions of the key stakeholders who are, and/or have been involved with the implementation of this role since its introduction, or have an interest in the implementation of this role in South Australia. This was intended to gather data and information to compare with the findings of the literature review and inform the findings and recommendations of this Review. This was a voluntary process and was conducted in a way that ensured the confidentiality of the information provided by any participants and commentators through any of the mechanisms used to collect this feedback was protected.

A summary of the participants in these meetings, interviews and focus groups were identified as part of the Request for Proposal and are listed in **Appendix D**.

Those who were invited to attend meetings, interviews and focus groups included:

- > NPs, NP candidates and other nurses working towards authorisation as NPs
- > The NP Prescribing Formulary Committee
- > Representatives of relevant nursing, medical and allied health regulatory authorities
- > Representatives of pertinent nursing, medical and allied health professional and industrial organisations
- > Representatives of educational providers with accredited courses for NPs
- > Senior health managers responsible for metropolitan, rural and remote health services
- > Senior Departmental officers responsible for workforce; nursing and midwifery, allied health, medical and public health services

- > Other significant personnel on key committees or with responsibility for relevant aspects of the regulatory and policy framework governing the introduction and continuation of NPs in the health workforce in South Australia.

The focus of the semi-structured meetings was to seek the participants' views on, and suggestions for improvements in relation to:

- > the policy framework generally, including the authorisation processes, the process for the creation of NP positions in health services and the documentation requirements for each of these;
- > the legal framework underpinning the NP role and scope of practice
- > the Policy Framework for NP/Applicants: To Gain an Approved Prescribing Formulary and/or Licence to Supply Medication Authorisation in supporting NPs being able to prescribe in South Australia;
- > the barriers to NPs being introduced into the health work force in South Australia; and
- > any improvements to the NP policy framework that may be needed to provide a more consistent, efficient and streamlined system for nurses to achieve the status of NP and health services introducing NP services.

All data and information collected, analysed and reported upon for the purposes of the review has been managed according to the National Statement on Ethical Conduct in Human Research (NHMRC, 2007). The proceedings of the interviews, focus groups or meetings were not recorded. Notes were taken by one of the project team from Amanda Adrian & Associates. The notes from focus groups and interviews remain the property of Amanda Adrian & Associates and will be kept at the premises of this organisation in NSW.

Where reports were provided to SA Health, the information was de-identified and aggregated for reporting purposes. In the cases where the information provided or a person's role is so unique that even anonymity would not disguise identity, this information was not provided, in the interests of maintaining confidentiality.

The information obtained from the review has been analysed and provided to the Department of Health in this Report with recommendations for improvement; and will not be used for any other purposes than for the review of the processes for implementation of NPs since the introduction of the role in South Australia.

It should be noted that it was clearly explained to all participants that they had the right to withdraw from the process at any time; or to elect not to answer specific questions. Each participant at the focus groups was requested to complete a consent form.

Survey of NPs & nurses preparing to be authorised as NPs - method

As with the data from the interviews and the focus groups, the responses to the survey remain the property of Amanda Adrian & Associates and will be kept at the premises of this organisation in NSW. Where reports were provided to SA Health, the information was de-identified and aggregated for reporting purposes. In the cases where the information provided or a person's role is so unique that even anonymity would not disguise identity, this information was not provided, in the interests of maintaining confidentiality.

The information obtained from the review has been analysed and provided to the Department of Health in this Report with recommendations for improvement; and will not

be used for any other purposes than for the review of the processes for implementation of NPs since the introduction of the role in South Australia. It should be noted that it was clearly explained to all participants that they could elect not to answer specific questions and several opted not to do so.

Literature Review

A range of literature was retrieved. This included policy documents, discussion papers, evaluations and published studies. Because few studies and documents directly evaluated the implementation process, informative relevant documents published before 2006 were included. Earlier evaluations such as that by Pearson et al (2004) examined implementation factors in relation to Victorian pilot models of NP care introduced in the early part of this century (Pearson et al, 2004). However, some of the factors identified in evaluations of pilot/demonstration projects are dated by the historical context in which they were conducted. Events that have occurred since these evaluations took place have addressed some foundational barriers such as those associated with education and legislative frameworks. Nevertheless some issues identified in these early pilot evaluations have not changed substantially over time and remain salient nationally and internationally.

Findings of the Literature Review

Due to the different standards of legislative frameworks and education, the findings from different countries (these included USA, Canada, Ireland, New Zealand and the UK as well as a few other country examples from the WHO report) may not necessarily transpose to the Australian context. However, there were recurring and consistent themes in relation to difficulties associated with the implementation of the role common to many contexts. Although the technique of frequency counting may be misleading because it elevates the most frequently cited but not the most important results (Dixon-Woods et al, 2004) and may also reflect a particular focus of inquiry, it was interesting to note that on the basis of this set of documents, implementation issues largely congregate around understandings of the NP role, scope of practice and organisational factors (see table of barriers and facilitators at the end of this document).

An additional caveat is that from some of the included documents, barriers and facilitators associated with implementation processes were implied because these studies did not directly seek to uncover factors such as barriers and facilitators. Generally, most of the obtained research papers used descriptive cross-sectional research designs and focused on one strand of inquiry such as staff attitudes rather than undertake a comprehensive evaluation of a myriad of factors relevant to implementation. Some included papers were based on an author's observations about processes and outcomes and were not research-based. Strategies to address implementation issues were generally proposed rather than investigated through a follow-up comprehensive evaluation. Some papers contributed a wealth of information while others contributed few useful insights.

Of note is that while there has been extensive international research on the effectiveness and quality of care provided by NPs, there are few published studies that have evaluated implementation of the NP role post-legislation. This suggests that more studies need to

be funded which rigorously monitor and/or evaluate the implementation of NP roles in a variety of settings and States.

Narrative summary by barrier & facilitator domains

The narrative summary is structured by the domains below. These are also summarised in Table 3 at the end of this literature review section of the Report. In common with previous work, this review has identified a number of recurring barriers and facilitators associated with the implementation of the NP role. Barriers and facilitators fell into the following domains:

- > The NP role
- > Scope of practice
- > Legislation & authorisation process
- > Education
- > Organisational, strategic and clinical service planning
- > Collaboration
- > Marketing
- > Consumer/patient/carer factors
- > NP factors
- > Medical practitioner factors
- > Feasibility and sustainability

The main findings associated with each of these domains are summarised in the next section with reference to key documents and included research. There is an overlap between some of the domains but they provide a useful structure with which to organise the material. The barriers and facilitators table (at the end of this section), while clearly outlining main themes related to these factors does simplify what is often an overlapping constellation of barriers and facilitators. The implication of this is that it is probable that the strategies for addressing one barrier will also be applicable to other barriers.

NP role

This category of barrier/facilitator refers to role boundaries and ambiguity. Barriers and facilitators under this category can be institutional and personal (for example, be related to other health care professionals (HCPs)). Barriers centre around confusion about the various terms used to describe advanced practice; lack of clarity about professional boundaries and responsibilities; and competition with medical roles. Strategies to counter these barriers include a strategic implementation plan, review of nursing nomenclature, increased exposure of other HCPs to the NP role through education and practice and emphasising the interdependent working of the team.

Recurring and consistent themes across all countries and papers were that of role ambiguity and confusion. This related to scope of practice and also differences between advanced practice nursing roles and NP roles (Gardner et al, 2007). There is confusion internationally about nomenclature, role and scope for advanced practice nursing roles and there is a need to differentiate operationally between advanced practice and NP roles (Gardner et al., 2007). In many jurisdictions, including North America, Australia and New Zealand, the APN is differentiated from the NP through legislative/title protection mechanisms (Gardner et al, 2007).

Lloyd Jones (2005) conducted a systematic review based on 14 studies (mainly from the

UK) which identified barriers and facilitators to role development in specialist and advanced practice roles in hospital settings and concluded that relationships with other staff groups and role ambiguity are among the most important factors which hinder or facilitate the implementation of new roles. The author comments that these factors appeared to be interlinked and that the implementation problems do not resolve spontaneously when staff become familiar with the new roles. She suggests that, to reduce role ambiguity and consequent negative responses when new roles are introduced, clear role definitions and objectives should be developed and communicated to relevant staff groups. These should be updated as needed. It has also been suggested that there is a need to review and revise the elements of various overlapping roles such as clinical nurse, NP and NUM in order to ensure role clarity (NSW Health, 2008).

In the evaluation of the NP role in NSW (NSW Health, 2008), the investigators found that initially the introduction of the NP role created uncertainty in some rural areas in terms of how the NP role would relate to existing nursing roles. Communication, managing expectations and clarifying roles and accountabilities are therefore important enablers to implementation when new roles are introduced so that existing staff feel valued and able to function effectively (NSW Health, 2008). A lack of understanding of the role can mean that the focus of the role changes. For example, if team members see it as exclusively clinical it may be questioned when the NP is engaged in research or educational activities (NCPDMN, 2005). Lack of understanding of the role can also lead to inappropriate referrals which creates a source of frustration for NPs (NCPDMN, 2005).

Griffin and Milby's (2006) study assessed the attitudes of nurses, doctors and general medical practitioners (GPs) towards the development of a NP service within an emergency department. All respondents (n=80) were positive towards the development of an advanced NP role, although GPs were statistically significantly less positive. However, only 11% of the entire sample indicated they had a clear understanding of the role of the NP. The authors suggest that a multidisciplinary approach to the planning of NP services would help to overcome barriers around role boundaries and understanding of the NP role. They also suggest that the attitudes of nurses and medical staff in clinical settings towards the implementation of a new service such as the NP should be examined prior to implementation so that specific strategies can be applied to address attitudes and expectations.

More positive findings came from the recent evaluation of aged care NPs. Nursing staff reported that prior to the implementation of the NP position, it would have been necessary to contact and wait for the medical officer. With the NP in place, RNs and care workers had access to a practitioner with advanced skills to provide on the spot clinical support and decision-making (ACT Health, 2007).

Scope of practice

Barriers and facilitators associated with scope of practice (which overlap with the domain above) are mainly focused on prescribing, pathology investigation and imaging ordering, referral rights, and limitations and extensions to practice. While there are no legislative barriers to NPs initiating diagnostic imaging and pathology, there is no legislative provision for nurses to obtain a Medicare provider number (Victorian NP Project, 2004). There is also an issue associated with doctors not discontinuing services which have been delegated to NPs. The only solution required to overcome these issues is for the Federal government to make changes to reimbursement of services, and for provision of

Medical Benefit Scheme (MBS) and Pharmaceutical Benefits Scheme (PBS) provider and prescriber numbers. Evaluations of NP implementation in Victoria and NSW have identified an inability to access Medicare benefits or other sources of funding as a major barrier to the implementation of these extended practices and NP prescriptive authority (NSW Health, 2008; Victorian NP Project, 2004).

In common with Australia, nurse prescribing in the UK is regulated and requires training. The main difference in prescribing is that UK nurse independent prescribers (and other HCPs) can prescribe a greater range of licensed medications from the British National Formulary. Full prescribing rights have not yet been achieved in Australia. The current model in most Australian states is a combination of formulary and protocol based prescribing. Federal Government legislative restrictions in the areas of funding and access to Medicare and the PBS inhibit the expansion of the role into the private health sector and general community (Della, 2007). Yet, in Griffin and Milby's (2006) survey of nurses and doctors, only 4% disagreed or were undecided about whether NPs should be allowed to request X-rays and 13% disagreed or were undecided whether NPs should be allowed to prescribe.

In NZ under current legislation, NPs are allowed full access to the formulary excluding anaesthetic/paralysing and chemotherapeutic drugs. They are required to operate within their scope of practice but are not expected to provide a definitive list of medications they will use.

The NSW evaluation found that of 33 NPs only 50% were either prescribing medications or ordering them under standing orders. It also concluded that the majority of this group were providing medications under a mix of prescriptive authority or standing orders due to the fact that their guidelines to date did not cover all aspects of their practice. The cost imposition created by the lack of a PBS prescriber number compounds the very issues of access and equity that the introduction of NPs set out to address (p 65). Only 64% of NPs ordered pathology investigations; and only 48% ordered imaging investigations. Unless the person has access to an MBS provider number, the health consumer is required to meet full cost of test where hospitals use private laboratory services or where the patient is community-based. Similarly, in Ireland difficulties prevail around prescribing, requesting X-rays and tests and making referrals that have resulted in some NPs not being able to practice to their full capacity and having to consult with doctors unnecessarily (NCPDMN, 2005).

Another recent evaluation noted that the most significant barrier associated with implementation of the role of the aged care NP is not being able to practice to the full extent of NP legal authorisation due to inability to have prescriber or provider numbers (ACT Health, 2007). 'This results in poor use of expert resources and duplication of service, effort and time as well as adds to the psychosocial and health distress to the patients journey through the healthcare system' (ACT Health, 2007:81).

Legislation and policy reform by the Australian Government are required to surmount these barriers. The changes required include access to funding through MBS provider numbers and PBS provider numbers (which currently create problems for health consumers in terms of access and equity); and dedicated and committed funding to enable sustainability and integration of NPs in health system (NSW Health, 2008).

The authorisation of diagnostic investigations (diagnostics) by medical officers in order to claim Medicare benefits and duplication of assessments when the person also needs to be seen by a medical practitioner in order to authorise diagnostic procedures (and so

obtain Medicare benefits) also adds another step to the person's management plan and increases the paperwork in relation to ordering investigations (Victorian NP Project, 2004). As well as adding another step to the process of care for the health consumer, the implications of these impediments may mean that in some settings the NP role is not fully realised or is judged as being unsustainable. There is also some evidence based on an evaluation in 2001 that radiology and pathology providers are unsupportive of nurses ordering diagnostics in some settings (Victorian NP Project, 2004). This same evaluation reported that funding issues were generally considered more complex for NPs in private practice or in the community than for those working in a hospital setting.

The NSW evaluation also identified barriers that were associated with lack of understanding and sometimes opposition to the role by other HCPs who are required to sign off the guidelines; lack of consensus on which medications and investigations NPs could prescribe or order; lack of time on the part of individual NPs to work on their guidelines; and delays in processing the approval of the guidelines. These barriers also limit the ability of NPs to function fully in their roles. Existing guidelines are included on the NSW Health website to create a critical mass of guidelines applicable to different specialties so that delays in guideline development will be reduced. Many reports suggest that the scope of practice needs to continue to develop in order for the role to be fully realised and for health consumer and service needs to be met. If NPs are unable to work to their full scope of practice they may lose competence in some areas of practice. In these situations, refresher training needs to be provided (CNPI, 2006).

In Australia, the National Nursing and Nursing Education Taskforce has focused on identifying opportunities to achieve greater national consistency in nursing and midwifery scopes of practice, including the NP role. The Taskforce identified examples of policies and procedures for NPs that were substantially different from those applied to other members of the health team. For example, on the issue of scope of practice questions were raised such as:

- > If there are appropriate multidisciplinary clinical practice guidelines already developed, why are NPs required to develop their own?
- > Are other levels of nurses required to develop and practice within similar prescriptive statements of clinical practice?
- > Are other health professionals required to develop practice guidelines? If so, are NPs asked to provide reciprocal review/endorsement of guidelines for other disciplines
- > What evidence is there that that such regulation is warranted?

The concern was that some of the policies in place may either overly-protect or favour one discipline over another and that, ideally, health workforce policies should be transparent, fair and equitable to all members of the team and be embedded in a risk management model for professional practice, rather than professional agendas. If this is not the case the risk is that the NP role will be unduly restrained and prevented from contributing effectively to the health outcomes of the Australian community.

Building on the findings of the Australian Nursing and Midwifery Council's (ANMC) NP Standards Project, the potential for practice protocols to inappropriately constrain the capability of NPs and reduce 'occupational flexibility' (p109) was explored by Carryer et al (2007b). The authors distinguish between guidelines which support practice and protocols which 'aim to control practice'. They state that if NP practice is limited and constrained by dependence on specific protocols or made dependent on the presence or supervision of medical practitioners, then the full potential of the role is diminished. Role

development may be constrained in ways that are not directly about professional practice or client needs, but which occur ostensibly and overtly on the grounds of safety and due caution and covertly as medical control of nursing practice (Carryer et al, 2007b).

Legislation & authorisation process

The barriers and facilitators in this domain are associated with scope of practice but also capture issues related to variability across states and regions. Lack of consistency in areas such as legislation, education and scope of practice can convey to other professions that the NP role is ad hoc and also confuse public and professional understanding about what the role represents (ACT Health, 2005; Turner et al, 2007).

Legislation and regulation are considered to be the building blocks of sustained integration of the NP role in the health system (CNPI, 2006). Many countries have regulated NPs in terms of role definition, scope of practice, educational requirements and protection of title. Although the USA has the longest history of regulation, there still exist differences between states in terms of scope of practice, especially with regard to prescribing rights and reimbursement (NCPDMN, 2005). The issue in Australia is mainly centred on variability across states relating to the legislation and authorisation process. However, moves are afoot via the initiative of the National Nursing and Nursing Education Taskforce (N3ET) and the move to national registration of health professionals, including nurses and midwives that will lead to consistency of approach.

In the UK, the role has developed in a flexible 'ad hoc' implementation process which is based largely on a philosophy of trial and error rather than a predestined structure (Currie et al, 2007). This is in contrast to Australia and NZ where the role is embedded within legislative frameworks to ensure a formal process of regulation, training and accreditation. Some argue that the absence of formal regulation has meant greater ability to develop the role to meet service needs (Currie et al, 2007). However, the process of endorsement and protection of title offers more clarity on lines of professional accountability. Moves towards standardisation are happening with the UK RCN accreditation unit setting standards for NPs and defining the domains of clinical competencies. In Canada there are moves towards national standardisation of the NP role through legislation and regulation governing practice and education (Gardner et al, 2007). In addition, to promoting a consistent approach in terms of regulation, training and accreditation, it has been recommended that legislative frameworks should permit some jurisdictional flexibility to allow for changing health care needs and for the evolution of the NP role (CNPI, 2006).

A long process of preparing for authorisation is known to be a further barrier as it deters potential applicants from applying. Applicants who are deterred by this process may then choose to work for instance, as a clinical nurse consultant who adopts a de facto NP role. This can also create confusion between the various senior roles (NSW Health, 2008). Where other staff are not aware of the restriction to practice by lack of provider and prescriber number 'this led to confusion and misinformation about the roles and capabilities of the NP' (ACT Health, 2007:68).

Education

This category of barrier and facilitator relates mainly to adequacy of educational preparation and continuing professional development. The lack of national consistency in educational preparation leaves the NP role open to interpretation in terms of what it can offer the health care system. National consistency in this and other areas would help to

foster the development of both community and professional understanding of the role, and enable a baseline for the provision of more consistency in safety and quality of care (ACT Health, 2005).

The National Review of Nursing Education (N3ET) recommended the development of the ANMC National Competency Standards for the NP towards a framework for national consistency. This has occurred and for the most part, has been endorsed and taken up by the nursing and midwifery regulatory authorities.

An important dimension of the work on maximising education pathways by the N3ET included investigation of the educational pathways for NPs. This work complemented and expanded the mapping undertaken on NP licensing and approval processes; and the mapping of nursing and midwifery regulation across Australia (N3ET, 2006b & 2006c). The mapping exercises indicate that there is variation across the states and territories in the post-registration educational qualifications required for endorsement/recognition as a NP. Until recently (November 2005), there was no national agreement on core competencies for NP practice. Without national agreement on either the level of education preparation or core competencies for practice, pathways for nurses seeking to be recognised as NPs had become fragmented and specific to a state or territory. Principles have been agreed for the educational preparation and recognition of the NP which marks the start of a national, coordinated and strategic process to secure the NP position in the Australian health care system (N3ET, 2006a). National consistency in education as with consistency in other areas such as scope of practice, assists in firmly establishing the NP role within health services, establishing clarity of role and in facilitating national policy evaluation. Barriers to continuing education should be removed by implementing initiatives such as funding for continuing education, time-off for study, and access to online libraries and learning resources.

Organisational, strategic & clinical service planning

This category of barrier and facilitator refers to factors within the organisation/institution within which the NP role is being established that facilitate, inhibit or act as a disincentive to implementing the NP role. Unsurprisingly there were many such factors in Australia given that the role has only recently been implemented in some states and territories. However, many of these factors continue to be reported in studies from the USA and UK where the NP role has been in existence for longer. The main factors are focused on organisational culture and lack of preparatory work (such as having a strategic implementation plan and a person in the role as a 'change champion' to facilitate transition). Turner et al (2007) comment that whilst there is rhetorical support for the NP role, implementation at operational level is hindered by professional boundary issues, models of care that do not easily accommodate the NP role and budget agreements.

One of the biggest concerns reported was funding for the NP position, including funding to bridge the salary gap between an existing position and a NP position, loss of a CN position in order to implement a NP position and recurrent funding for positions when funding had been obtained through project money (NSW Health, 2008). If long-term funding policies do not exist this poses a number of problems for the deployment of NPs. This includes the risk that they will not be used effectively within organisations and that their sustained integration is jeopardised (CNPI, 2006).

Other barriers or inhibitors were related to lack of organisational planning processes to facilitate the implementation of the NP position. Developing job descriptions, establishing practice standards, and changing institutional policies to support NP practice prior to

implementing the role represents a basic level of planning. However, some go a step further utilising (or developing) a change model to guide the process (Cumming et al, 2003). Open discussion among all stakeholders about their expectations of the NP role may also help to clarify uncertainty.

It is recommended by several authors that each organisation needs to develop a model for implementation appropriate to the organisation's needs and objectives in relation to the NP role. For example, the model will vary according to whether NPs report to physicians; whether NPs work independently or collaboratively; who they report to and whether authority is shared equally for providing care within respective scopes of practice. There should also be a preparatory stage prior to the introduction of the NP role which includes 1) need identification; 2) assessing the climate for accepting change; 3) recruiting project champions; and 4) developing a communication umbrella which incorporates a feedback loop that allows for ongoing evaluation (Cumming et al, 2003). In the Irish evaluation it was found that where there is little preparation and a lack of an organisational champion, the role is not as successfully implemented, resulting in role confusion and inappropriate use of the expertise and skills of the NP (NCPDMN, 2005). In the Cummings et al (2003) study, lack of planning had delayed role implementation from 2-8 months.

An environment which is considered crucial for facilitating implementation and fulfilment of the NP role is one which fosters dynamic practice and which involves the application of high-level clinical knowledge and skills in a wide range of contexts. These skills include professional efficacy which is demonstrated by autonomy and legislated privileges and clinical leadership in which the NP has an obligation to advocate for their client base and their profession (Carrier et al, 2007a). However, there is evidence that the NP role does not have the autonomy originally intended. Consequently, the role is struggling to establish itself within existing models of care (Turner et al, 2007). In the Turner et al study it was observed that many staff in the health service concerned had difficulty in understanding the relative autonomy of the role.

A number of studies identified the need for a named person within the team to be responsible for implementing the role and developing the structures and relationships necessary to bring the organisation and key stakeholders on board. This person needs to be expert in communication, negotiation skills and conflict resolution. An organisational culture that is open to innovation, development and change was also found to have contributed to the successful introduction of the role (NCPDMN, 2005). In addition, the support of the multidisciplinary team, clear and effective communication and a culture that embraces change are required.

As well as garnering the support of the relevant agencies in terms of resources and co-operation, developing communication channels, and identifying service needs, organisational preparation should include the development of a strategic plan which outlines appropriate strategies for integration of the role over the long-term (NCPDMN, 2005). Once the role is in place, practical support such as support and mentoring, introduction of protected time and resources for professional development and research are required. The NP also needs communication and networking skills to enable the building of a presence in the organisation and for promoting the NP role.

Kralik et al, (2007) identify a number of impediments to full realization of the NP role. These include where the host organisation has not established processes such as clinical risk assessment and review; clinical protocol development; mentorship and support,

clinical and admission privileges and 'upskilling' and maintenance of extended skills and knowledge.

Other impediments identified by Cummings et al, (2003) on the basis of interviews with 17 key medical and nursing stakeholders in a Canadian acute care setting include role definition issues (that is practice boundaries were unclear among some staff or were overlapping with the NPs) and lack of clarity about reporting lines. Where practice boundaries overlapped, such as when medical professionals and NPs both had authority to write orders, staff nurses reported that they often verified NPs orders with the medical officer. That other levels of nurse are often unsure of or misapprehend the NP roles was also found in the Australian study by Turner et al, (2007). In both Cummings et al, (2003) and Turner et al, (2007), lack of role clarity led to under- utilisation or poor utilisation of the NP. Cummings et al, (2003) reported that this happened more at the beginning stages of role implementation. Reasons given related mainly to uncertainty about the parameters of the NP role. Staff nurses were least likely to understand the NP role and saw it as 'neither fish nor fowl'. Frustration was expressed by all interviewees that no single person was tasked with guiding and implementing the NP role or in adequately explaining the NP role.

Lee et al, (2007) surveyed staff knowledge of the NP role from 76 Victorian medical and nursing staff of a teaching hospital. The survey was self-administered three months after the emergency department (ED) NP role was introduced. The study demonstrated a 'good' level of staff knowledge of the NP role. This was attributed to the introduction of a strategic plan for implementation of the NP role. Staff in the ED required more information about the education and endorsement of the NPs and also on the use of guidelines. The authors recommend in-house education to fully inform departments on the NP role.

The lack of infrastructure support including information technology (IT), library, continuing education, professional feedback, information systems and clerical assistance has been identified as a major hindrance to the full development of the NP role (ACT Health, 2007; NSW Health, 2008; NCPDMN, 2005). The lack of clerical support consumes NP time that would otherwise be spent on research or professional development. This is in stark contrast to the level of similar support given to other senior clinicians. Considering some NP job descriptions ask for substantial research and development commitment, the lack of clerical and administrative support represents a significant barrier to fulfilling NP research and development activities. Time is also stretched in situations where a NP role has replaced another nursing role or the funding has not been provided to support the full complement of nursing roles required in an organisation. This has meant that clinical demands may swamp the NP role and/or create an expectation that the NP will undertake a role usually performed by a less senior nurse (NSW Health, 2008). Facilities such as a dedicated office, computer and information technology (IT) support and examination room are crucial to the fulfilment of the role.

Collaboration

This category of barrier and facilitator refers to issues associated with collaboration between NPs and other HCPs (nurses and medical professionals). Although collaboration could be associated with the domain of organisational planning there was a substantial body of information on this topic that warranted separate discussion.

The overall consensus is that to be successful, the NP role should be part of an inter-professional collaborative team in which there are true partnerships. Hierarchical authority should be replaced by equality and shared decision-making (Queensland

Health, 2006). Because the relationship between NPs ,physicians and other nurses is critical to the successful integration of the role of the NP, some overviews have identified that there is a need to develop and implement clear policy direction for models of inter-professional primary health care service delivery as well as a supportive change management strategy (CNPI, 2006). Some feel that collaboration models should be enshrined in legislation in order to resolve some of the objections towards collaboration with NPs (CNPI, 2006).

Importantly, the overt endorsement of the NP role by senior members of the multidisciplinary team significantly contributes to internal and external acceptance by health care professionals and health care consumers (ACT Health, 2007).

To collaborate effectively there needs to be recognition amongst all involved HCPs that the NP role is predicated on the authority to practice being vested in the NP themselves and not delegated by other HCPs. This is where the role is able to exercise efficiency and reduce duplication of workload. Existing models of care may require revision to accommodate this characteristic and health care providers should be required to change their practice behaviour to accommodate the inter-professional team (CNPI, 2006). However, the fact that the NP may work relatively autonomously does not preclude that there is also interdependent working with other team members. The recent ACT Health report emphasises the importance of collaboration with other health care professionals to ameliorate factors such as lack of professional authority, lack of trust and lack of recognition of NP experience (ACT Health, 2007).

Marketing

This category of barrier and facilitator refers to the information needs of key stakeholders in relation to the rationale and purpose of the NP role. The discussions above suggest that there is often an underlying lack of understanding from other HCPs (nursing and medical) and health care consumers about the role and the expertise of the NP. This lack of understanding requires addressing through formal media and communication activities in order to overcome some of the beliefs and attitudes that hinder successful implementation of and appropriate utilisation of the NP skills.

Clear and simple messages and an emphasis on the value-added role of the NP is required (CNPI, 2006). Communications need to be tailored and directed towards specific target groups (including the general public, physicians, pharmacists, RNs, radiology and pathology providers). The CNPI recommend that the following are needed to develop an effective media strategy: using champions; producing tools to help spread the messages by word of mouth such as toolkits that included NP success stories; NP profiles, brochures; a website; events and conferences; producing an NP documentary; and NP road show to explain the role.

As part of such a strategy, the benefits of the role need to be promoted within the health service in which NPs are employed. Information about the scope of the role should be available to professionals and the public. Benefits that should be highlighted are that the NP role can improve communication between nurses and other team members as a result of greater dialogue and team-working. This may lead to a greater understanding of individual roles within the team. In addition, it is recommended that messages emphasise that the NP role involves highly skilled clinical nursing practice and acts as a complement to medicine rather than an invasion of medicine (Kralik et al, 2007). If this message is not promoted, Kralik et al (2007) claim that the NP role will be irretrievably harmed by adoption and/or association in stakeholders' minds with a medical model of

care.

Health consumers, clients, patients/carers factors

This category of barrier and facilitator is related to lack of understanding of the NP role by health consumers and carers and the need for information about the role and scope of practice of NPs. This factor did not come up particularly strongly as a theme in much of the included literature. However, it was thought worth mentioning as it could be an issue, particularly if negative attitudes are communicated to patients about the NP role and also if the NP is not included in interdisciplinary rounds. For example, consumers in four general practices considered the GP as the appropriate person to make diagnoses particularly when consumers perceived their condition to be serious (Wilson et al, 2002). Such beliefs are likely to be compounded by the lack of provider numbers for NPs who may have to ask the medical practitioner to authorise the request.

Health consumers are also affected by the lack of an MBS or PBS for NPs. This is because clients of NPs are liable for the total cost of the imaging, pathology investigations or medication where hospitals use private laboratory services or where a community-based service is used. Because of this impediment, other HCPs may be more inclined to refer health care consumers to doctors to spare them the cost of the tests, etc. The need for medical practitioners to authorise diagnostic procedures and duplication of assessments by the NP and medical practitioner so that the health care consumer can claim Medicare benefits has a number of effects. These include that it adds another step to the health care consumer's management plan, it overly complicates the process of test ordering, and that it increases the paperwork associated with ordering investigations (Victorian NP Project, 2004).

NP factors

This category of barrier and facilitator refers to factors specific to the NP that are not covered by the domains above. In some studies, NPs reported that they had little or no involvement in education or research activities and that a pull existed between service delivery and education/research (Cummings et al, 2003; NSW Health, 2008). Some NPs have reported feeling continually scrutinised in the workplace and having to defend their extended scope of practice (Truscott, 2007). The NSW evaluation reported that the capacity to adapt to varying daily situations, having strong communication, relationship, and team building skills and access a good support system from key stakeholders were critical in helping to ease the NP role into clinical settings and in helping to overcome many attitudinal barriers:

- > Lack of resources, infrastructure support and restrictions on scope of practice (remuneration and ability to request investigations; prescribe full range of medications) as outlined above contribute to frustration and dissatisfaction (NCPDMN, 2005).
- > Lack of access to clinical and academic supervision (ACT Health, 2007; NSW Health, 2008; NCPDMN, 2005) are also cited by NPs as issues.
- > Individual qualities of the NP valued by other team members and which facilitated acceptance and implementation included ability to communicate with patients and staff; interpersonal skills; vision; ability to lead services and negotiate change (NCPDMN, 2005).

NSW Health (2008) also mention the need to redesign the career structure for clinical nurse/midwife consultants and nurse/midwife practitioners to ensure clinical career progression and capacity building for senior clinical careers.

A Canadian study of 57 NPs working in acute care settings found that (and many of these factors are echoed above) lack of a formal and clear job description, conflicting demands and expectations, lack of receptivity of the role by others, lack of autonomy and increased workload were negatively correlated with the NP role implementation (Irvine et al, 2000).

Issues such as professional isolation, that is, lack of professional and clinical support such as peer group support, clinical mentoring and professional reassurance (ACT Health, 2007), may vary according to the setting in which the NP practises. For example, the ACT Health evaluation of the aged care NP role found that professional isolation was a problem in residential aged care facilities but was not a major problem in the tertiary sector due to well-established support networks.

Medical practitioner factors

This category of barrier and facilitator refers to issues associated specifically with medical practitioners.

Many of the barriers relate to funding and attitudinal factors, and strategies to address some of these attitudinal factors are outlined above. An examination of barriers to developing the NP role in primary care from the GP perspective (Wilson et al, 2002) found that GPs had significant concerns about threats to GP status; nursing capabilities, including training and scope of responsibility; and structural and organisational barriers. The medical practitioners expressed concerns about the potential for changes in the case mix of GP consultations. GPs were concerned that they would be left solely to manage the complex cases and this fear was coupled with the fear of becoming deskilled in some of the more routine areas of clinical practice.

Concerns regarding continuity of care were addressed in some reports by the use of shared patient record systems. Concerns regarding quality of NP care could be countered by medical practitioners with experience of successful working with NPs sharing experiences with those medical practitioners who are incorporating the NP role into their practice. Wilson et al (2002) suggest that there is a need to disseminate the evidence that NPs offer an appropriate solution to the difficulties doctors face in providing high quality services to their patient population. Wilson et al (2002) reported that a GP practice addressed their initial concerns by working closely with the NP and gradually feeling comfortable about devolving responsibility. An American study is cited that showed that joint educational events and the development of GP based preceptorship is likely to develop greater understanding of the NP role.

In the Irish evaluation, the early involvement of medical consultants in the development of the role was crucial both from the perspective of negotiating support for the role to more practical issues such as supervising clinical practice and providing clinical support (NCPDMN, 2005). In addition, realistic expectations regarding the population a NP is expected to manage is integral to continuity and consistency of care (ACT Health, 2007).

Feasibility and sustainability

This category of barrier and facilitator refers to factors critical to the feasibility and long-term sustainability of the NP role. These factors are included in many of the domains above, such as organisational culture but also encompass the systems of: business planning; human resources; training and development; and clinical governance (NCPDMN, 2005). Jasper (2005) asserts that if new nursing roles such as the NP are to succeed these issues are crucial in terms of long-term development and sustainability. Long-term success is brought about through an evolutionary process of continually

aligning strategy, structure, people and culture through incremental change (Cumming et al, 2003) and through building strategies within the systems above.

A major issue in sustainability relates to the ability of NPs to acquire sufficient confidence and skills in independent decision-making (Pearson et al, 2004). All those who were new to the NP role demonstrated a need for support, supervision and opportunities to review and audit their decision-making and the outcomes of their interventions. To address this the authors recommend a supervision and support system in collaboration with the Royal College of Nursing (UK) for the first three years of practice.

In the NSW evaluation, wavering levels of support once the role was implemented were noted (NSW Health, 2008). Transitional arrangements for entry into the new roles may be left to employers who were required to implement the positions and in such situations novice NPs can find themselves with few supports (CNPI, 2006). Kralik et al (2007) make the point that the newness of the NP role in Australia means that there are few benchmarks to work from or experienced people to act as mentors. This means that it may be medical colleagues or other health professionals who perform the mentoring role. However, if NP practice is limited and constrained by dependence on specific protocols or made dependent on the presence or supervision of medical practitioners, then the full potential of the role is diminished and is more open to control by other hierarchies (Carryer et al (2007b). Appropriate mentorship and a mentorship culture needs to be established and a consistent mentoring system should be developed (NSW Health, 2008; van Soeren et al, 2001).

Recent national and international evaluations cited in this review suggest that factors such as lack of trust between professional groups; lack of collaborative/consultation forums; funding; restricted scope of practice; lack of support and mentoring amongst other things, persist as significant barriers to successful and sustained implementation of the NP role. There is a need for nursing leaders to ensure that the NP role becomes operational throughout their organisations, and to obtain funding and build relationships with major stakeholders to ensure smooth integration and fulfilment of the role (Della, 2007).

In addition, issues around task delegation and workload need to be addressed to the satisfaction of all team members. For example, if an NP role has been introduced to shoulder workload burden for a service, it needs to be ensured that the NP role itself is not overburdened or given a role that is out of step with the NP remit. Overall, the evidence strongly suggests that the NP role generally results in a more streamlined and comprehensive service with a reduction in duplication of workloads. This has a positive flow-on effect for hospital admissions and waiting times (Pearson et al, 2004). Evidence from the Victorian evaluation showed that the NP provided workload relief in general practice and hospital settings (Pearson et al, 2004). An Australian study by Offredy et al (2000) reported that physicians viewed NPs as significantly reducing their workload. There is also evidence from an early Canadian NP trial (Spitzer et al, 1974) that physicians could accept new patients because of a decreased workload; furthermore, by the end of the trial the practices had grown by 22%.

Conclusions from the Literature Review

A literature review on the national and international trends including best practice of the implementation of the NP role was the first task of this project. Sadly, research studies that specifically addressed the question 'what is best practice for the implementation of

the NP¹ were few, and those that were available were mainly descriptive. However the evaluations were for the most part comprehensive and examined a number of important factors relevant to the implementation of the NP role and were sufficiently robust to provide the foundation for this review. These documents were supplemented by peer-reviewed literature published from 2006-2008. To do justice to the published and grey literature across a longer time period would require a separate review. Some of the included documents have set their findings within existing policy frameworks (for example, NSW Health, 2008) and have examined processes and issues associated with the implementation of NP role within the health system and within existing nurse hierarchies.

Despite consistent empirical evidence of the positive outcomes of NPs on health care services, patient outcomes, consumer satisfaction, and HCP acceptance (see the range of evaluations contained in the reference list); the full implementation of the role in most settings remains challenging. The differences between what is endorsed as policy and the reality of implementation in health services suggests that, without further commitment by government to establishing appropriate and integrated infrastructures, in some areas NP implementation will be a lengthy and evolutionary process (Turner et al, 2007). The co-operation and involvement of different stakeholder groups as well as organisational adjustments in response to issues that may impact on implementation are of integral importance to successful implementation.

While there is no published failsafe implementation method, the literature does offer information on the key incentives and disincentives for health care organisations considering introducing the role. In Australia and overseas a number of approaches have been used to develop and institutionalise the NP role but there are still common disincentives as outlined in the barriers and facilitators table and supporting narrative summaries. The table of barriers and facilitators shows that the majority of issues fall into the domains of organisational planning, NP role and scope of practice. However, within each domain there are a number of strategies that can inform and strengthen implementation and assist in countering barriers. Implementation is influenced by contextual, cultural and political factors, the mix of which varies by state and country as well as the clinical setting in which the role is to be implemented. Incentives and disincentives will also vary according to how fixed the role is and its role elements.

The process of implementation of NP roles has been noted as being as 'complex and dynamic as the roles themselves' (NCPDMN, 2005:25). For example, defining the NP role and scope of practice for all settings in which a NP may practise is not a straightforward or absolute matter (Pearson et al, 2007). There is a convergence of macro organisational issues (for instance, scope of practice; provider numbers) and cultural and organisational barriers and facilitators that create a complex implementation environment and which are often in tension (for example, the need for provider numbers meeting resistance from some HCPs). However, the findings from many of the included evaluations suggest that barriers such as HCP ambivalence about the role of the NP, lack of understanding of the NP role and appropriate utilisation of NPs could be addressed by several strategies. These strategies include educational initiatives such as the NP role being introduced to medical undergraduates and organisational initiatives such as change management and the early management of external and internal stakeholders' expectations. Addressing macro organisational barriers by issuing provider numbers and allowing appropriate extensions to practice require immediate attention.

While it is unsurprising, considering the relative newness of the role in Australia for many

of the listed barriers to be apparent, many of the same issues are reported in North American studies where the NP role has been established for many years. This suggests a number of things: firstly, that there are persistent underlying issues that require addressing that go beyond the implementation process but which can influence the implementation process and the evolution and integration of the NP role. Amongst other things, these issues are related to a need for government to endow the role with the full support needed to enable the full spectrum of responsibilities to be undertaken (for example PBS and MBS provider numbers and funding model reform); a scarcity of supportive and mentoring structures once the role is implemented; and lack of exposure by medical undergraduates to the concept of NPs. There is also persistent ambivalence regarding the value of the role, role configuration, value for money and the extent to which the role should be expanded (NCPDMN, 2005).

At a national level, recent Australian evaluations of the implementation of the NP role (ACT Health, 2007; NSW Health, 2008) document significant evidence to suggest that NPs continue to experience difficulties in implementing their roles. The same difficulties are likely to be experienced in other Australian states undertaking NP implementation. In addition to the barriers cited above, other identified barriers included that some NPs felt that support was diminished once they were actually in the role and that the organisation had not yet fully determined how best to use the expertise and authority of the NP. The authors of this report suggest that senior clinical roles need to be included in strategic workforce and clinical planning so that they can be fully integrated and best utilised within health service delivery. This was also suggested by the CNPI (2006) in relation to NP developments in Canada.

Organisational culture is a significant barrier to full implementation. It was noted in many studies (CNPI, 2006; Cummings et al, 2003; DiCenso et al, 2007) that what was missing in terms of implementation was a clear vision and use of a model or framework to guide the change process and to assist individuals in dealing with the change. Where the role is to be introduced a strategic plan and change management strategies needs to be developed to ensure success and to manage the necessary cultural shift. This should be done with the assistance of a change champion to lead the implementation. The use of toolkits to support implementation is also recommended. These could provide guidance to the clinical setting in which the NP role is being integrated and outline processes which facilitate decision-making and problem-solving around role implementation. Such toolkits require regular updating in line with changing health care systems, roles and needs of health care consumers (CNPI, 2006). It is likely that for many settings - services, job descriptions and structures may have to change to accommodate new roles and service delivery models. The benefits of the NP role should be promoted extensively. ACT Health (2007) in evaluating the aged care NP role, found positive health outcomes in health care delivery within a cost-effective framework. Such findings should be widely disseminated throughout the health care system.

In Australia, some of the states where the NP role is being implemented have 'business case' templates. These vary in terms of the comprehensiveness and complexity of the associated implementation plans demanded as part of the business case. In some of these plans, a few questions are included that request a description of the likely impact of the role on the service, workload and relationships. Some also ask for identification of the likely significant issues which may affect NP implementation including clinical developments and technology. Others ask for service plans within which must be identified mechanisms that will enable the NP to work in partnership with key HCPs.

Others list factors that may influence successful implementation but have no requirement for a description of how these factors will be addressed. One business case template requests a description of constraints; a project plan; consultation plan; resource schedule; quality procedure; reporting procedures; evaluation plan and risk management plan to be submitted. However, this was unusual. While a description of factors likely to affect implementation may be requested in many of the business case templates, a request for a more detailed implementation and monitoring plan is rare. This suggests that NP business case templates or service plans should perhaps insist on a comprehensive and strategic implementation and monitoring plan (rather than provide a description of possible hindrances which are not linked to strategies) to accompanying the application.

In Australia there is concern regarding national consistency in relation to how the NP role functions, scope of practice; legislation and authorisation; level of educational preparation and funding of NP posts. This lack of consistency can result in confusion about the NP role. It also reflects that Australia is in a transitional phase of development and implementation of the NP role nationally (N3ET, 2006a). This has occurred in the absence of a national framework for policy development for these specific practitioners. The National Review of Nursing Education recommended the development of the ANMC National Competency Standards for the NP (ANMC, 2005), which have now been widely recognised as a foundation step towards a framework for national consistency and, for the most part, endorsed and taken up by the nursing and midwifery regulatory authorities (National Nursing and Nursing Education Taskforce, 2005). Similarly in Canada, a pan-Canadian approach that is based on inter-jurisdictional and interprofessional collaboration including the involvement of educators, legislators, employers, practitioners and health planners is now being implemented. This is being done because progress on the implementation of the NP role was unacceptably slow and beset by many of the implementation difficulties and disincentives outlined above. The CNPI (2006) go as far as stating that if a traditional jurisdictional approach is followed in implementing recommendations associated with the NP role, systemic and long-term change will never be achieved and the progress on NP integration into the health system will be limited.

Summary of recommendations from other recent evaluations

Table 2 below outlines a summary the recommendations from the Reports of the two recent evaluation initiatives discussed at some length above that are of particular relevance to the South Australian review. Both these initiatives used a survey instrument that was largely the same as that used in South Australia to collect data from NPs and nurses preparing for authorisation as NPs. Hence the benchmarking of findings was possible.

Table 2 – Recommendations from recent evaluations

ACT Health (2007) - Australia
PBS prescriber and MBS provider numbers for authorised NPs
Organisations, line managers and boards are fully informed of the NP role prior to implementation
Research and investigative studies are conducted to monitor cost-savings associated with the role
NP Position description and client-base is negotiated and clearly articulated prior to role implementation (also clearly defined service geographical boundaries)

Realistic, achievable and individual key performance indicators from the outset
Regular performance review including ongoing assessment of the scope of the role
NP roles are legitimised from a management and organisational perspective and this is communicated to all internal and external stakeholders
Development of strategic plan for ongoing professional, clinical and organisational development of the NP role
Memorandums of understanding are developed between area health services and private sector NPs to enable access to professional resources
Ongoing mentorship and interprofessional learning
NSW Health (2007) - Australia
The need to examine overlapping nursing roles in order to ensure role clarity and best fit; in terms of workforce planning
The need to redesign the career structure for clinical nurse/midwife consultants and nurse/midwife practitioners to ensure clinical career progression and ensure capacity building for senior clinical careers
The need to assess the adequacy of infrastructure for senior nursing roles (eg., administrative support; professional support and supervision and mentoring).
There is a need to provide improved scope of practice support for NPs. Absence of PBS and MBS numbers is a Federal matter but requires resolution.
NCPDNM (2005) - Ireland
Development of roles – More expanded nursing roles similar to those already developed are required to meet growing patient need
Needs analysis - Service planners need to pro-actively undertake service needs analysis to identify potential areas of service that would be enhanced by the introduction of a NP.
Fulfilment of the role – NPs require support and encouragement to develop the research aspect of the role.
Service development – NP role development is a team effort and must be inclusive in order to be successful. It needs to be a multidisciplinary process led by nursing management and role development needs to be supported by appropriate resources
Developments in education – educational preparation is developing alongside role development
Expansion of roles in relation to prescribing – the prescription, supply and issuing of medications is associated with difficulties. These have been offset somewhat through the use of protocols and a project will make recommendations in this regard at a later date
Expansion of roles in relation to requesting ionising radiation – this is another area of difficulty for which a national and local approach to providing support to nurses has been highlighted and recommendations are currently being considered by the DoH (at time of writing)
Support mechanisms – appropriate support and supervision is required to that workloads are achievable

Summary of Barriers & Facilitators Related to the Implementation of the Role of NPs Identified in the Literature Review

Table 3 - Barriers & facilitators related to implementation of the role of NPs (please note that award titles may differ between the different reports)

Barriers & facilitators related to the implementation of the role of NPs by domain (extracted from included studies & documentary evidence)		
Domain	*Barrier	*Facilitator
NP role	Lack of clarity about professional boundaries, balance between 'medical' versus 'nursing' aspects of role; clinical reporting responsibilities & limited knowledge of NP education, role & scope of practice (eg, prescribing, physical examinations test ordering & funding) among HCPs.	Within a strategic implementation plan the following features result in more positive reception to NP Role: Formal/structured orientation to NP role amongst key stakeholders & team members; clearly conveying scope of practice; emphasising interdependent working presence of collaborative structures & provision of in-house information.
	Confusion among HCPs about the terms advanced practitioner, NP & nurse consultant & about the role of the NP vis-a-vis other senior nursing roles such as Clinical Nurse Consultant (this confusion may be exacerbated by inconsistency of grading of various nursing roles)	Review nursing role (for example, CN; NP, NUM & non-Award roles (advanced practice) in terms of role clarity, optimal use of resources & most advantageous harnessing of clinical & managerial expertise Clear role definitions & objectives should be communicated to relevant staff groups – these should be updated when necessary Clarification of role of NP prior to implementation
	That NPs may spend more time than medical practitioners on patient education, disease prevention & health promotion (some resistance due to territorial issues or reimbursement issues but also some encouragement) *	
	Medics feel competition with NPs	Include in medical education information on NP role & responsibilities Increase contact between NPs & medical students (for eg, incorporate collaborative practice within medical & nursing education programs)
	Where CNs function as de facto NPs (implications are that	Appropriate succession planning & capacity building

Barriers & facilitators related to the implementation of the role of NPs by domain (extracted from included studies & documentary evidence)		
Domain	*Barrier	*Facilitator
	implementation of a NP service is based on personality & organisational idiosyncrasies)	
Scope of practice	Lack of prescriptive authority & funding for medication supply, test & imaging ordering	Federal changes required to reimbursement of services & provision of MBS & PBS numbers Increase prescriptive authority to include Schedule 8 drugs
	Scope of practice restricted in terms of optimal service provision. The ability to make highly individualised but safe decisions is limited	Ability to revise guidelines or develop new guidelines in relation to evolving role & service need
	Doctors not discontinuing services delegated to NPs	Educate doctors about efficiency gains if they discontinue services that could be delivered by NP (some suggest doctor should not be reimbursed if NP in team & does what was previously done by doctor)
	HCPs not using full range of NP services	Guidelines should be endorsed by the multidisciplinary team & that Health Department should then review & approve Guidelines should maintain a nursing focus
	Delays in guideline development & approval	Existing guidelines should be included on state health websites
Legislation & authorisation process	Variability across states /regions relating to NP scope of practice, reimbursement, authorisation processes	Establish a consistent scope of practice, standardised education, licensure & certification

Barriers & facilitators related to the implementation of the role of NPs by domain (extracted from included studies & documentary evidence)		
Domain	*Barrier	*Facilitator
	Protocols at regulatory &/or organisational/employer level may act to restrict full NP independent practice	Non-restrictive regulatory frameworks which will protect the public & allow evolution of a mobile profession
	Process of authorisation & guideline development may encourage adoption of a de facto NP role	Extensions to the scope of practice as appropriate
Education		
	Varying education & training preparation	Standardised NP educational requirements & national/federal accreditation of educational programmes. Establish core NP programme with specialty streams (eg., community, cardiac, neonatal)
	Continuing professional development programmes not yet well-established	Ensure NPS have access to & are supported to participate in appropriate professional/educational development. This should include funding for continuous education, time-off, & access to online libraries & learning resources
Organisational, strategic & clinical service planning		
	Uncertainty about funding of NP services	Establish long-term funding & remuneration mechanisms that support NP delivery models (& infrastructure & administrative support required for role to be fully realised) Ensure adequate financial, infrastructural & clerical resources have been allocated for the establishment & maintenance of the service
	Concern that funding a NP position results in loss of another nursing position	Include NP position in strategic workforce & clinical planning

Barriers & facilitators related to the implementation of the role of NPs by domain (extracted from included studies & documentary evidence)		
Domain	*Barrier	*Facilitator
	Organisational culture: Lack of shared objectives & goals among team; poor teamwork & communication between team members linked to lack of opportunities & mechanisms to share information across team, hierarchical structures which do not accommodate the NP role results in NP position not being fully integrated, poorly understood, engenders lack of role clarity & inappropriate use of NP services	<p>Research indicates that acceptance of & satisfactory implementation of NP role by other key players (all HCPs) is strongly influenced by organisational culture, including the formal involvement of key players in planning & implementing NP position & dedicated person(s) to implement NP position (it is crucial that this should not be left solely to NP)</p> <p>Changes in organisational structures & policies to accommodate the NP position are facilitative (eg., changes in job descriptions of other HCPs; clear expectations about who might be reasonably expected to perform which functions; commitment to shared governance; establishing practice standards (including organisational support for independent practice separate from physicians), & changing institutional policies to support NP practice prior to implementing the role represents a basic level of planning)</p> <p>A clear vision & use of a framework to guide the change process & to assist individuals in dealing with the change – this should include education & strategic communication channels</p>
	Lack of clarity about reporting lines & terms of authority in clinical decision-making	<p>Reporting lines & terms of authority in clinical decision-making needs to be clear (between NPs & other HCPS including nurses)</p> <p>Clarity on whether NPs are working closely with or under the direction of medical colleagues or leading a multidisciplinary team</p> <p>Appropriate reporting structures are required. For example a NUM</p>

Barriers & facilitators related to the implementation of the role of NPs by domain (extracted from included studies & documentary evidence)		
Domain	*Barrier	*Facilitator
		<p>may not be appropriate as their role is quite different to the NP</p> <p>Agreement on population the NP is expected to case manage</p>
	<p>'Transaction costs' observed in some studies as a major barrier. Refers to the time required for conferring within teams. As team size increases (thus increasing the amount of time required for conferring & decreasing the amount of time available for direct patient care), a critical point is reached where transaction costs can outweigh the benefits of collaboration</p>	<p>Shared patient record systems, which all team members may contribute to & withdraw information from, have been advocated as one means of reducing transaction costs</p> <p>Electronic medical records are the preferred option, as information can be transmitted quickly to wherever it is needed</p> <p>Orientation for new NPs & team members about responsibilities, accountabilities & opportunity for all to verbalise their education, backgrounds, areas of speciality</p> <p>Good team management & leadership (change management skills)</p> <p>Impact of NP role on the workload of others has been assessed & adjustments to workloads have been made</p>
	Resistance from team	<p>Support from clinical staff has been sought & negotiated prior to implementation</p> <p>Factors that may prevent or overcome this barrier include overt executive support; stable staffing; medical & nursing representation & support.</p>
	Resistance from HCPs outside the setting in which the NP practices may affect referrals & use of NP	<p>Open discussion among all external stakeholders about expectations of the NP role prior to role implementation</p> <p>Appropriate communication links & referral processes have been</p>

Barriers & facilitators related to the implementation of the role of NPs by domain (extracted from included studies & documentary evidence)		
Domain	*Barrier	*Facilitator
		<p>established & consultation with other HCPs has occurred</p> <p>Local policies to support the role have been developed & approved</p>
	The host organisation has not established processes such as clinical risk assessment & review; clinical protocol development; mentorship & support, clinical & admission privileges & 'upskilling' & maintenance of extended skills & knowledge.	NP funding should be contingent on the establishment of these structures & processes
	Lack of infrastructure such as office space, examination rooms, library & IT support	Availability of all resources necessary to fulfil role including funding for travel & to support specific programmes & adequate leave relief to ensure continuity of service provision
	Lack of administrative & clerical support	Availability of clerical support for NPs requires resolution in order to maximise effectiveness in the role & free time for research activities. Lack of clerical support possibly also impacts on job satisfaction, retention & perception by others of the NP role within existing hierarchies.
	The clinical role of NPs not directly related to their role & may be at level of provision of basic clinical care generally provided by RNs, ENS.	<p>Ensure that unfilled nursing positions are addressed. As well as ensuring NPs are integrated into clinical teams, ensure they play a strong mentoring & teaching role</p> <p>Interdisciplinary rounds which include NP & physician</p> <p>Demonstrate & publicize the differences in approach to care by NPs</p> <p>Specific service to be provided by the NP should be clearly identified prior to implementation</p>

Barriers & facilitators related to the implementation of the role of NPs by domain (extracted from included studies & documentary evidence)		
Domain	*Barrier	*Facilitator
Collaboration	<p>Frequently reported that physicians' ideas of collaboration are that NPs practice dependently under the physician; whereas NPs' view collaboration as embracing a more independent role with consulting as needed</p> <p>Lack of interprofessional collaborative/consultation forums</p>	<p>Establishment of non-hierarchical collaborative structures where relationships are based on provider equity; & does not involve the supervision of one discipline by the other; where the strength & integrity of contributing parties is recognised & all are open to learning from the other</p> <p>Critical components of collaborative practice: trust, mutual respect, communication, shared practice & vision, competence, working together, consulting, sharing common goals, complementing practice, fluid leadership structure</p> <p>Establishment of collaborative practice agreements & establish shared goals early within a management framework that supports effective working relationships</p> <p>Overt endorsement of the NP role by senior members of clinical teams</p>
	<p>Traditional models of care find it difficult to accommodate the NP role, particularly the autonomous nature of the role</p>	<p>Existing models of care may require revising to enable the NP role to enhance service delivery</p> <p>Intersectoral memorandum of understanding to facilitate effective collaboration between teams</p>
Marketing	<p>Inadequate public & professional awareness & understanding of role</p>	<p>Develop a comprehensive media strategy & communication activities</p>

Barriers & facilitators related to the implementation of the role of NPs by domain (extracted from included studies & documentary evidence)		
Domain	*Barrier	*Facilitator
		<p>Promote benefits of successful collaboration with NP (eg, greater financial rewards from greater patient load; greater accessibility for patients)</p> <p>Cite & promote Australian research that NPs service appropriately and do not over or under service & that extensions to nursing practice are used appropriately (for eg, Considine et al, 2006)</p> <p>Emphasise that NP role is expansion of nursing practice & a complement to medicine rather than an invasion of medicine – that is ability to assess & initiate interventions beyond that normally done by RN within a defined field</p> <p>Targeted information to ensure all relevant staff understand role</p>
NP factors	Skill & knowledge limitations from lack of adequate role preparation	Provision of supervision & support systems that give NPs in all settings opportunities to review & audit decision making & intervention outcomes (can be achieved by a virtual web-based linkage of NPs)
	Resistance from HCPs	<p>As well as other strategies outlined above, data collections on safety & quality of NP care in order to counter some resistance</p> <p>Strong communication, relationship & team building skills needed as well as flexibility & adaptability</p> <p>Revision of existing models of care to accommodate the NP role</p>
	CN/CNC who is transitioning to NP role may be working under	Where there is a need for both roles, the organisation needs to

Barriers & facilitators related to the implementation of the role of NPs by domain (extracted from included studies & documentary evidence)		
Domain	*Barrier	*Facilitator
	expectation that they will fulfil the two roles	support both positions
	Static career structures	Redesign the career structure to ensure clinical career progression & ensure capacity building
	A tension between service delivery & education/research	Opportunities & time for education & research activities should be protected
	Under- or mis- utilisation of NP role - related to lack of understanding of role or model of care does not accommodate NP skills & expertise	Preparatory work by organisation as outlined above required.
	Balancing multiple aspects of the role challenging	Realistic workload & balance between clinical, education, research & leadership needs to be established at an early stage in negotiation & agreement with team
Medical practitioner factors		
	Absence of appropriate funding mechanisms for employing NP	Funding resources
	Employment of a NP seen as potential impediment for physician recruitment	Provision of corrective information including that a NP will enable doctors to focus on other professional skills; will improve capacity in primary care
	Perception that continuity of care problems arise when NPs order diagnostic tests independently of physician	Use of shared patient record systems, which all team members may contribute to & withdraw information from

Barriers & facilitators related to the implementation of the role of NPs by domain (extracted from included studies & documentary evidence)		
Domain	*Barrier	*Facilitator
	Perception that potential for poorer quality of care if NPs not adequately supervised	<p>Medical practitioners with positive experiences of working with NPs share experiences with those that are incorporating NP role into practice</p> <p>Educate (all HCPs) that the characteristic of autonomous practice is what distinguishes NPs from other highly skilled nurses</p> <p>Educate that boundaries of NPs are evolving not just because of increased demands for health services but because the evidence shows that nurses have demonstrated their effectiveness & competence to provider a broader range of clinical care</p>
	Some see NPs as being 'quick fix' for a complex problem & that there is a lack of true need	<p>Marketing strategies as above</p> <p>Establishment of NP roles require needs analysis & workforce planning data to support their case</p> <p>Disseminate the evidence that NPs offer an appropriate solution to patient & workforce needs</p> <p>Share personal experiences where GPs work successfully with NPs</p> <p>Joint educational events & the development of GP based preceptorship</p>
	Liability concerns (for eg., uncertainty about legal liability when care is delegated from doctors to nurses)	<p>Clarification of areas of risk & liability</p> <p>Clinical guidelines or protocols may help to facilitate the transfer of tasks from doctors to nurses</p>

Barriers & facilitators related to the implementation of the role of NPs by domain (extracted from included studies & documentary evidence)		
Domain	*Barrier	*Facilitator
	Concerns (among GPs) about consequences of change to their consultation 'mix' from a mix of straightforward & complex consultations to all complex	Emphasising evidence that shows benefits such as reducing costs, reducing GP workload & increasing patient satisfaction may help to offset these concerns.
	Concerns about becoming deskilled	
Consumer/ patient/carer factors	Reluctance to use NP care & lack of understanding of role	Provision of information sheets that outline NP expertise & benefits such as access, reduction in waiting times Interdisciplinary rounds with the NP to visibly show the patient/family the NP's involvement with care management
	Lack of PBS prescriber numbers for NPs means that patient is liable for total cost of the medication	PBS numbers for NPs should be introduced so that NPs can function effectively
	Lack of MBS provider numbers for NPs means that patient is liable for total cost of test where hospital uses private services	MBS numbers for NPs should be introduced so that NPs can function effectively
	Duplication of assessments when the patient also needs to be seen by a medical practitioner in order to authorise diagnostic procedures (& so obtain Medicare benefits)	As above
Feasibility & sustainability	Limited opportunities for extending nursing roles by regulatory bodies	New legislation may be needed to remove unhelpful boundaries
	Opposition to extending nursing roles as HCPs seek to maintain	Education, information, examples of NP models of care best practice,

Barriers & facilitators related to the implementation of the role of NPs by domain (extracted from included studies & documentary evidence)		
Domain	*Barrier	*Facilitator
	traditional professional boundaries	benefits in terms of other team member roles
	Task delegation from doctors to nurses leaves doctors to manage the more complex patient problems which may not be welcomed	
	Delegating medical care to NPs may lead to excessive workloads unless NP numbers are increased &/or simpler tasks are delegated to other categories of nurse	Adequate staff at levels required to deliver care without encroaching on NP role
	Selecting & implementing parts of an implementation framework threatens sustained integration of the NP role	Nursing leaders must be proactive in obtaining funding, building relationships with major stakeholders & overseeing implementation plans at macro & micro levels

* merged cells indicate factor can be both facilitator and barrier

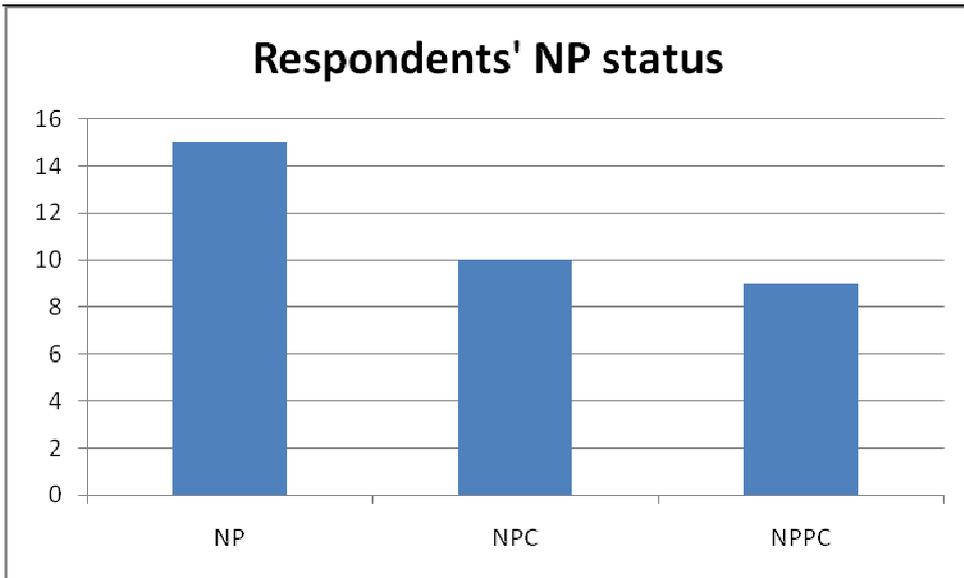
Survey of NPs & intending NPs

Sixty three (63) questionnaires were circulated to the following groups: authorised NPs; NP candidates; and nurses with intentions of becoming authorised as NPs. A total of 34 questionnaires were returned, a response rate of 54% and a significant amount of time was allowed over and above the return date to facilitate any late submissions. Not all respondents completed all aspects of the questionnaire, most notably because a number of the respondents were NP candidates as opposed to practitioners per se and therefore were unable to comment on issues relating to NP practice. The data from the questionnaires have been analysed to ascertain key issues in relation to implementation and therefore not all responses within the questionnaire will be included in this report. The relevant data will be analysed under the following headings: demographics; coherence between role importance and role reality; facilitators and barriers to the implementation of the role, prescribing and ordering of investigations; supervision, role support and service planning; and performance measures.

Demographics

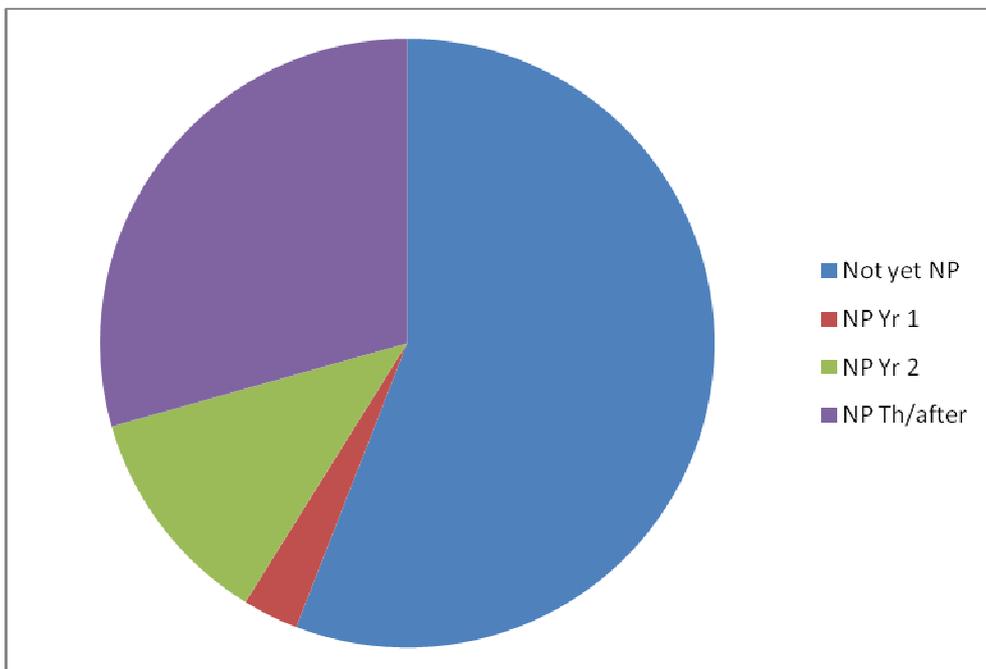
Twenty five (25) respondents were female and nine (9) were male. Respondents were asked whether they were already NPs (NPs), a NP appointed as a candidate (NPC) or a nurse preparing to be a NP candidate (NPPC). There were only fifteen (15) NPs answering the questionnaire with ten (10) NPCs and a further nine (9) NPPCs. This distribution is problematic in terms of some of the questions about the actual practice and activities of NPs as the majority of respondents were not yet NPs. Twenty six (26) respondents stated that they were (or would be) the first person to fill the NP position, three (3) advised there was one previous holder and one (1) advised there were two previous holders. One responded that currently there was no position available and three did not answer.

Figure 1 - Respondent's NP status



As can be seen in Figure 2, of those who were NPs; 1 one was a first year NP; four were 2nd year NPs; and the remaining ten were thereafter. Thirteen of the 15 were employed in a NP position under approved guidelines. These will at least provide data about NPs who have been authorised for at least three years and their experiences in terms of implementation of the role.

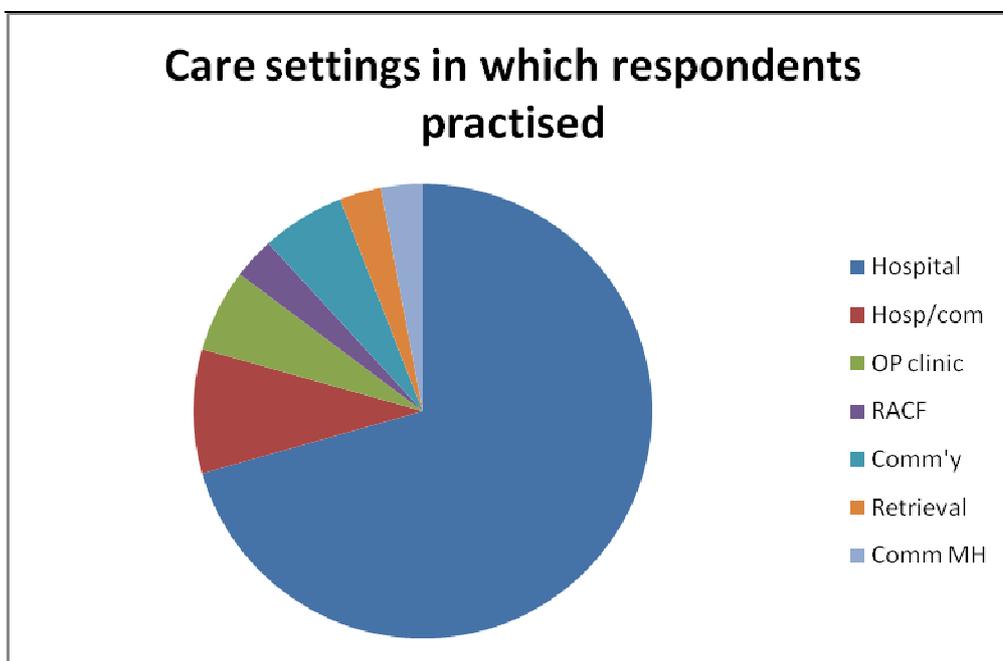
Figure 2 - Grade of NP



In terms of the care setting in which respondents practised, Figure 3 indicates that the majority (n=24) practised in hospital settings, with three (3) working across hospital and the community and the remainder in a number of community or ambulatory care settings.

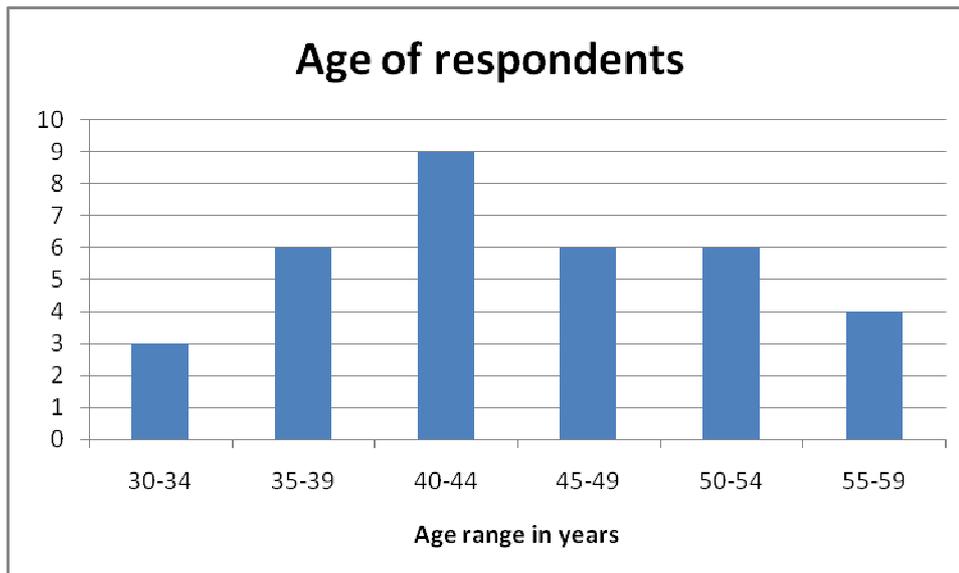
The specialist areas of practice varied significantly. Eleven (11) respondents worked in high dependency, with nine (9) in the emergency department or trauma, one in coronary care and one in neonatal intensive care. Seven worked in a range of medical settings from palliative care to epilepsy; eight (8) in mental health across the age spectrum and eight in surgical nursing including liver transplant (1), wound management (3) and orthopaedics (2). Of the three describing community health as their specialist area one worked in rural and remote retrieval and so arguably also crossed into high dependency.

Figure 3 - Care settings in which respondents practised



The ages of the respondents corresponded to those of experienced nurses overall, with the largest demographic being between 40-44 years of age and the average age being 44.64 years. In 2004, the average age for all employed nurses was 43.3 years, 2.1 years older than in 1999 and this is expected to be increasing currently.

Figure 4 - Age range of respondents



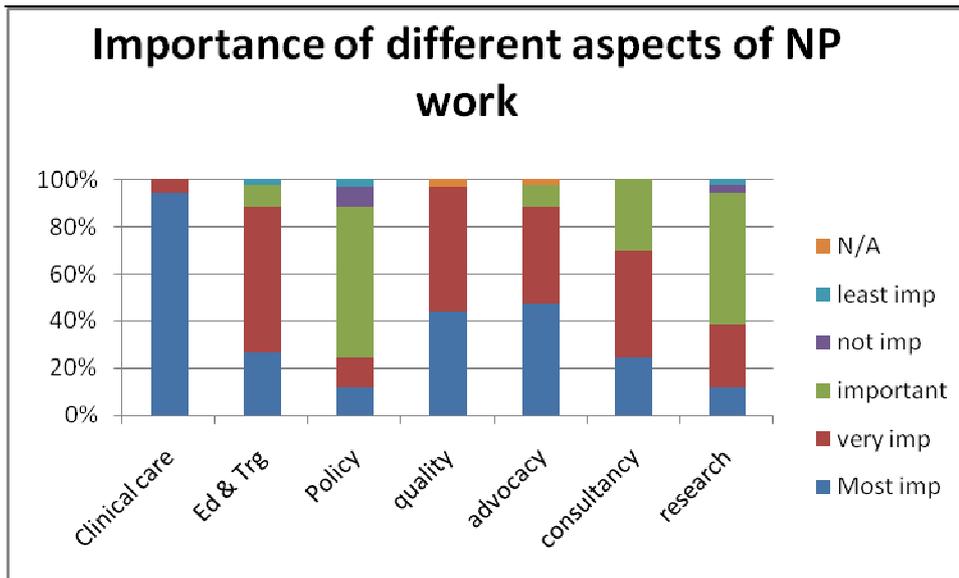
Source Australian Institute of Health and Welfare at: <http://www.aihw.gov.au/labourforce/nurses.cfm>

However, it was heartening to see a number of younger nurses applying for these senior clinical roles as it is recognised that the opportunity to be remunerated for staying in the clinical workforce is a key factor in retaining younger nurses in the profession (Walker, 2005). Nine (9) of those responding were under 40 and a review of the questionnaires confirmed that they were all NPCs or NPPCs. Twenty eight (28) of the respondents worked full time with the remaining six working a range of part-time hours, the smallest number being twenty (20) hours per week. Thirty (30) of the respondents stated that they worked Monday to Friday, three (3) reported being rostered over seven days and one worked Monday to Thursday. However within those limitations there was further variation with eight (8) of the respondents providing on-call services, one working night duty where required and five (5) working evenings.

Coherence between role importance and role activity

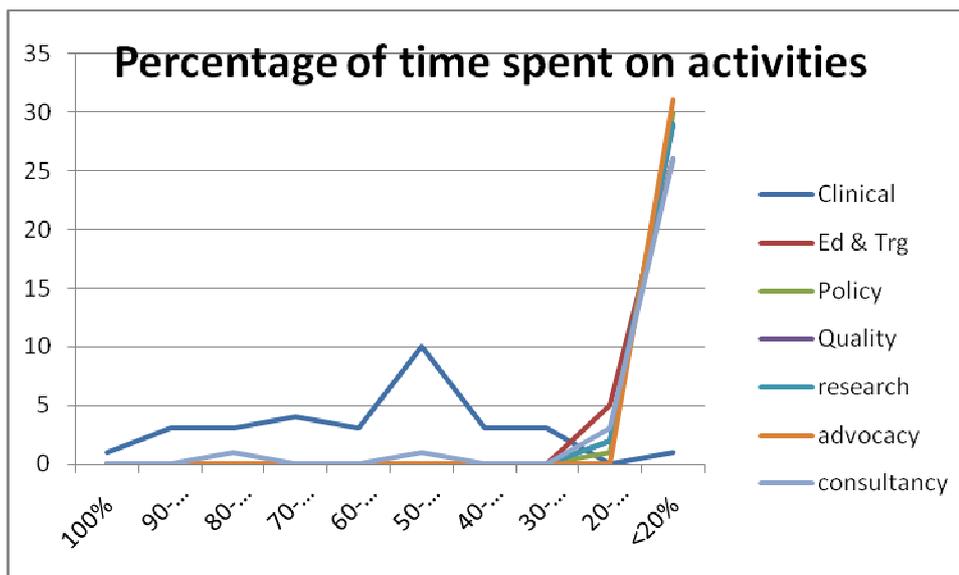
Not all respondents completed all elements of questions 9 and 10, which related to role importance and role activity. Respondents were asked to rate the importance of different aspects of their work with 1 being most important and 5 being least important. Unsurprisingly thirty two (32) respondents rated clinical care as most important and the remaining two (2) rated it as very important. Figure 5 highlights the other responses and as can be seen in Figure 5 education and training, quality and advocacy are also considered to be very important, with research and policy being seen as important.

Figure 5 - Importance of different aspects of NP work



Respondents were also asked to identify the percentage of time they spent on different activities. While there can be no direct correlation between the amount of time spent on activities versus the importance placed on them, Figure 6 demonstrates that the amount of time respondents spent on any other activity except clinical care was usually less than 20%. Most respondents spent over 50% of their time on clinical care or consultancy and the rest of their time was divided up into less than 30% time slots on a range of other activities. It may be argued that this represents a departure from the way in which respondents rated the importance of different activities. However, it may also be that the variety of different activities in which respondents spent a small amount of their other time could be an attractive feature of the role.

Figure 6 - Percentage of time spent on different activities



Facilitators and barriers to the implementation of the role

Questions 14 and 17 asked respondents to identify respectively the factors that helped develop the role and the barriers with their roles. All respondents answered some if not all elements of both questions. The responses to these two questions are set out below in tables 5 and 6. Table 5 indicates that certain personal factors such as the respondents' own communication skills, own understanding of the role, continuing professional development (CPD) personal motivation, academic qualifications (with one exception) and clinical experience were almost unanimously agreed to be factors that helped to develop the role.

Table 5 - Can you identify the factors that helped you develop your role?

Facilitator	1 – strongly disagree	2	3	4	5 – strongly agree
Own communication skills	0	0	3	7	24
Clinical experience	0	0	0	6	28
Acceptance of role N/Ms	1	2	7	15	9
Acceptance of role MDT	1	2	7	13	8
Acceptance of role MOs	0	2	5	6	21
Good organisational structure	2	6	7	10	9
Own understanding of role	0	0	6	9	16
Support from NPs			8	10	8
Support from N/M Mx Facilitators	4	4	8	10	8
Support from N/M Directors	2	3	6	9	14
Good intro/orientation	8	7	8	4	7
Academic qualifications	0	1	6	12	15
CPD	0	0	3	12	19
Support from management	2	4	9	6	13
Allocated portfolio time	13	4	4	3	5
Personal motivation	0	0	0	4	30
Networking	0	1	5	16	12
Other					

There was less agreement on whether acceptance of the role by other professional staff was identified as a helping factor, with acceptance by medical officers scoring more

strongly that acceptance from other members of the multidisciplinary team or other nursing and midwifery colleagues. Whether this means the acceptance was more helpful because it was more abundant or more helpful because it was less abundant will be clarified when barriers to developing the role are considered. Infrastructure factors such as networking, organisational structure, introduction/orientation and management support were considered to be important but several respondents made comment that they did not receive this support, hence the spread on the numerical scores. However there was overall acknowledgement of the benefit of the support received from Nursing and Midwifery Directors and Nursing and Midwifery Management (Mx) Facilitators. The majority of respondents noted that they did not receive allocated time to develop their portfolios. In addition to these, other facilitators identified in text included the identified or obvious need for the role (4) and the careful business planning or funding preparation prior to implementing the role (3). Two respondents specifically named one of the lecturers from the university.

Question 17 asked respondents whether they experienced any of a list of barriers with their role. The responses are set out below in Table 6.

Table 6 - Did you experience any of the following barriers with your role?

Possible barriers	Yes	No
Lack of multidisciplinary support	14	20
Lack of nursing support in professional issues	12	22
Lack of nursing support in clinical issues	9	25
Lack of other management support	18	16
Lack of understanding of the work of an NP by colleagues	25	9
Lack of understanding of NP role by N/M Director	3	30 (1 N/A)
Lack of understanding of NP role myself	1	33
Lack of understanding of NP role by other HCPs	24	10
Lack of understanding of NP role by N/M facilitators	8	25 (1 N/A)
Lack of access to CPD	13	20 (1 N/A)
Lack of academic qualifications	3	31
Lack of resources to set up/develop the role	20	14
Lack of secretarial support	25	9
Lack of support from other NPs	1	33
Lack of clinical support	6	28

Overall the majority of respondents reported that they did not experience a lack of support from nursing in either clinical or professional issues, from other NPs or from the multidisciplinary team. However there was slightly more ambivalence over whether there was a lack of other management support. A clear distinction was drawn in the responses between whether the NPs experienced a lack of support as a barrier in contrast to

whether they experienced a lack of understanding of their role as a barrier. Although the respondents did not report a lack of understanding of the NP role either by themselves or their Nursing or Midwifery Director to be a barrier, the majority reported the lack of understanding of the NP role by colleagues, and other health care professionals to be a barrier. Whilst access to CPD was acknowledged to be a significant facilitator to developing the roles, 13 of the 34 respondents identified a lack of access to CPD as a barrier. There were a number of freehand comments in relation to the lack of understanding of the role from GPs and some specialists, and some nurses getting confused between NPs and advanced practice nurses. Some wrote of opposition from other allied health professionals but several observed that there had been opposition originally but that this had dissipated with a greater understanding of the role.

The lack of resources to establish the role was identified as a barrier and raised repeatedly in the free text. Respondents were asked specifically in Q 13 to identify the resources they had access to at work and the responses to this question are set out in Table 7 below.

Table 7 - At work do you have access to the following?

Resource	Yes	No
Computer	34	
Internet	34	
E-mail	34	
Library services	33	1
Pager	23	11
Voice mail service	18	16
Mobile phone	13	21
Office	32	2
Secretarial support	9	25
Research assistant	1	33

All respondents had access to computer, internet and email and all but one had library access. All but two had access to an office. Other methods of contacting staff varied between pagers (n=23), voice mail services (n=18) and mobile phones (n=13) and there was also overlap between these three. The lack of secretarial support was clearly an issue with only 9 respondents identifying having access to any secretarial support and comments identified such as “no secretary is an ongoing problem”, “secretarial support would help enormously” and “all secretarial duties are performed in addition to all clinical duties”. Other support issues identified in text included access to a car and funding for clinical equipment to carry out the role.

Prescribing and ordering of investigations

Question 19 asked the respondents whether they could prescribe or order medications and nineteen (19) answered that they could not. This would correlate with the fact that

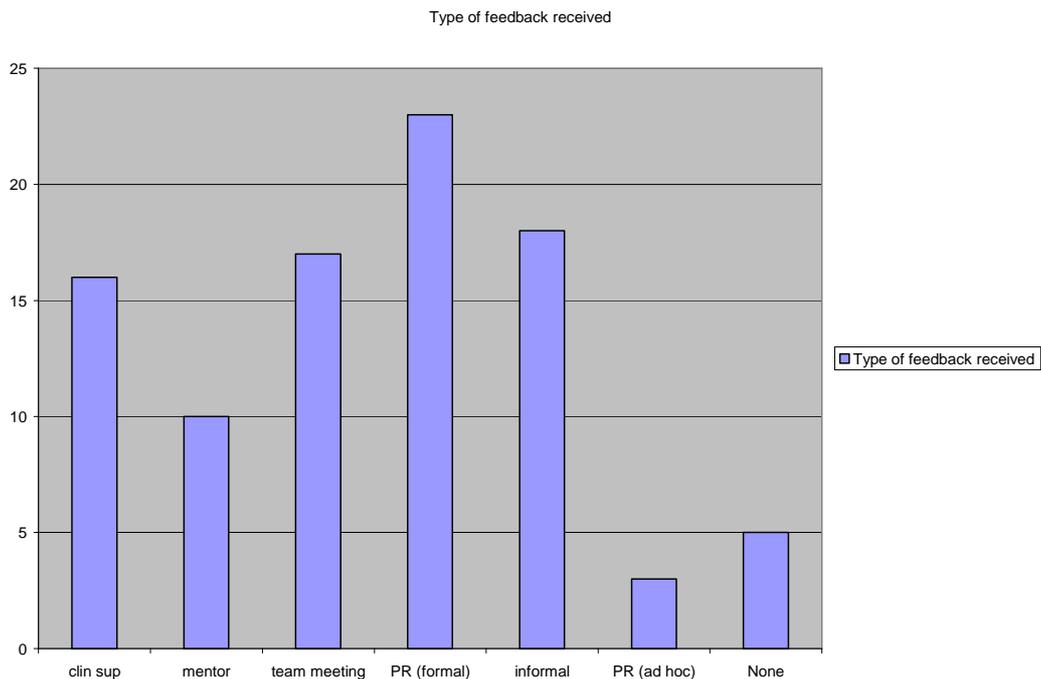
only fifteen (15) of the respondents were authorised NPs. However of those who answered yes (two (2) did not answer this question at all), only two could prescribe by prescription only, eight (8) could order by standing order only and one could order by standing order and also prescribe by prescription, meaning that the majority still did not have prescribing rights despite ten of the NPs being 'thereafter' ie in their positions longer than two years. Two mentioned the difficulty in having no access to the Pharmaceutical benefits Scheme (PBS) and one advised that their formulary was currently awaiting approval. The range of medication the NPs were able to order or prescribe varied significantly according to their area of practice and ranged from women's health topical applications such as oestriol vaginal creams to anxiolytics such as diazepam for the mental health NP. Other common medications were "over the counter medications such as paracetamol, paracetamol and codeine combinations and salbutamol inhalers and some broad spectrum antibiotics such as amoxycillin.

Respondents were also asked whether they could order laboratory (pathology) and radiology/imaging tests. Seventeen responded that they could not order pathology tests and twenty one responded that they could not order radiology or imaging tests. Four did not respond at all to the question about laboratory tests and five did not respond to the question about radiology/imaging tests. Of the thirteen (13) who responded that they could order pathology again the range was quite broad but usually specific to a specialty with one being able to order colonic biopsy specimens and other vaginal swabs. Other broader responses included "all basic blood chemistry", "microscopy, culture and sensitivity swabs", and "all urine tests". The specific responses to the imaging questions were mainly plain X-rays, with some specifying loci such as "lower limb", "soft tissue", "shoulder and hip joints". Others specified what they could not do such as "not CT", "not spine X-ray". Overall this section of the responses was extremely disappointing as it is clear that even those NPs who are well established in their role are not performing to their full potential.

Supervision, role support and service planning

Respondents were asked a number of questions about supervision, role support and service planning. These were covered mainly by questions 24, 25, 26, 29, 30, and 47 to 51. Twenty six respondents (26) reported having a personal professional development plan and six (6) stated that they did not. They were also asked whether they contributed to the development of their organisation's service plan and eighteen (18) stated that they did and fifteen (15) stated that they did not. Respondents were then asked what type of feedback and support they received about their work and/or role and who provided it. A range of feedback mechanisms were identified, the most regular being annual performance reviews (n=23). However team meetings (n=17), informal reviews (n=18) and clinical supervision and mentoring (n=16 and 10 respectively) were also identified. These are set out below at Figure 7.

Figure 7 - Type of feedback received



Feedback was provided from a range of sources with all respondents who stated they received feedback (noting that five (5) stated they received no feedback) citing more than one source. Predominantly these were patients (n=22), medical staff (n=20), families (n=18), nurses and midwives (n=16), the multidisciplinary team (n=15), Nursing/Midwifery Directors (n=13) and Directors of Nursing and Midwifery (n=11).

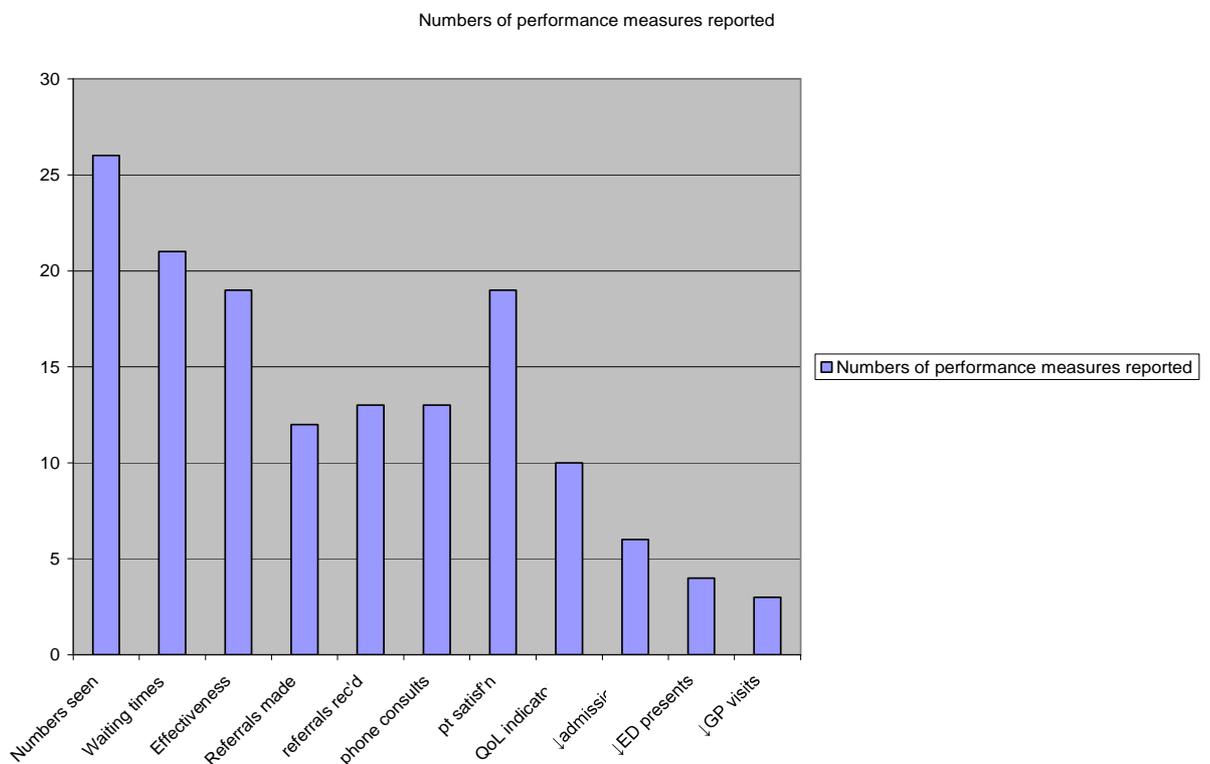
The implementation of NP roles has been demonstrated to be more successful where careful planning for the integration of the service occurs. In relation to this matter, a number of specific questions were asked. Some of these questions (numbers 47-51 inclusive) were developed from the key issues arising in the answers to the open-ended question 47 asked in the survey conducted by NSW Health (2007). Others were part of the original Irish questionnaire. Firstly, respondents were asked whether their organisation had a strategic vision for the development of the specialist service that the respondents provided. Only ten (10) responded that they did, with sixteen (16) replying that they did not and eight (8) responding that they didn't know. More specifically respondents were asked whether the need for their NP role was identified as part of a service wide service planning process. Seventeen (17) responded that it was, seven (7) responded that it was not, five (5) did not know and two (2) responded that the question was not applicable. Twenty (20) reported that they had executive support for the implementation of their position, whereas eight (8) reported that they did not. Of these eight respondents, two stated that there had been executive support initially but due to a change in senior management that had ceased. Uncertainty about funding for the NP role has been identified as potentially problematic in other studies (NSW Health, 2007) and thus respondents were asked whether the funding source for their position had been identified and was part of the health service budget cycle before the NP took up position. Thirteen (13) replied that it was, eleven (11) that it was not, three (3) did not know and four (4) stated that it was not applicable. Other aspects that are known to create difficulties for implementation and that had already been identified as barriers to implementation within this study are uncertainty about the role and lack of support from

other team members. Respondents were asked specific questions to ascertain whether any actions were taken to counteract these recognised problems. Firstly participants were asked whether the position description for the NP role had been circulated and agreed to with members of their clinical team. Eighteen (18) responded that it had and seven (7) that it had not. Four (4) did not know and two (2) stated that the question was not applicable. Secondly participants were asked whether they and their team had had the opportunity to participate in any team building exercises together. Nine (9) reported that they had, although two of these were described as having coffee with the staff prior to starting the job. Twenty one (21) reported that they had not.

Performance measures

Respondents were asked whether or not they had measured a range of performance outcomes. Respondents could identify more than one performance measure and most did so. It can be seen that the largest numbers of the performance measures reported were quantitative in nature – numbers seen and occasions of service (n=26), referrals made (n=12) and received (n=13) and telephone consultations (n=13). Others related to patient satisfaction issues such as waiting times (n=21) and patient satisfaction specifically (n=19). However, a significant number (n=19) reported assessing more qualitative matters such as the effectiveness of the interventions and quality of life indicators (n=10). These are set out below in Figure 8.

Figure 8 - Numbers of performance measures reported



Focus Groups & Interviews with Key Stakeholders

The series of interviews and focus groups that were conducted with key stakeholders revealed that the experiences in the implementation of the role of NPs in South Australia are remarkably consistent with the introduction of the role in other jurisdictions in Australia and internationally as described in the literature review. The policy processes that were designed to enable the implementation of the role, ensure the safety of the community and allay the fears of some stakeholders have tended to have had significant deterrent effects. Instead the evidence suggests that these may have even hindered the roll-out of this new role and its potential capacity to meet community health needs by introducing innovative new models of care.

Despite the considerable barriers and disincentives that were identified by the key stakeholders who participated in interviews or focus groups conducted during the course of this Review, it is laudable that there are 28 NPs who are practising and making a difference where they do practise. Evolving outside any robust and comprehensive State-wide or even service wide strategic planning or clinical service planning initiatives, NP services have been established across an eclectic array of varied services. This has usually been driven by the passion and activism of an individual nurse or a local clinical service recognising the potential for an expert nursing contribution to meeting the care needs of the people in their care. Where there are NP services, there is evidence of strong local support. Where there are not, there is a paucity of understanding about the role.

The Reviewer also met a number of NP candidates and nurses who have taken steps to prepare for authorisation but may not have been given official recognition as a candidate. The constraints include the onerous demands and processes required for a nurse to be authorised as a NP by the Nurses Board of South Australia (nsba). the links between education, employment, candidature, authorisation and capacity to prescribe medications and order imaging; the complicated requirements for NPs to establish an inflexible and narrow formulary for their use in practice; the funding restrictions that limit their capacity to provide accessible, 'one stop' care for health consumers; the lack of understanding of the role by community and other health professionals; and the lack of a critical mass of NPs to enable succession planning for the sustainability of the role.

Local initiatives of individuals or clinical teams

From the information obtained at the focus groups and interviews it became apparent early on that the introduction of a NP to a health service has not occurred as an outcome of a systematic process of State wide or health service driven clinical service planning. Instead it was usual for an individual nurse or a clinical team in a health service to be local activists for the introduction of the role. There is no doubt that in each case the

individual's or team's motives were related to a genuine need. However, it was rare that this need was assessed in a balanced and systematic way across the health service and the whole of the community health care needs. The evidence from the stakeholders interviewed was unequivocal; in most cases the introduction of the NP role has not been part of a strategic planning approach to clinical service provision to date. Relying on this means of introducing a new role into a generally conservative system where change can be difficult because of traditional cultures and professional silos has a number of risks and weaknesses.

The NPs and would be NPs who contributed to the focus groups reported consistently on the following:

Risks & weaknesses

Sustainability of the role & succession planning

When there is such a local initiative, usually of one professional, it was reported that there was limited capacity for sustainability of the service or succession planning where NPs were currently employed. In such circumstances the role is often created around the characteristics of a particular individual, with their unique collection of skills, knowledge, experience and their relationships with other members of the clinical team. While the level of trust and local support for the individual NP in this situation is of course strong, the positions themselves are vulnerable because of their uniqueness and the parochial nature of their support systems.

The potential for 'role creep' as these valuable clinicians establish their credibility and contribution is high and with this goes the potential for over extension and ultimately burn-out – a problem that several of the NPs reported.

NPs working as sole NPs in this way reported that they experienced great challenges in taking annual leave, and in taking time out to be involved in clinical review, research or ongoing professional development as there was no replacement for them. Often, less experienced and skilled nurses or medical practitioners had to pick up components of the role, but could not meet all the needs of the health consumers, thus causing frustration, resentment and irritation all round.

It was reported that the experience has been that it is often difficult to fill a position with another NP when a NP leaves their position and moves to another position, takes long term leave or resigns from their position. This was largely attributed to the lack of a critical mass of NPs in the system to replace outgoing NPs and because of the difficulties created by the necessary nexus between the authorisation process and the employment into positions. The arduousness, length of time require to obtain authorisation and the fixation upon the particular competencies of each nurse applying for authorisation were also identified as significant contributors to the difficulties in succession.

Only one service was identified as having made a strong commitment to building and taking action to develop a critical mass of NPs to reduce the risk of this service failure occurring. In doing so they were ensuring that NPs were available across all shifts and that there were opportunities for ongoing professional development, research and leave without affecting the consistency of the service.

Lack of understanding of the role

It was evident that, across other services and models of care where NPs do not work there was a lack of understanding of the application of the NP role. This lack of

understanding went across the health professions ie nursing, midwifery, medicine and the allied health professions – therefore the role is seen as idiosyncratic and its success totally vested in the individual incumbent.

While there was broad support for the introduction of a formally qualified senior clinical nursing role to meet obvious gaps in health service delivery and enhance the scope of multidisciplinary teams, it was obvious that many health professionals, including clinicians and managers who had not worked with NPs were not sure how they were prepared, what their potential roles could be and what regulatory and quality and safety risk management systems were in place to protect the community.

Health professionals who had worked with NPs internationally and in other Australian states and territories were generally very supportive of the NP role. It was reported that they were often the leaders of initiatives to have NPs introduced into their clinical unit.

Critical need for local support & nursing leadership

Individual or small groups of NPs introduced into a cross service role or into a clinical team reported their total dependence upon local team support and the support of nursing leaders in the organisation. A number of NPs and nurses preparing to move into a NP role noted that the success of the role becomes vulnerable and can fail or falter if support from one or other diminishes, or is removed with the changeover of personnel.

Without a critical mass of NPs that are well integrated into a clinical team the risk of this recurring is inevitable and significantly impedes progress in developing an understanding of the potential for the role across the health system in South Australia.

Workforce vacuum

The move of an often valued, experienced staff member into a NP role is often seen as a loss to the other (more traditional) nursing role that the individual has left behind – often as a clinical manager, team leader or educator. A number of stakeholders identified this as an area of significant concern. One person interviewed noted that nursing workforce shortages are more problematic than medical workforce shortages and that growing NPs may be ‘robbing Peter to pay Paul’. This view that there is a set pool of available nurses and introducing another career pathway will divert ‘good’ nurses from important management and other clinical roles and leave a vacuum is not supported in the nursing literature. In fact, having formally delineated roles as senior, experienced nursing clinicians, increases job satisfaction and many senior clinical nursing positions show significant longevity in tenure (NSW Health, 2007).

Support in the introduction of the NP role to the health service

A number of nurses and NPs reported there has been difficulty gaining formal recognition of the preparation requirements to obtain authorisation by achieving NP Candidate status. The appointment as a Candidate appears not to be consistent between health services and indeed, within health services. Therefore the selection and recruitment of NPs has been perceived by some as not being a fair and transparent process.

The considerable burden of the preparation of the required ‘business case’ (SA Health, 2006c) for the role has generally been placed on the individual nurse aspiring to the role of a NP of the local clinical team and has not regularly formed part of a broader clinical services planning strategy. In most cases the individual nurses and the clinical teams reported they were ill equipped to undertake this task due to the constraints of both time and skill. The preparation of a business case in such a situation is also arguable if it is

not conducted in the context of a broader health services clinical planning process.

Strengths & opportunities

Passion & commitment of individuals

The passion and commitment of individuals who have established themselves in the NP role in South Australia is evident. The respect of their colleagues and clinical leaders is demonstrated in their success and ongoing support in these roles.

Increasing the capacity of multidisciplinary clinical teams

It was reported that the addition of a NP to a clinical team was 'a missing link' and enhanced the development of robust multidisciplinary teams. It was identified that they provided a strong nursing bridge from less experienced and skilled nurses across to the roles of the medical and allied health professionals in the team, enhancing the capacity of those teams to provide safe effective care to their client group.

Provision of a recognised expert clinical pathway for nurses

During the course of the review NPs and nurses noted that the NP role offers nurses a clear clinical expert role that is valued. This has meant that those nurses who wish to remain in clinical practice are able to do so and are not required to move into management or education which tended to be the traditional and natural areas of progression for the competent and career minded nurse or midwife in the past. Many nurses left the profession when they were unable to earn more money by staying in clinical positions in the past, so strong clinical career paths are seen to one retention problem in nursing (Bonfazi, 2008). A number of NPs and nurses reported they were moving out of their clinical management and education roles back to the clinical domain of nursing because of the introduction of the NP role providing a formal pathway where the clinical nursing role was valued and recognised.

State level strategic population health clinical service planning & associated health workforce strategy

As the discussion above suggests, a difficulty with the implementation of the role of NPs in South Australia is that the introduction of the role has not been part of any comprehensive State-wide health policy, strategic planning process or health workforce development initiative. This was commented upon by a substantial majority of the individuals and groups participating in interviews or focus groups conducted during the course of this review. With few exceptions, where NPs have been introduced; or where there are NP candidates; or nurses preparing for authorisation, their presence is due to local activism. This could be from either: an individual senior nurse with skills, knowledge and experience and standing who recognised a gap in clinical services for a specific population; or, the vision of a clinical team, also recognising a need for the services that could be provided by a senior experienced clinical nurse, who then recruited or 'grew' that nurse. Inevitably it is up to the NP themselves or their clinical team to develop the business case for the introduction of the service, often without the expertise or support to do so and while providing high demand clinical services. With regards to the nurses themselves, they may also be undertaking a Masters program and preparing for authorisation as a NP by the Nurses Board of South Australia (nsba) at the same time.

A first principle of service planning for human services, including health, is to invest in the development of a formal service plan. Services best placed to flourish in the future are those that can clearly demonstrate they are meeting identified community needs through

appropriate, quality services at a reasonable cost. In preparation for possible changes, it is vitally important that every service is clear about its objectives, activity levels, consumer profiles and outcomes and, ultimately, cost.

Service planning is a process which enables the community, clinicians and other health professionals to gather and critically review relevant information and use their findings for collaborative, evidence-based service development. The question of which health professionals are best equipped to provide the service is a secondary one that requires answering once the real service need has been established.

Such a plan should include evidence of:

- > Consumer needs;
- > Strengths, weaknesses and gaps in current services;
- > Which health care providers could provide the services to meet identified consumer needs;
- > Whether NPs are a viable/preferred solution;
- > A broad outline of the roles and scopes of practice identified for the any health care providers required to provide services;
- > Available resources for the service and funding sources to be certain into the future to ensure the sustainability of the positions ;
- > How collaborative development of the role with the community and those in the current service is to be achieved;
- > Potential collateral impacts;
- > Commitment to providing a safe, quality service demonstrated by measurable outcomes; and
- > Commitment to evaluating the role and service delivery against the key South Australian health policy, contemporary clinical governance requirements and current professional standards eg through performance management, clinical review and other risk management strategies.

NPs, due to their expert knowledge, skills, experience and capacity to operate autonomously, are an important new resource available to the South Australian community and the health system in both the public and private sectors. But, the implementation of the role of NPs will only be achieved by the development of a positive partnership and collaboration with the community, nursing and midwifery professionals, medical practitioners and other key health professionals as part of this comprehensive clinical services planning process (ACT Health, 2005).

A sound clinical service plan should flow from the South Australia's Health Care Plan 2007 – 2016 (SA Government, 2007) and South Australia's Country Health Care Plan (SA Government, 2008) and should be consistent with their aims and objectives. The plan should also be consistent with associated health workforce strategies such Delivering the Future: Building a valued and sustainable nursing and midwifery workforce 2008 - 2011 (SA Health, 2008a) and the Aboriginal Nursing and Midwifery Strategy 2008 – 2011 (SA Health, 2008b). formatting

In South Australia, other than the recent mental health funding for eight mental health NPs and the initiatives within one health service, there is little evidence of the

employment of NPs being a natural outcome of a systematic and strategic State (or even regional) level population health clinical service planning initiative and an associated health workforce strategy. It was reported that the nursing profession has not had an active role in the State workforce planning strategy and hence the opportunities that NPs may have in contributing to a diversified and robust health workforce appear not to have been comprehensively canvassed. It is also not clear how the health workforce strategy is linked to the State Health Care Plan (SA Government, 2007) and the Country Health Plan (SA Government, 2008).

As noted above there appears to be concern by senior departmental officers that a push to develop the role of NPs will drain valuable resources (ie senior, competent nurses) from the traditional nursing roles in the management and education workforce which will leave a vacuum that may not be able to be filled. In the discussions with NPs and nurses preparing for authorisation there was strong support for the option of having such senior and clinically focussed roles introduced into the nursing career structure. Many expressed frustration that this had taken so long to evolve in South Australia. Frustration was also expressed at the constructive barriers that remained in place such as the difficulties to attain authorisation, the prohibitive requirements to gain access to a formulary for prescribing medications and the role's relative invisibility in the state-wide strategic planning policy. Little consideration appears to have been given to the international and national evidence that nurses are leaving the professions because there are not well recognised and rewarded pathways for expert clinical nursing care providers.

The authorisation process

The process to become authorised as a NP in South Australia came in for criticism from many of the participants in interviews and focus groups. The Nurses Act 1999 (SA) provides a relatively 'light touch' form of regulation from the point of view of the legislative framework governing NPs in South Australia. There is no mention of NPs in the Act and the authorisation of NPs arises from functions of the Nurses Board of South Australia (nbsa):

- > 'to authorise areas of specialist nursing practice areas for inclusion on the register or roll under this Act' – section 16(1)(h)
- > 'to determine and recognise special practice areas for the purposes of this Act' – section 16(1)(i).

A significant barrier was seen to be the policy and procedures that have been established by the nbsa for the purposes of authorising the specialist practice of NPs. The primary areas that are seen as constructive barriers to authorisation include:

- > The Bands that have been set as defining the contexts of practice for NPs;
- > The pathways, standards and procedural requirements for authorisation – the entry level educational requirements, the standards against which competency is required to be measured, the preparation of portfolios and the definition scopes of practice regardless of the pathway of entry to authorisation;
- > The Board's role in 'approving' the individual formularies or amendments to formularies for applicants or NPs, and the Board's defacto role in reviewing clinical practice guidelines; and
- > The linking of the authorisation process with the NP candidates employment and the requirement for employer support that is part of the requirements in the application

process.

Bands of Practice to be identified for authorisation as a NP

The nbsa has determined five (5) Bands under which a nurse may apply for authorisation as a NP. In the Application Pack, applicants are requested to identify the most appropriate Band relevant to their practice as part of the application process (nbsa, 2007a). The five (5) Bands of Practice include:

1. Rural and Remote
2. Acute Care
3. Rehabilitation/Habilitation
4. Community Health
5. Mental Health (nbsa, 2007a: 8).

The application pack states that 'NP Bands are broad and flexible so that applicants, in identifying a Band, can further identify their Area of Practice. If successful, the NP will be authorised to practise within the Band and Area of Practice under which they applied (transferable across and within employment)' (nbsa, 2007a: 8). The application pack then goes on to state: 'NPs who wish to change their Band or Area of Practice will be required to re-apply (as this would require a different specialist area of practice and evidence of competence)' (nbsa, 2007a: 8).

NPs, nurses preparing for authorisation, nurse managers and a number of other stakeholders who were participants in the interviews and focus groups criticised the bands that a NP is required to elect to work within. While the Application pack states that a band 'may include but is not limited to' the list of roles included to describe the band, a number of the participants reported that their experience was that the bands were applied rigidly and at least one of the participants reported that they had had to reapply to change their band of practice as they were moving from one geographic region to another. This was despite the fact that the scope of their practice was not significantly changing (permission was given by the participant to use this example, recognising that it may identify them). Many said the bands limited the versatility of roles and the capacity to introduce new models of care that may go across the traditional bands as well as the capacity to change employment.

In summary, the prevailing view was that the bands are not a consistent or robust categorisation system that enables the evolution of innovative models of care that may cross a number of the areas identified within more than one band.

The pathways, competency standards and procedural requirements for authorisation

The review identified a number of issues in relation to the pathways that the nbsa have defined as the means of achieving authorisation. It should be noted that currently the Board is undergoing a round of consultation with stakeholders to modify these with the anticipated changes summarised below.

NP authorisation is the responsibility of the Nursing and Midwifery Regulatory Authorities (NMRAs) within each State and Territory. All NMRAs, except the Nurses Board of South Australia (nbsa) require NP applicants to undertake an approved masters degree program. In order to align nbsa with other NMRAs a significant review of the NP authorisation process has commenced and includes:

- > Determining stakeholder's views as to whether the minimum award level for an accredited program for NP education be a masters degree.
- > Considering the adoption of the ANMC Standards for the Accreditation of NP Programs (2004) as a framework.
- > Developing further criteria to clearly communicate the Board's requirements.
- > Considering streamlining the NP authorisation process similar to that of other entry-to-practice applications.

At a recent forum stakeholders were asked what their views were on the following propositions:

- > That the minimum award level for an accredited program for NP education be a masters degree. The outcome of this voting was 29 stakeholders voted yes and 2 stakeholders voted no.
- > To create a second pathway leading to NP authorisation in South Australia. The outcome of this voting was 23 stakeholders voted yes and 8 stakeholders voted no.

Stakeholders were then asked to review in conjunction with the ANMC Standards for the Accreditation of NP Programs (2004) the inclusion of additional nbsa criteria (nbsa, 2008:4). Currently, while there may be nominally multiple pathways to become an NP there is in reality little distinction in the requirements for the authorisation processes between:

1. A nurse who applies with a Board accredited NP Masters program containing all the critical curricula components of pharmacology, clinical assessment and diagnostics and the required experience at an advanced level of practice.
2. A nurse who applies with a broad range of diploma level and general masters level educational preparation, and the required experience at an advanced level of practice.
3. A nurse who has a broad range of experience at advance practice level but little formal educational preparation.

Nurses in the latter two pathways were almost inevitably required to undertake compulsory units of pharmacology, clinical assessment and diagnostics in a Board accredited NP Masters program and also prepare a full portfolio, making the distinction between any previous forms of preparation minimal in terms of its impact on the requirements to register in South Australia.

A fourth pathway is via mutual recognition where a portfolio of supporting information is also required for the nurse to obtain authorisation which is outside the general terms of the requirements of the Mutual Recognition Act.

During the review there was a very strong response from NPs who had been through the process; nurses that were preparing for authorisation or who had attempted to obtain authorisation; nurse leaders in management and clinical positions; and medical clinical leaders alike. All were of the opinion that the application process, especially the preparation of portfolios and defining the scopes of practice were very difficult processes. The review identified that the preparation of portfolios and defining the scopes of practice appear to have had a significant alienating effect; compounded by the introduction of the plagiarism review requirements. There were also negative perceptions in relation to the consistency of the panel evaluation process and changes of personnel and process at the

Board level. Whether these perceptions are correct or not, the fact remains that such perceptions mean that the process becomes a disincentive to applicants. Only one NP stated that they felt the process was useful as it was so rigorous that it assisted them in facing the challenges they had to deal with as a NP.

In discussions with NPs, nurses preparing to become NPs and other stakeholders, there was a widely held view that the nbsa should establish a preferred pathway through a clinically relevant masters level program designed to prepare NPs and that evidence of this; registration as a nurse; and evidence of the required practice at a expert clinical level (outlined in clear guidelines) would become the only requirements for authorisation. While equivalence of other masters level programs could be argued, and the Board could exercise a discretion if there was strong evidence of equivalence, the onus would be on the nurse presenting their credentials. This would create a second pathway however; it would be a more difficult process.

Most participants argued that having the portfolio as the only means of establishing equivalence should be phased out over time as the burdens it created for nurses were untenable and in most cases the nurses pursuing this pathway had to undertake the equivalent of an accredited masters program to be able to meet the Board's requirements. There was a recommendation that this phasing out should have a sunset point set that would enable those nurses currently pursuing this pathway to complete the authorisation process. Therefore 1 July 2010 was the suggested point from which this pathway would no longer be available.

During the course of the review it was also noted that the nbsa had a local set of standards against which they evaluated the competence of a nurse to practise as a NP. The Australian Nursing and Midwifery Council have now published the National Competency Standards for the NP (2005) which were developed on a sound evidence-based platform. Many participants were adamant that South Australia should adopt these standards for the authorisation process and dispense with the South Australian standards. This seems a sensible recommendation as the ANMC standards are evidence-based; they have now been adopted by many jurisdictions in Australia, making authorisation via mutual recognition and transportability of authorisation straightforward; and as the nursing and midwifery authorities across Australia prepare for the national registration of nurses and midwives in 2010.

Link of prescribing formulary to annual practising certificate

The nbsa currently requires that a NP, who has a Prescribing Formulary approved by a NPs Prescribing Formulary Approval Sub-Committee (NPPFASC), is then required to submit evidence of this to the Board, who then issues an amended annual practising certificate to both the NP and the NPPFASC (nbsa, 2007b & 2007c). The application form for initiating this process is titled 'Application for Authorisation to Prescribe and/or Supply Medication' (nbsa, 2007d), suggesting that this authorisation is a mandatory regulatory requirement, rather than merely a notation on the practising certificate. This gives the obligation an implied weight that is disingenuous. This also places another step into the already burdensome process for authorisation as a NP that appears to have limited utility and benefit for the provision of effective, safe care. Many of the participants in the focus groups and interviews felt this was a superfluous requirement, placing yet another restriction on the potential for flexible and responsive clinical practice.

The Board's role in authorising the individual formularies or amendments to formularies for applicants or NPs is also seen by the Reviewers as burdensome, not the role of the

nursing and midwifery regulatory authority and an unnecessary restriction to practice; therefore should be discontinued.

The links between authorisation and employment

There are a number of subtle and not so subtle connections between the authorisation process for a NP and their employment status as a NP that were seen by a number of stakeholders as problematic and unnecessary. For example, in the section on referee requirements in the Application Guide of the Application Pack, the requirement states:

- 5.1 Applicants must submit the contact details of three (3) referees as part of the application.
- 5.2 Referees must be persons who are referred to or have endorsed or provided supporting documentation as part of the portfolio. One (1) referee must be an employer for whom the applicant will be working as a NP if the application is successful.
- 5.3 Where applicants are requesting assessment for medication prescribing, one (1) referee must be a representative of the body (and preferably a pharmacist) that has endorsed the Medication Prescribing Formulary.
- 5.4 Where the nbsa deems it appropriate, to clarify information or to seek further supporting information to assist in the determination of the application, the nbsa will contact referees in writing for the purpose of undertaking a telephone interview (nbsa, 2007a: 13).

The link of the authorisation process with the NP candidate's employment and the requirement for employer support is seen as extremely problematic and inappropriate by a number of stakeholders. They argue it creates another constructive barrier to nurses being able to become NPs. The view is that there should be a 'separation of powers' in relation to authorisation and employment. While the original intentions of this link are likely to have evolved from a desire not to mislead nurses in thinking that because they were authorised NPs, there would automatically be a position for them; the reality has been that unless a nurse could obtain recognition as a NP Candidate by their employer, they would not be able to be authorised. Therefore if there is not a willingness by the health service to consider NPs as a viable response to filling a gap in service in meeting the needs of the community, there is no capacity for a nurse to become a NP, no matter how meritorious their claim may be.

NP access to a medication formulary

There was universal condemnation of the current requirements for each NP to prepare and submit an individual formulary of medications to the NPs Prescribing Formulary Approval Sub-Committee (NPPFASC) used by the health service for use in their clinical practice. The criticisms ranged across:

- > The lack of consistency in the process and the requirements at a local level;
- > The micromanagement of the process at present;
- > The lack of flexibility this provides for a NP, especially those working across a varied area of practice that may take in a number of clinical conditions and the double handling that requires when a medication that may be the most suitable cannot be prescribed by a NP even with the advice and support of a medical practitioner;

- > The potential for personal bias and lack of support within a clinical team at a local level to constrain an NP in working to the full potential of their professional competence;
- > The extreme difficulty of obtaining approval through the multiple layers from local to Board level;
- > The means of identifying and providing evidence for the NP's competence to prescribe with details of the full pharmacological and physiological applications and effects of each medication has been extensively criticised as it is in isolation from the broad testing of competence across clinical assessment and clinical management which provides the context for prescribing.

Generic formularies

There is support for the development of generic formularies for broad areas of clinical practice and the access to these could then be dealt with in the outline of the scope of the role at a local level as an employment issue and relate to the NPs competence in the area they are employed to work. This would also include the capacity to add additional medications (preferably classes of medications) to the generic formulary that were relevant to a NPs role and competence. The support for these generic formularies was specifically attributable to a number of the medical practitioners interviewed as part of the review. This approach does tend to require some classification as to the context of practice (such as the bands) that may inhibit the development of innovative models of care and health consumer's access to streamlined health care and treatment.

The development of generic formularies requires a level of infrastructure at a State-wide level to develop and review such formularies such as the establishment of a committee or the referral of the obligation to a committee or team to develop and review these formularies on an ongoing basis which are not likely to be static if they are to be useful.

Access to the general formulary

There was also support for allowing NPs to have access to the general State-wide formulary with any restrictions to their use of medications or substances being as a consequence of:

INDIVIDUAL PROFESSIONAL OBLIGATIONS – the NP's scope of practice, professional competence and status as a professional and the concomitant obligations relating to their professional conduct as dictated by the following:

- > The Code of Professional Conduct for Nurses (and Midwives) (ANMC, 2008);
- > The Code of Ethics for Nurses (and Midwives) (ANMC, 2008);
- > The National Competency Standards for the NP (ANMC, 2005);
- > The educational preparation of the nurse;
- > Professional application of the skills, knowledge, judgement and experience in the individual's area of practice – scope of practice; and in a number of areas
- > Professional standards for the specific area(s) of practice developed through the relevant specialist nursing or midwifery professional association.

EMPLOYER'S CLINICAL GOVERNANCE RESPONSIBILITIES – the employer (public or private) has significant responsibility to ensure the health and safety of health consumers in their care and employees this includes ensuring that:

- > All employees have clear role and position descriptions outlining the role and requirements of the position in the health service;
- > An appropriate infrastructure exists for managing, monitoring and formulating policy concerning the safe use of medicines in the health service eg a Safe Use of Medicines Committee;
- > The clinical support, delegation and referral network for the position is in place including medical practitioners, pharmacists, clinical pharmacologists;
- > Health service policy and protocols, including prescribing guidelines for all health professionals are comprehensive;
- > Active performance management, clinical review, complaint management, incident and accident reporting systems and other quality improvement processes and risk management systems are in place through the health service.

THE NURSING AND MIDWIFERY REGULATORY AUTHORITY & HEALTH

CONSUMER 'WATCHDOG' RESPONSIBILITIES – whose primary obligations are to protect the public by managing the complaint and professional conduct standards systems relating to nurses and midwives.

STATE & AUSTRALIAN GOVERNMENT POLICY ON THE SAFE USE OF MEDICINES –

there is already a foundation of policy that restricts the prescription and supply of some medications that have been identified as only appropriate to be prescribed and supplied by a specific range of health professionals with specialist qualifications.

This latter approach to enabling NP access to a general formulary has the benefit of reducing the risk of retarding the development of innovative models of care that the participants in the interviews and focus groups indicated could occur even with the development of generic formularies. It also precludes the need for the establishment of a committee or team to develop and review these formularies which are not likely to be static if they are to be useful. This model of approach to NPs prescribing appears to be becoming the norm in many jurisdictions where the roles of NPs are developing including in the UK and the US.

Current national & State funding policy

Current Australian Government funding policy has meant that the effectiveness and efficiency of NPs working in both the public and the private health sectors, including in rural and remote areas, general practice, aged care, private hospitals etc is severely constrained. Lack of access to the MBS and PBS means that health consumers/clients are severely disadvantaged if their care is provided by a NP and they require subsidised medications available under the PBS or services subsidised by the MBS as they are not generally eligible for the subsidy.

Should they require any of these subsidised services there is a need for duplication of services as they are required then to be assessed and the medications prescribed or services such as diagnostic investigations including imaging and pathology ordered by a health professional with a provider number, generally a medical practitioner.

In small public health services and rural and remote areas the lack of access to the MBS and PBS systems can have a significant impact. Such services are dependent upon service agreements and services being provided by private health services such as community pharmacies, private imaging services etc that can only provide these with the

provision of orders by legitimate providers with provider numbers. A NP may be able to prescribe a medication for a person but the health service may not have the capacity to provide the full course of medication from its generally limited imprest supply.

This has nothing to do with the competence of the NP – it is a blanket funding policy that applies across Australia and impacts upon a health consumer's access to services and has led to the development of all manner of devices to get around the nonsense that this restriction perpetrates such as standing orders; 24 hour phone orders and Imprest systems.

The processes also place medical practitioners at a degree of legal and professional risk if they do not undertake the full clinical assessment that is required for them to make their own clinical judgements concerning investigations, treatment and care; relying on the advice of another health professional. This is particularly problematic when the health consumer is not in the same location as the medical practitioner.

During the review it was also reported that there are local anachronistic funding constraints if a health professional or health service will not accept referrals from NPs and require referrals from, for example, only medical practitioners. Once again, the burden is carried by health consumers who then have to consult a medical practitioner to obtain that referral.

Understanding of the role, politics & 'turf'

Issues relating to politics and exclusivity of domains of professional practice were raised by some participants in the interviews. It should be noted that in the main, the concerns were raised by medical practitioners. However, it was clear from the interviews and focus groups these were minority views and were not held universally across the medical profession. The issues raised are summarised as:

- > Nurses and NPs only have the capacity to operate as delegated health workers;
- > The use of the term NP describes an 'independent' NP' and hence the inference that NPs work in total isolation from other health professionals outside of a clinical team and without any accountability to anyone or organisation;
- > PBS and MBS should not be opened up to NPs or nurses it is a funding mechanism for medical practitioners, opening it up to others will be 'the thin edge of the wedge' and the 'floodgates will open';
- > The introduction of NPs to general practice and other health services will leave the medical practitioners with only the 'hard' cases and they will de-skill across the full range of practice, especially in the areas where NPs are practising.

At least one significant medical practitioner collective was unequivocal in their support and see NPs as competent partners in care who will enhance general practice. Although it was alleged that rural GPs had expressed fears that their income base may be eroded if NPs became actively involved in the provision of primary health care in rural areas, this was not a view expressed directly to the review team. A counter view was expressed by a number of respondents that a multidisciplinary team of GPs and NPs could greatly enhance the provision of care to rural and remote communities and reduce the burden for GPs, especially in locations where they are sole practitioners or in small practices covering large geographic regions.

There were some respondents within nursing and midwifery, medicine and allied health

(most particularly pharmacists) who expressed concern about the introduction of the NP role but it was not widespread. In addition, it was evident that the closer any health professionals had been to services where competent NPs were practising, the stronger the support for them.

If there were a lack of support from nursing leaders, this was identified as a potentially fatal blow to the success of a sustainable NP service being established. However, during the review there was strong support from nurse leaders for the introduction of the role and their commitment to it and the recognition of the benefits the role could bring in meeting the health needs of communities that may have been poorly served by the health system in the past.

The new career structure for nurses and midwives was criticised in that it placed authorised NPs on the same level (Level 4) as a senior advanced practice nurse, a nurse with no protected title and no specific qualifications or requirements to be at that level. In discussions, it was noted that it would be most unusual for a senior advanced practice nurse to be able to move into this level and that this class of nurse had been included in the level because of the extreme difficulties that some nurses had experience in obtaining authorisation and/or the support of their employer to become NPs. Indeed any senior nurse working in advanced practice that was promoted to that level would be recognised as working at the level of an authorised NP.

It would appear that the concerns of nursing managers and leaders were related to the lack of well planned strategies and the accompanying resources for the development and implementation for the new model of service, and the risks associated with the idiosyncratic, local development of the role to date. These have then been interpreted by some key stakeholders as a lack of commitment for the role but this was not found to be the case overall. These issues could be addressed by ensuring the introduction of NPs was part of a rational strategic planning process as discussed above.

Overcoming the barriers & building on the facilitators to implementation of the role of NPs in South Australia

These recommendations have been developed to address the barriers that have arisen in relation to the introduction of the NP role. They are based on the assumption that the health needs of the South Australian community and the capacity to provide safe, effective and accessible care are paramount considerations when planning health services and identifying the health workforce to meet those needs. It is also considered essential that these requirements would be considered above all vested financial interests, political claims and 'turf' disputes.

The recent South Australia's Health Care Plan 2007-2016 (2007) and South Australia's Country Health Care Plan (2008) together provide a high level policy framework that have the potential to provide a remedy for the significant structural barriers and disincentives that have retarded the introduction of the role of NPs in South Australia. In addition the policies Delivering the Future: the building of a valued and sustainable nursing and midwifery workforce 2008 – 2011 (SA Health 2008) and the Aboriginal Nursing and Midwifery Strategy 2008 – 2011 have also recently been announced. With those policies, the State workforce plan and the clinical service planning guidelines currently under development the NP role has the potential to evolve in a more appropriate and rational way, based on building a sustainable and competent health workforce to meet the specific needs of the communities that make up the population of South Australia.

The findings from the interviews, focus groups and survey are remarkably consistent with those from the literature and the recommendations and the rationale from these flow from the evidence that has been collected through the three arms of this review and in reviewing the policies and instruments that currently inform the implementation of the role of the NP in South Australia.

Some of the recommendations go to addressing the barriers associated with the macro organisational issues such as clinical services planning, identifying the scope of clinical practice, authorisation and funding. Others go to the more cultural and local barriers to implementation such as the lack of understanding of the role, the local initiatives needed to ensure workplaces are prepared and the supports in place for the introduction of innovative models of care and new members of the health workforce.

1. Strategic clinical services planning

With few exceptions, where NPs have been introduced; or where there are NP candidates; or nurses preparing for authorisation, their presence is due to local activism. It has been the NP themselves or their clinical team who have had to develop the business case for the introduction of the service, often without the expertise or support to do so and while providing high demand clinical services. Yet all national and international evidence indicates the vulnerability of such a valuable workforce commodity may be placed at great risk if its introduction is not embedded in a comprehensive State-wide health policy, strategic planning process and concomitant health workforce development initiative.

Services best placed to flourish in the future are those that can clearly demonstrate they are meeting identified community needs through appropriate, quality services at a reasonable cost. Service planning enables the community, clinicians, managers and other stakeholders to gather and critically review relevant information and use their findings for collaborative, evidence-based service development. The question of which health professionals are best equipped to provide the service is a secondary one that requires answering once the real service need has been established.

In introducing new models of care and new roles a number of factors are considered critical for successful implementation and sustainability. It is important to ensure that resources for supports and facilitators for the incumbents in the role are in place. These include a critical mass of those in new NP roles to support each other and define the service to enable sustainability and succession planning. There is also a need for clarity about the role for all concerned; and support and advocacy for the role demonstrated by the leaders in the service is critical.

NPs, due to their expert knowledge, skills, experience and capacity to operate autonomously, are an important new resource available to the South Australian community and the health system in both the public and private sectors. But, the implementation of the role of NPs will only be achieved by the development of a positive partnership and collaboration with the community, nursing and midwifery professionals, medical practitioners and other key health professionals as part of this comprehensive clinical services planning process. The addition of NPs to a clinical team has been seen as 'a missing link' and enhanced the development of robust multidisciplinary teams. It was identified that they provided a strong nursing bridge from less experienced and skilled nurses across to the roles of the medical and allied health professionals in the team, enhancing the capacity of those teams to provide safe effective care to their client group.

A sound clinical service plan should flow from the South Australia's Health Care Plan 2007 – 2016 and South Australia's Country Health Care Plan and should be consistent with their aims and objectives. The plan should also be consistent with associated health workforce strategies such Delivering the Future: Building a valued and sustainable nursing and midwifery workforce 2008 - 2011 and the Aboriginal Nursing and Midwifery Strategy 2008 – 2011.

RECOMMENDATIONS:

- 1.1 Utilisation of NPs is an integral and central part of the clinical service planning and associated health workforce strategy that underpins the implementation of the goals outlined in South Australia's Health Care Plan 2007 – 2016 and other relevant strategic plans.**
- 1.2 There is a clear description of the NP role for the purposes of clinical services planning. This identifies that NPs demonstrate expert clinical practice in:**
 - > Clinical assessment**
 - > Clinical judgment and its implementation**
 - > Clinical diagnostics and therapeutics**
 - > Clinical evaluation and assessment,****and that this expert level knowledge, skills and judgment are transferable across all clinical practice contexts.**
- 1.3 A specific strategy is built into future clinical service development that includes education, orientation and ongoing clinical team building initiatives and support to enable clear understanding and integration of all roles within clinical teams.**
- 1.4 A dedicated public information/communication strategy is developed and implemented to assist health consumers and health service providers to understand new models of care that may include innovative roles such as NPs, intensive care paramedics and physicians assistants.**
- 1.5 To enable the ongoing provision of consistent, effective and safe care for people in the community, where any new clinical roles are to be introduced as part of the roll out of a clinical services plan, consideration must be given to the implementation strategy and the development of the infrastructure to ensure the effectiveness and sustainability of those roles.**
- 1.6 The Department and Regions consider opportunities to utilise nurse practitioners in the development of these clinical services plans.**

2. Regulatory requirements for authorisation

Elaborate and onerous authorisation processes for NPs were identified both in the literature and in South Australia as significant barriers to the introduction of NPs. The burden of meeting the educational and other requirements for authorisation as a NP were identified by nurses and their clinical colleagues in medicine and the allied health professions as being too great and an active deterrent to senior, experienced nurses who may be seeking a clinically focussed means of progressing their career in nursing. The primary areas that are seen as constructive barriers to authorisation include:

- > The Bands that have been set as defining the contexts of practice for NPs;**
- > The pathways, standards and procedural requirements for authorisation – the entry level educational requirements, the standards against which competency is required to be measured, the preparation of portfolios and the definition scopes of practice regardless of the pathway of entry to authorisation;**

- > The Board's role in 'approving' the individual formularies or amendments to formularies for applicants or NPs, and the Board's de facto role in reviewing clinical practice guidelines; and
- > The linking of the authorisation process with the NP candidate's employment and the requirement for employer support that is part of the requirements in the application process.

While the protection of the community is the paramount concern of nursing and midwifery regulatory authorities, there were strong views that the requirements could be significantly simplified; brought into line with the authorisation processes across Australia; disconnected from the separate and important obligations of the employer; enable more a flexible approach to establishing the scope of practice for each applicant to encourage more innovative models of care to develop; while ensuring their responsibility to the community.

RECOMMENDATIONS:

- 2.1 The authorisation of NPs by the Nurses Board of South Australia is separated from any requirements relating to employment or authorisation relating to prescribing or ordering of diagnostic investigations.**
- 2.2 The current banding requirements of the authorisation of NPs by the Nurses Board of South Australia are reviewed with a view to (preferably) removing them altogether or (in the alternative) ensuring greater flexibility by downgrading their status to guidance only.**
- 2.3 The nbsa adopt the Australian Nursing and Midwifery Council National Competency Standards for the NP (ANMC, 2005) as the basis for establishing the competency of nurses to be authorised as NPs in South Australia.**
- 2.4 The initiatives being undertaken by the Nurses Board of South Australia, in consultation with key stakeholders, to simplify and improve the transparency of the authorisation process for NPs, are supported and should be expedited in line with the national agenda.**
- 2.5 A clinically relevant Masters degree for NPs, with a requirement for specified experience in expert clinical practice, prescribing and diagnostics becomes the unequivocally preferred route for authorisation as NPs by the Nurses Board of South Australia, with a sunset provision on the current portfolio pathway of 1 July 2010.**

3. Policy & regulatory requirements for prescribing & diagnostics

The challenges in NPs being able to practise to their full potential was identified over and over again in the literature and in the review conducted in South Australia. The constructive barriers to NPs being able to conduct comprehensive clinical assessments, develop and implement effective treatment plans, refer to other health professionals and evaluate the quality of their interventions relate to a number of constraints. These include the excessively burdensome policy frameworks that have been built up around the development of medication formularies and authorising access to imaging; local and national funding arrangements in health care; and some of the responses to claims made by some health professions about concerns for community safety that appear to have

more to do with restrictive practices related to maintaining a monopoly.

There was unequivocal support for radical changes to the policy relating to the development of individual formularies for each NP, for which there was universal condemnation. There was general agreement that there should be a more sensible and rational approach to NP prescribing as the current system was restrictive, bureaucratically onerous and created barriers to the NPs' abilities to provide comprehensive care for their respective client groups. The development of and access to generic formularies for a generic area of practise was canvassed as an option. However, the more liberal option of not limiting access to a general formulary at State level is seen as the better option. This recognises the complex safeguards of regulation and policy that already exist that protect the public and prevent a NP from going off on a 'frolic of their own' and prescribing medications outside their competence and scope of practice; outside the scope of the role and position they fill and in conflict with the clinical governance systems in the health service where they work. These include:

- > Individual professional obligations – the NP's scope of practice, professional competence and status as a professional and the concomitant obligations relating to their professional conduct.
- > Employer's clinical governance responsibilities – the employer (public or private) has significant responsibility to ensure the health and safety of health consumers in their care and employees.
- > The nursing and midwifery regulatory authority & health consumer 'watchdog' responsibilities – whose primary obligations are to protect the public by managing the complaint and professional conduct standards systems relating to nurses and midwives.
- > State & Federal/Commonwealth Government policy on the safe use of medicines – there is already a foundation of policy that restricts the prescription and supply of some medications that have been identified as only appropriate to be prescribed and supplied by a specific range of health professionals with specialist qualifications.

This latter approach to enabling NP access to a general formulary has the benefit of reducing the risk of retarding the development of innovative models of care that the participants in the interviews and focus groups indicated could occur even with the development of generic formularies. It also precludes the need for the establishment of a committee or team to develop and review these formularies which are not likely to be static if they are to be useful. This model of approach to NPs prescribing appears to be becoming the norm in many jurisdictions where the roles of NPs are developing including the UK and the US.

The same issues in relation to the regulation and policy dictating NP prescribing also apply to NPs' access to ordering diagnostic investigations. Therefore the recommendations largely replicate those around access to formularies. Current Australian Government funding policy has meant that the effectiveness and efficiency of NPs working in both the public and the private health sectors, including in rural and remote areas, general practice, aged care, private hospitals etc is severely constrained. Lack of access to the MBS and PBS means that health consumers/clients are severely disadvantaged if their care is provided by a NP if the person requires subsidised medications available under the PBS or services subsidised by the MBS as they are not generally eligible for the subsidy. This has nothing to do with the competence of the NP – it is a blanket funding policy that applies across Australia and impacts upon a health consumer's access to services.

RECOMMENDATIONS:

- 3.1 The policy governing prescribing by NPs is separated from the authorisation processes of the Nurses Board of South Australia.**
- 3.2 Authorised NPs are considered safe to prescribe medications from a general formulary.**
- 3.3 The scope of practice for the role defined by the employer will determine the specific medications a NP may prescribe. The liability of a NP who practises outside their scope of practice is already articulated by the Codes of Professional Conduct and Ethics, National Competency Standards for the NP, the Decision Making Framework and professional conduct provisions of the regulatory legislation. In addition, clinical review, performance management and other clinical governance and risk management strategies are in place to ensure NPs practice within an appropriate scope of practice commensurate with their role, competence and professional obligations.**
- 3.4 As a matter of equity, the South Australian Government works closely with the Australian Government to provide access to the PBS for NPs to enable the provision of appropriate medications to all people requiring them.**
- 3.5 The policy governing the ordering of diagnostics by NPs is separated from the authorisation processes of the Nurses Board of South Australia.**
- 3.6 Authorised NPs are considered safe to order diagnostics.**
- 3.7 The scope of practice for the role defined by the employer will determine the diagnostic investigations a NP may order. The liability of a NP who practices outside their scope of practice is already articulated by the Codes of Professional Conduct and Ethics, National Competency Standards for the NP, the Decision Making Framework and professional conduct provisions of the regulatory legislation. In addition, clinical review, performance management and other clinical governance and risk management strategies are in place to ensure NPs practice within an appropriate scope of practice commensurate with their role, competence and professional obligations.**
- 3.8 As a matter of equity, the South Australian Government works closely with the Australian Government to provide access to the MBS by NPs to facilitate the provision of appropriate diagnostics for all the people requiring them.**

Conclusion

Despite consistent empirical evidence of the positive outcomes of NPs on health care services, health outcomes for consumers, consumer satisfaction, and the acceptance of health care professionals; the full implementation of the role in South Australia remains challenging and substantially incomplete. The differences between what is endorsed as policy and the reality of implementation in health services suggests that, without further commitment by government to establishing appropriate and integrated infrastructures, the implementation is unlikely to be successful. The Nu Prac Project recommended the introduction of NPs in South Australia in 1999 (SA Department of Human Services, 1999). However at the time of this review, only 28 NPs have been authorised by nbsa.

While there is no published failsafe implementation method, the literature does offer information on the key incentives and disincentives for health care organisations considering introducing the role. In Australia and overseas a number of approaches have been used to develop and institutionalise the NP role but there are still common disincentives. The majority of these issues fall into the primary domains of strategic organisational planning, funding and implementation around clinical services that meet the needs of the community; and the identification of the individual NP's competencies, role and scope of practice. However, within each domain there are a number of strategies that can inform and strengthen implementation and assist in countering barriers. Implementation is influenced by contextual, cultural and political factors, the mix of which varies due to local influences as well as the clinical setting in which the role is to be implemented. Incentives and disincentives will also vary according to how fixed the role is and its role elements. The recommendations from this review go to the heart of supporting the success of such strategies.

As in the literature, the process of implementation of the NP role in South Australia is as 'complex and dynamic as the roles themselves' (NCPDMN, 2005:25). Defining the NP role and scope of practice for all settings in which an NP may practise is not a straightforward or absolute matter (Pearson et al, 2007). There is undoubtedly a convergence of macro organisational issues (for instance, the authorisation process, identification of the scope of practice, formulary development requirements and lack of access to MBS and PBS funding) and cultural and organisational barriers and facilitators that have created a complex implementation environment and which are often in tension (for example, lack of support for nurses seeking career advancement in clinical practice and the lack of cogent organisational clinical service planning and the resistance from some health care professionals; succession planning and local activism for the establishing positions in certain areas). However, the findings from this review as with many of the other evaluations suggest that barriers such as the ambivalence of health care professionals about the role of the NP, the lack of understanding of the NP role and appropriate utilisation of NPs cease as the role is fully implemented and can be addressed by several strategies. These strategies include orientation and educational

initiatives, organisational initiatives such as change management and the early management of external and internal stakeholders' expectations and form the recommendations from this review.

The recommendations addressing macro organisational barriers such as resolving the inequity of access to the PBS and MBS; integrating the introduction of the role of NPs and the new models of care that come with the role in a State-wide policy in relation to the rational planning of clinical services and the accompanying workforce planning strategy; and removing the unnecessary regulatory barriers and allowing appropriate extensions to practice, require immediate attention.

The persistent underlying issues from the literature that require resolution, go beyond the implementation process, and which influence the implementation process and the evolution and integration of the NP role are also evident in South Australia. Amongst other things, these issues are related to a need for government to endow the role with the full support needed to enable the full spectrum of responsibilities to be undertaken (for example PBS and MBS provider numbers and funding model reform); a scarcity of supportive and mentoring structures once the role is implemented; and lack of exposure by nurses, midwives and other health professionals to the concept of NPs. There is also persistent ambivalence regarding the value of the role, role configuration, value for money and the extent to which the role should be expanded (NCPDMN, 2005).

As in the ACT Health (2007) and the NSW Health (2008) evaluations, some NPs felt that support diminished once they were actually in the role and that the organisation had not yet fully determined how best to use their expertise and authority as a NP. This review unequivocally supports the view expressed by a number of stakeholders that senior clinical roles need to be included in strategic workforce and clinical planning so that they can be fully integrated and best utilised within health service delivery. This was also suggested by the CNPI (2006) in relation to NP developments in Canada.

This review also supports the findings of the literature that organisational culture is a significant barrier to full implementation (CNPI, 2006; Cummings et al, 2003; DiCenso et al, 2007) and what was missing in terms of implementation was a clear vision and use of a model or framework to guide the change process and to assist individuals in dealing with the change. Where the role is to be introduced a strategic plan and change management strategy needs to be developed to ensure success and to manage the necessary cultural shift. This should be done with the assistance of change champions to lead the implementation. In many settings the job descriptions and organisational structures have to be changed to accommodate new roles and models of care. A communication/information strategy to introduce and promote the benefits of the NP role is important. ACT Health (2007) found positive health outcomes in health care delivery within a cost-effective framework in evaluating the aged care NP role. These are important in engaging the interest of the strategic planners. Such findings should be widely disseminated throughout the health care system.

In South Australia there is a requirement for the NP to complete a 'business case' template. Ironically, this has rarely been part of a broader organisational business (clinical services) planning process and it is usually left up to the individual nurse preparing to take up the role, or the clinical team being activists for the introduction of the role. Therefore the utility and benefit of the process is largely lost. Also, as with a number of the evaluations noted in the literature, while a description of factors likely to affect implementation is requested, a request for a more detailed implementation and

monitoring plan is not making its long term utility as an evaluation tool limited.

In Australia there is concern regarding national consistency in relation to how the NP role functions, scope of practice; legislation and authorisation; level of educational preparation and funding of NP positions. This lack of consistency can result in confusion about the NP role. The Canadian study (CNPI, 2006) goes so far as to state that if a traditional local jurisdictional approach is followed in implementing recommendations associated with the NP role, systemic and long-term change will never be achieved and the progress on NP integration into the health system will be limited. The risk of this has diminished in Australia after the recommendations from the National Nursing and Nursing Education Taskforce (N3ET, 2006a) were adopted, with the development and broad acceptance of the evidence-based National Competency Standards for the NP (ANMC, 2005) and national Codes of Professional Conduct and Ethics for Nurses and Midwives (ANMC, 2008). The recommendations in this review recommend South Australia join other jurisdictions in making these the foundation for establishing the merit of applicants for authorisation as NPs.

References

- ACT Department of Health (2005a) Aged care NP pilot project (ACNPPP). ACT Government.
- ACT Health (2005b) NPs in the ACT. The framework. ACT Government.
- Appel AH and Malcolm P (2002) The triumph and continuing struggle of NPs in New South Wales, Australia. *Clinical Nurse Specialist* 16(4):203-210.
- Australian Nursing and Midwifery Council (2008) Code of Ethics for Nurses in Australia, Canberra. . Available at: www.anmc.org.au .
- Australian Nursing and Midwifery Council (2008) Code of Professional Conduct for Nurses in Australia, Canberra. Available at: www.anmc.org.au .
- Australian Nursing and Midwifery Council (2005) National Competency Standards for the NP, Canberra. Available at: www.anmc.org.au .
- Australian Nursing and Midwifery Council (2005) National Competency Standards for the Registered Nurse, Canberra. Available at: www.anmc.org.au.
- Bonfazi W (2008) Carolina Professors talk senior nurse retention. Available at: <http://include.nurse.com/apps/pbcs.dll/article?AID=/20080714/SE02/107140037>
- Canadian NP Initiative [CNPI] (2006) NPs: the time is now. Health Canada: Ottawa.
- Carryer J, Gardner G, Dunn S and Gardener A (2007a) The core role of the NP: practice, professionalism and clinical leadership. *Journal of Clinical Nursing* 16:1818-1825.
- Carryer J, Gardner G, Dunn S and Gardner A (2007b) The capability of NPs may be diminished by controlling protocols. *Australian Health Review* 31 (1):108-114.
- Chiarella M (2008) Now more than ever: the contribution of nurses and midwives to primary health care. A compendium of PHC case studies. WHO: Geneva.
- Clarín O (2007) Strategies to overcome barriers to effective NP and physician collaboration. *Journal for NPs*; September:538-548.
- Considine J, Martin R, Smit D, Jenkins J and Winter, C (2006) Defining the scope of practice of the emergency NP role in a metropolitan emergency department. *International Journal of Nursing Practice* 12:205-213.
- Cumming G, Fraser K and Tarlier D (2003) Implementing advanced NP roles in acute care. *Journal of Nursing Administration* 33(3):139-145.
- Della P (2007) The NP journey: what has been achieved and what is next. *The NP Series*; September: 8-12.
- Department of Health and Aging (undated) NP – like services in residential aged care services. Evaluation Report. Available at: <http://www.healthconnect.gov.au/internet/main/publishing.nsf/content>. Downloaded on 11 June 2008.
- Di Censo A, Auffrey L, Bryant-Lukosius D, Donald F, Martin-Misener R, Matthews S,

Opsteen J (2007) Primary health care NPs in Canada. *Canadian Nurse* 26(1):104-115.

Gardner G, Chang A, Duffield C (2007) Making nursing work: breaking through the role confusion of advanced practice nursing. *Journal of Advanced Nursing* 57(4): 382-391.

Government of South Australia (2008) South Australia's Country Health Plan: The South Australian Government's plan for country health care over the next ten years, Adelaide, 3 June.

Government of South Australia (2007) South Australia's Health Care Plan 2007 - 2016: The South Australian Government's plan for health care over the next ten years, Adelaide.

Griffin M and Milby V (2006) Developing an advanced practitioner service in emergency care: attitudes of nurses and doctors. *Journal of Advanced Nursing* 56(3):292-301.

Industrial Relations Commission South Australia (2007) Nurses/Midwives (South Australian Public Sector), Enterprise Agreement 2007, File No 5456/2007. 2 November.

Irvine D, Sidani S, Porter H, O'Brien-Pallas L and Simpson B et al (2000) organisational factors influencing NPs' role implementation in acute care settings. *Canadian Journal of Nursing Leadership* 13(3):28-35.

Jasper M (2005) New nursing roles-implications for nursing management. *Journal of Nursing Management* 13(2):93-96.

Kralik D, Trowbridge K and Maddock A (2007) Commentary on Allen J and Fabri A (2005) An evaluation of a community aged care NP service. *Journal of Clinical Nursing* 16(2): 419-421.

Lee G, Jennings J and Bailey M (2007) An exploration of staff knowledge on the NP's role in the emergency department. *Accident and Emergency Nursing* 15:79-89.

Lloyd Jones M (2005) Role development and effective practice in specialist and advanced practice roles in acute hospital settings: systematic review and meta-analysis. *Journal of Advanced Nursing* 49(2):191-209.

Middleton S and Della P (2007) NPs in the global market: the potential for cross border conversations and collaboration. Royal College of Nursing (UK) Annual Scientific Conference, Dundee, May 2007.

National Council for the Professional Development of Nursing and Midwifery (NCPDMN) (2005) A preliminary evaluation of the role of the advanced NP. NCPDMN: Dublin.

National Health and Medical Research Council, Australian Research Council, Australian Vice Chancellors' Committee (2007) National Statement on Ethical Conduct in Human Research, Australian Government, Canberra.

National Nursing & Nursing Education Taskforce (N3ET) (2005) NPs in Australia – Mapping of State/Territory NP (NP) Models, Legislation and Authorisation Processes. National Nursing & Nursing Education Taskforce Secretariat, Department of Human Services: Victoria.

National Nursing & Nursing Education Taskforce (N3ET) (2006a) Maximising education pathways for NPs. An interim report on recommendation 12. National Nursing & Nursing Education Taskforce Secretariat, Department of Human Services: Victoria.

National Nursing & Nursing Education Taskforce (N3ET) (2006b) An Atlas of the Legislation & Professional Regulation of Nursing & Midwifery in Australia. National

Nursing & Nursing Education Taskforce Secretariat, Department of Human Services: Victoria.

National Nursing & Nursing Education Taskforce (N3ET) (2006c) Towards Consistent Regulation of Nursing and Midwifery Practice in Australia: A select analysis of the legislation and professional regulation of nursing and midwifery in Australia. National Nursing & Nursing Education Taskforce Secretariat, Department of Human Services: Victoria.

NSW Health (2008) Report on evaluation of nurse/midwife practitioner and clinical nurse/midwife consultant roles. NSW Health.

Nurses Board South Australia (2008) Developments on NP Authorisation, nbsa Bulletin No 26, July, 4.

Nurses Board South Australia (2007a) Application Pack for Authorisation as a NP by the Nurses Board Of South Australia, Version 4. December.

Nurses Board South Australia (2007b) NP Candidate (NPC) Pathway for Prescribing, September.

Nurses Board South Australia (2007c) NP Pathway for Approval of Prescribing Formulary or Amendment to Existing Prescribing Formulary, September.

Nurses Board South Australia (2007d) Application for Authorisation to Prescribe and/or Supply Medication, September.

Nurses Board South Australia (2002) nbsa Professional Standards Statement for NP Practice, September.

Offredy M and Townsend J (2000) NPs in primary care. Family Practice 17(8):564-569.

Pearson A, Nay R, Ward C, Lenten L and Lewis M (2004) Victorian NP project evaluation of sixteen Phase 2 demonstration projects. Victorian Department of Human Services, Melbourne.

Pogue P (2007) The NP role: into the future. Canadian Journal of Nursing Leadership 20(2):34-8.

Queensland Health (2006) NP implementation guidelines. Queensland Government: Brisbane.

Sibbald B, Laurant M and Reeves D (2006) Advanced nurse roles in UK primary care. Medical Journal of Australia 185 (1): 10-12.

South Australia Department of Health (2008a) Delivering the Future – Building a valued and sustainable nursing and midwifery workforce 2008 – 2011, Adelaide.

South Australia Department of Health (2008b) Aboriginal Nursing and Midwifery Strategy, Adelaide.

South Australia Department of Health (2007a) Directive for Health Service Prescribing Formulary Approval Sub Committee Approving NP's Prescribing Formulary. Public Health and Coordinated Care Division. February.

South Australia Department of Health (2007b) NP Frequently Asked Questions, Nursing and Midwifery Office, May.

South Australia Department of Health (2006a) South Australian NP Prescribing Formulary Committee. Nursing Office.

South Australia Department of Health (2006b) Sample – NP Generic Job and Person Specification, February.

South Australia Department of Health (2006c) Generic NP Business Case – Template, February.

South Australia Department of Health (2004) Framework for NP/Applicants: to Gain an Approved Prescribing Formulary and/or Licence to Supply Medication. April.

South Australia Department of Health (2002) NP project - phase 2 implementation. Final report.

South Australia Department of Human Services (1999) NP Project (South Australia – Nu Prac Project) Final Report, Adelaide, October.

South Australian Social Inclusion Board (2007) Stepping Up: A Social Inclusion Action Plan for Mental Health Reform 2007-2012.

Spitzer W, Sackett, D Sibley JC, et al (1974) The Burlington randomized trial of the NP. *New England Journal Medicine* 290(5):251-256.

Truscott J (2007) NPs and GPs. Addressing the needs of older persons living in residential aged care. *Australian Family Physician* 36(9):765-767.

Turner C, Keyzer D and Rudge T (2007) Spheres of influence or autonomy? A discourse analysis of the introduction of NPs in rural and remote Australia. *Journal of Advanced Nursing* 59(1):38-46.

van Soeren M & Micevski V (2001) Success indicators and barriers to acute NP role implementation in four Ontario hospitals. *AACN Clinical Issues* 12(3):424-437.

Victorian NP Project (2004) Report of the NP implementation advisory committee, December 2001. Policy and Strategic Projects Division, Victorian Government Department of Human Services.

Walker K (2005) Reaching for the stars: career advancement and the registered nurse, *International Journal of Nursing Practice* 11: 185-190.

Wilson A, Pearson D and Hassey A (2002) Barriers to developing the NP role in primary care – the GP perspective. *Family Practice* 19(6):641-646.

Wilson J and Bunnell T (2007) A review of the merits of the NP role. *Nursing Standard*, 21 (18):35-40.

Appendices

APPENDIX A - Protocols for Interviews & Focus Groups

Amanda Adrian & Associates

REVIEW OF THE PROCESSES FOR IMPLEMENTATION OF NURSE PRACTITIONERS SINCE THE INTRODUCTION OF THE ROLE IN SOUTH AUSTRALIA

The Minister for Health in South Australia through the Department of Health has contracted with Amanda Adrian & Associates to conduct a review of the processes for implementation of nurse practitioners since the introduction of the role in South Australia.

To do this, the project team from Amanda Adrian & Associates will be taking the opportunity to contact and seek the opinions of the key stakeholders who are, and have been involved with the implementation of this role since its introduction. This is a voluntary process that will be conducted to ensure the confidentiality of the information provided by any participants and commentators through any of the mechanisms used to collect this feedback. The mechanisms that will be used will include the conduct of focus groups; the conduct of interviews with individuals; discussion with stakeholders at scheduled meetings of relevant organisations and committees; and a survey of nurse practitioners and nurse practitioner candidates preparing for authorisation as nurse practitioners.

The focus of the work will be in reviewing and seeking feedback on:

- the policy framework generally, including the authorisation processes, the process for the creation of nurse practitioner positions in health services and the documentation requirements for each of these
- the legal framework underpinning the nurse practitioner role and scope of practice
- the *Policy Framework for Nurse Practitioner/Applicants: To Gain an Approved Prescribing Formulary and/or Licence to Supply Medication Authorisation* in supporting nurse practitioners being able to prescribe in South Australia
- the barriers to nurse practitioners being introduced into the health work force in South Australia
- what improvements to the NP policy framework may be needed to provide a more consistent, efficient and streamlined system for nurses to achieve the status of nurse practitioner and health services introducing nurse practitioner services.

All data and information collected, analysed and reported upon for the purposes of the review will be managed according to the *National Statement on Ethical Conduct in Human Research (2007)*.

No interviews or focus groups or meetings will be recorded. Notes will be taken by one of the project team from Amanda Adrian & Associates. The responses to the survey and the notes from focus groups and interviews will be the property of Amanda Adrian & Associates and will be kept at the premises of this organisation in NSW. Where reports are provided to SA Health, information will be de-identified and aggregated for reporting purposes. In the cases where the information provided or a person's role is so unique that even anonymity will not disguise identity, this information will not be provided, in the interests of maintaining confidentiality.

The information obtained from the review will be analysed and provided to the Department of Health in the form of a Report with recommendations for improvement; and will not be used for any other purposes than for the review of the processes for implementation of nurse practitioners since the introduction of the role in South Australia.

It should be noted that all participants have the right to withdraw from the process at any time, or to elect to answer specific questions.

AGREEMENT

**TO PARTICIPATE IN AN INTERVIEW &/OR FOCUS GROUP
CONDUCTED AS PART OF THE REVIEW OF THE PROCESSES FOR
IMPLEMENTATION OF NURSE PRACTITIONERS SINCE THE
INTRODUCTION OF THE ROLE IN SOUTH AUSTRALIA PROJECT**

I (name) _____

Of (place of employment) _____

Agree to participate in an interviews &/or a focus group conducted for the purposes of the Review of the Processes for Implementation of Nurse Practitioners since the Introduction of the Role in South Australia project and understand what this project entails.

I understand all data and information collected, analysed and reported upon for the purposes of the review will be managed according to the guidelines of the *National Statement on Ethical Conduct in Human Research* (2007).¹

I understand that the information I provide as part of this review will be confidential and no electronic recording of the information exists. Handwritten notes will be taken during the course of the interview or focus group and kept in the custody of the independent project team at all times. Data or other information such as reports will only be provided to SA Health and will be provided in a de-identified and aggregated form to ensure my identity is protected by the independent project team from Amanda Adrian & Associates.

I understand the information obtained from the review will be analysed and provided to the Department of Health in the form of a Report with recommendations for improvement; and will not be used for any other purposes than for the review of the processes for implementation of nurse practitioners since the introduction of the role in South Australia.

I understand that I have the right to withdraw from the process at any time, or to elect to not answer specific questions.

Signature _____ **Date** _____

¹ National Health and Medical Research Council, Australian Research Council, Australian Vice Chancellors' Committee (2007) *National Statement on Ethical Conduct in Human Research*, Canberra. Available at: http://www.nhmrc.gov.au/publications/synopses/_files/e72.pdf.

APPENDIX B - Summary of Interviews & Focus Groups Conducted

Interviews and focus groups conducted

DATE	TIME	MEETING WITH	VENUE
TUESDAY 10 JUNE	8.00am	Nurse Practitioner Prescribing Formulary Committee	SA Health - City
	10.00am	Nurses Board of South Australia	Nbsa - Kensington
	11.15am	Australian Medical Association (SA Branch)	AMA - North Adelaide
	1.00pm	Country Health NP Role Development Group	Teleconference
	3.00pm	Chief Nurse	SA Health - City
	4.00pm	Pharmacy Board of South Australia	Pharmacy Board - Dulwich
	6.00pm	Australian Nurse Practitioner Association (SA)	ANF - Ridleyton
WEDNESDAY 11 JUNE	10.00am	Senior Policy Advisor responsible for coordinating the <i>South Australia Nursing and Midwifery Practice Bill 2008</i> .	SA Health - City
	12.00pm	The Queen Elizabeth Hospital NP Working Party & Focus Group	TQEH - Woodville
	2.00pm	Flinders University NP Masters Course Coordinator	Flinders University – Bedford Park
	3.00pm	Central Northern Adelaide Health Service NP Working Party & Focus Group	Royal Adelaide Hospital - City
THURSDAY 12 JUNE	8.00am	Executive Director - Workforce Development	SA Health - City
	9.15am	Chair – Medical and Dental Workforce Reform	Royal Adelaide Hospital - City
	11.00am	Nursing Director – Lyell McEwin Health Service	Lyell McEwin Health Service - Elizabeth
	2.30pm	Member Prescribing Formulary Approval Sub-Committee – Pharmacologist & Endocrinologist	Flinders Medical Centre – Bedford Park

DATE	TIME	MEETING WITH	VENUE
	3.00pm	Flinders Medical Centre NP Working Party & Focus Group	Flinders Medical Centre – Bedford Park
	5.15pm	Project Officer – Nursing and Midwifery Office SA Health	Flinders Medical Centre – Bedford Park
FRIDAY 14 JUNE	8.00am	Uni SA - NP Masters Course – Dean & Course Coordinator	University of SA - City
	10.00am	Australian Nursing Federation (SA) – State Secretary & Industrial Officer	ANF - Ridleyton
	12.00pm	Strategic Operations Group (SOG)	SA Health - City
	1.00pm	Principal Project Nurse Career Structure Implementation	SA Health - City
	3.00pm	Chief Executive – Southern Adelaide Health Service	SA Health - City
	4.30pm	Chief Nurse – SA Health	SA Health - City
THURSDAY 19 JUNE	9.45am	Chief Medical Officer – SA Health	SA Health – City
	11.00am	Chief Executive Officer – SA Divisions of General Practice	SA Divisions of General Practice – Wayville
	12.15pm	Mental Health NP Working Party & Focus Group	SA Health – City
	2.00pm	SA Medical Board	SA Medical Board – North Adelaide
	3.45pm	Nursing and Midwifery Executive Leaders Forum	Education Development Centre – Hindmarsh
MONDAY 23 JUNE	10.30am	Senior Allied Health Advisor – SA Health	Teleconference
FRIDAY 27 JUNE	3.30pm	Medical Director – SA Ambulance Service	Teleconference
THURSDAY 31 JULY	1.30pm	Country Health SA Nursing & Midwifery Leaders Forum	Teleconference
THURSDAY 21 AUGUST	11am	Director Mental Health Policy – SA Health	Teleconference

Attendees at Focus Groups Held

VENUE	NPS	NP CANDIDATES	NURSES PLANNING TO BECOME AUTHORISED	OTHER ATTENDEES	TOTAL
AUSTRALIAN NP ASSOCIATION	5	8	0		13
ROYAL ADELAIDE HOSPITAL	1	4	9		14
FLINDERS MEDICAL CENTRE	4	6	0		10
THE QUEEN ELIZABETH HOSPITAL	2	3	1	4	10
MENTAL HEALTH NURSES	0	4	0		4
TOTALS	12	25	10	4	51

APPENDIX C - Survey Instrument

Amanda Adrian & Associates

*Survey of NPs
and
Nurses Preparing to Become NPs in South
Australia

DATE FOR RETURN: 9 July 2008

On behalf of
SA Health
Nursing and Midwifery Office

15 June 2008

* Used with permission from the National Council for the Professional
Development of Nursing and Midwifery, Republic of Ireland

Dear NPs and those nurses who are preparing to become NPs,

This Survey is being conducted as part of the review of the processes for implementation of the role of NPs in South Australia.

The need to review the implementation was identified as a key priority by the Nu Prac Project Report in 1999 as part of the original framework for the establishment of NP positions in South Australia, and this is yet to be undertaken. The informal and formal feedback from NPs and applicants for authorisation as NPs is that they continue to experience difficulties in relation to the implementation of their roles and it is important to have a clear understanding of how effectively they are able to function, and what drivers and barriers are currently present.

The questionnaire that constitutes the Survey is a well-validated tool used originally by the National Council for the Professional Development of Nursing and Midwifery, in the Republic of Ireland. It has also been used in New South Wales. It has been modified only slightly to fit local conditions and reflect the terminology used in South Australia in relation health services and health professional structures. It is rather lengthy, but we would seek your patience in completing it and returning it to Amanda Adrian & Associates, the independent research team engaged to conduct the review project. A stamped addressed envelope has been provided for your convenience (to the address on the front of the survey). Alternatively you may scan and email the survey to: amanda@aadrianassoc.com.au. We would be pleased to receive your survey form by: Wednesday 9 July 2008.

We do appreciate the time you will take out of your busy lives to complete this, but it is our responsibility to ensure that you, as the central focus of the review, have a substantial opportunity to provide your views and suggestions for improvement. The results will be analysed and the findings reported with recommendations for improvement provided to SA Health. A primary objective of the project is to improve the professional clinical career paths for NPs in South Australia in the future so that they are able to function fully as part of the workforce to deliver high quality care to the people of South Australia.

There may be individuals who, by virtue of their unique roles, feel that it will be inevitable that they are identified. However, please be assured that absolutely no identifying characteristics will be published, that all data presented will be completely de-identified and all individual responses will be treated as confidential.

Very warm regards,

Amanda Adrian

PRINCIPAL

AMANDA ADRIAN & ASSOCIATES

and

Professor Mary Chiarella

PROFESSOR OF CLINICAL PRACTICE DEVELOPMENT AND POLICY RESEARCH

UNIVERSITY OF TECHNOLOGY, SYDNEY

OFFICE USE ONLY

Please answer those of the following questions you are able to

Q 1. ARE YOU (Please choose one only):

- A NP (NP)?
- A NP appointed as a candidate (NPC)?
- A nurse preparing to be a NP candidate (NPPC)?

Q 2. IF YOU ARE A NP, WHAT GRADE ARE YOU CLASSIFIED AT (Please choose one only):

- NP, Year 1
- NP, Year 2
- NP, Thereafter

Q 3. IF YOU ARE A NP, ARE YOU (Please choose one only):

- Employed in a NP position under approved guidelines?
- Employed in a NP position not under approved guidelines?
- Employed as a NP candidate?

Q 4. ARE YOU: Male Female

Q 5. IN WHICH OF THE FOLLOWING CARE SETTINGS DO YOU WORK? (Please choose one only)

- | | | | |
|-----------------------|--------------------------|---|--------------------------|
| Hospital | <input type="checkbox"/> | Community Health | <input type="checkbox"/> |
| Hospital & community | <input type="checkbox"/> | Psychiatric hospital/Mental Health facility | <input type="checkbox"/> |
| Outpatient Clinic | <input type="checkbox"/> | Day Procedure Centre | <input type="checkbox"/> |
| Residential Aged Care | <input type="checkbox"/> | Hospice | <input type="checkbox"/> |
| Other | <input type="checkbox"/> | <hr/> | |

Q 6.1 WHAT BAND OF PRACTICE ARE YOU PRACTISING IN, OR PLANNING TO PRACTISE IN? (Please choose one only)

- | | | | |
|-----------------------------|--------------------------|------------------|--------------------------|
| Rehabilitation/Habilitation | <input type="checkbox"/> | Rural and Remote | <input type="checkbox"/> |
| Acute Care | <input type="checkbox"/> | Community Health | <input type="checkbox"/> |
| Mental Health | <input type="checkbox"/> | | |

Q 6.2 WHICH OF THE FOLLOWING BEST DESCRIBE YOUR SPECIALIST AREAS OF PRACTICE? (if 'other' please note the specialty or specialties)

- | | | | |
|-------------------------|--------------------------|-----------------------|--------------------------|
| Critical Care/Emergency | <input type="checkbox"/> | Cardiac/Coronary care | <input type="checkbox"/> |
| Emergency/trauma | <input type="checkbox"/> | High dependency | <input type="checkbox"/> |

Intensive care	<input type="checkbox"/>	Neonatal intensive care	<input type="checkbox"/>
Paediatric critical care	<input type="checkbox"/>	Retrieval	<input type="checkbox"/>
Neonatology	<input type="checkbox"/>		
Other/across more than one area	<input type="checkbox"/>	<hr/>	

Mixed medical/surgical	<input type="checkbox"/>	Paediatrics	<input type="checkbox"/>
Other/across more than one area	<input type="checkbox"/>	<hr/>	

Medical nursing	<input type="checkbox"/>	Cardiology	<input type="checkbox"/>
Endocrinology	<input type="checkbox"/>	Gastroenterology	<input type="checkbox"/>
Neurology	<input type="checkbox"/>	Infection control	<input type="checkbox"/>
Oncology/haematology	<input type="checkbox"/>	Palliative care	<input type="checkbox"/>
Paediatric palliative care	<input type="checkbox"/>	Renal medicine/nephrology	<input type="checkbox"/>
Diabetes	<input type="checkbox"/>	Respiratory	<input type="checkbox"/>
General Medical nursing	<input type="checkbox"/>	Dermatology	<input type="checkbox"/>
Other/across more than one area	<input type="checkbox"/>	<hr/>	

Surgical nursing	<input type="checkbox"/>	Burns & plastics	<input type="checkbox"/>
Cardiothoracic	<input type="checkbox"/>	Ear, nose & throat	<input type="checkbox"/>
Gastro-intestinal	<input type="checkbox"/>	Neurosurgical	<input type="checkbox"/>
Ophthalmology	<input type="checkbox"/>	Orthopaedic	<input type="checkbox"/>
Gynaecology	<input type="checkbox"/>	Urology	<input type="checkbox"/>
Vascular	<input type="checkbox"/>	Wound management	<input type="checkbox"/>
General surgical nursing	<input type="checkbox"/>		
Other/across more than one area	<input type="checkbox"/>	<hr/>	

Perioperative Specialty	<input type="checkbox"/>	Anaesthetic	<input type="checkbox"/>
Perioperative	<input type="checkbox"/>	Recovery	<input type="checkbox"/>
Other/across more than one area	<input type="checkbox"/>	<hr/>	

Aged care	<input type="checkbox"/>	Continence	<input type="checkbox"/>
Gerontology	<input type="checkbox"/>		
Other/across more than one area	<input type="checkbox"/>	<hr/>	

Rehabilitation-disability	<input type="checkbox"/>	Disability	<input type="checkbox"/>
---------------------------	--------------------------	------------	--------------------------

Rehabilitation	<input type="checkbox"/>	Developmental disability	<input type="checkbox"/>
Other/across more than one area	<input type="checkbox"/>	<hr/>	

Mental Health	<input type="checkbox"/>	Adult mental health	<input type="checkbox"/>
Child & adolescent mental health	<input type="checkbox"/>	Forensic	<input type="checkbox"/>
Psycho-geriatric	<input type="checkbox"/>	Rural and remote mental health	<input type="checkbox"/>
Perinatal mental health	<input type="checkbox"/>		
Other/across more than one area	<input type="checkbox"/>	<hr/>	

Family & child health	<input type="checkbox"/>	Family planning	<input type="checkbox"/>
Family, youth & child health	<input type="checkbox"/>	Infertility & assisted reproduction	<input type="checkbox"/>
Lactation and infant feeding	<input type="checkbox"/>	Men's health	<input type="checkbox"/>
Paediatric & child health	<input type="checkbox"/>	Sexual health	<input type="checkbox"/>
Women's health	<input type="checkbox"/>		
Other/across more than one area	<input type="checkbox"/>	<hr/>	

Community health	<input type="checkbox"/>	Alcohol & substance abuse	<input type="checkbox"/>
Asthma education & management	<input type="checkbox"/>	Correctional facility nursing	<input type="checkbox"/>
Diabetes education & management	<input type="checkbox"/>	Health promotion	<input type="checkbox"/>
Health education/disease management	<input type="checkbox"/>	Indigenous health	<input type="checkbox"/>
Public health	<input type="checkbox"/>	Rural & remote health	<input type="checkbox"/>
Other/across more than one area	<input type="checkbox"/>	<hr/>	

Q 7. TO WHOM DO YOU REPORT IN RELATION TO CLINICAL MATTERS? (Please choose one only)

Clinical Service Coordinator (clinical service or unit)	<input type="checkbox"/>
Nurse/Midwife Management Facilitator (Nursing Administration)	<input type="checkbox"/>
Nursing/Midwifery Director	<input type="checkbox"/>
Director of Nursing and Midwifery	<input type="checkbox"/>
Consultant Medical Officer/Medical Director	<input type="checkbox"/>
Non-consultant hospital doctor	<input type="checkbox"/>
General practitioner (GP)	<input type="checkbox"/>
No-one	<input type="checkbox"/>
Other (please specify)	<input type="checkbox"/>

Q 8. TO WHOM DO YOU REPORT IN RELATION TO PROFESSIONAL NURSING ISSUES?

- Clinical Service Coordinator (Clinical Service or Unit)
 - Nurse/Midwife Management Facilitator (Nursing Administration)
 - Nursing/Midwifery Director
 - Director of Nursing and Midwifery
 - Consultant Medical Officer/Medical Director
 - General Practitioner
 - Non-consultant hospital doctor
 - Other (please specify)
-

Q 9. PLEASE SCORE EACH OF THESE ASPECTS OF THE NP ROLE IN TERMS OF THE IMPORTANCE TO YOUR WORK (Core Concepts Rate 1-5):

1 = Most Important 2 = Very important 3 = Important 4 = Not important
5 = Least important

- Clinical care delivery _____
- Education & training _____
- Policy writing, _____
- Quality _____
- Client /patient advocacy _____
- Consultancy _____
- Research _____

Q 10. ON A MONTHLY AVERAGE CAN YOU GIVE AN ESTIMATE OF THE PERCENTAGE OF TIME SPENT ON THE FOLLOWING AREAS?

% Activity of Practice Time

- Clinical _____
- Education & training _____
- Policy writing _____
- Quality improvement _____
- Research _____
- Client /patient advocacy _____
- Consultancy _____
- Other (please specify) _____

Q 11. PLEASE INDICATE TO WHICH AGE GROUP YOU BELONG

- 20-24 35-39 50-54
 25-29 40-44 55-59
 30-34 45-49 60-64 65+

Q 12. PLEASE INDICATE WHICH STATEMENT CLOSELY APPLIES TO YOU?

Please choose one option

- a. Full time Part time (__hrs/wk) Job share (__hrs/wk)
- b. Working pattern You may choose more than one option
- Monday-Friday
- Evening shifts
- Weekend shifts
- Night shifts
- On-Call
- Other (please specify) _____

Q 13. AT WORK DO YOU HAVE ACCESS TO THE FOLLOWING? (You may choose more than one option)

	Yes	No
A computer	<input type="checkbox"/>	<input type="checkbox"/>
The Internet	<input type="checkbox"/>	<input type="checkbox"/>
E-mail	<input type="checkbox"/>	<input type="checkbox"/>
Library services	<input type="checkbox"/>	<input type="checkbox"/>
A pager	<input type="checkbox"/>	<input type="checkbox"/>
A voice mail service	<input type="checkbox"/>	<input type="checkbox"/>
Mobile Phone	<input type="checkbox"/>	<input type="checkbox"/>
An office	<input type="checkbox"/>	<input type="checkbox"/>
Secretarial support	<input type="checkbox"/>	<input type="checkbox"/>
Research Assistant	<input type="checkbox"/>	<input type="checkbox"/>

Q 14. CAN YOU IDENTIFY THE FACTORS THAT HELPED YOU DEVELOP YOUR ROLE? (Please place a number 1-5 in the box using the following Likert scale for guidance)

Strongly Agree 5.....4..... 3.....2.....1.....Strongly disagree

- Own communication skills
- Clinical experience
- Acceptance of role by nursing/midwifery colleagues

- Acceptance of role by multidisciplinary team (other than medical staff)
- Acceptance of role by medical staff
- Good organizational structure
- Understanding of role by yourself
- Support from other NPs
- Support from Nurse/Midwife Management Facilitators
- Support from Nursing/Midwifery Directors
- Good introduction/orientation
- Academic qualifications
- Continuing professional development
- Support from management
- Allocated time to develop portfolio
- Personal motivation
- Networking with nursing/midwifery colleagues
- Other (please specify)

Q 15. HOW MANY HOURS PER MONTH DO YOU SPEND ON AVERAGE WITH THE FOLLOWING ACTIVITIES?

Activity	Hours
Multidisciplinary clinics	_____
Nurse/midwife led clinics*	_____
Direct clinical interventions with patients/clients	_____
Writing or developing guidelines	_____
Developing policies	_____
Discussion with multidisciplinary team regarding patient/client care	_____
Discussion with nurses/midwives regarding patient/client care	_____
Education & training of patients/clients	_____
Education & training of registered nurses/midwives	_____
Education & training of student nurses/midwives	_____
Education & training of multidisciplinary team	_____
Clerical-making appointments, filing & finding notes	_____
Nursing/midwifery research	_____

- Medical research (ie collecting data not used for nursing/midwifery purposes) _____
- Continuing professional development (formal courses) _____
- Continuing professional development (informal eg reflection, accessing library, clinical supervision etc) _____
- Attending meetings _____
- Travelling whilst at work _____
- Telephone consultation with nurses/midwives _____

Q 16. ON AVERAGE, HOW FAR DO YOU TRAVEL PER WEEK AS PART OF YOUR ROLE?

- | | | | |
|-----------------|--------------------------|-------------------|--------------------------|
| Less than 10 km | <input type="checkbox"/> | 10-50 km | <input type="checkbox"/> |
| 50-100 km | <input type="checkbox"/> | 100-500 km | <input type="checkbox"/> |
| 500-1000 km | <input type="checkbox"/> | More than 1000 km | <input type="checkbox"/> |

*Nurse/midwife led clinics are defined as care provided by nurses or midwives responsible for case management which includes, comprehensive patient/client assessment, clinical leadership and decision to discharge as appropriate.

Q 17. DID/DO YOU EXPERIENCE ANY OF THE FOLLOWING BARRIERS WITH YOUR ROLE? (You may choose more than one option)

	No	Yes	If Yes, please specify
Lack of multidisciplinary support	<input type="checkbox"/>	<input type="checkbox"/>	_____
Lack of nursing support on professional issues	<input type="checkbox"/>	<input type="checkbox"/>	_____
Lack of nursing support on clinical issues	<input type="checkbox"/>	<input type="checkbox"/>	_____
Lack of other managerial support	<input type="checkbox"/>	<input type="checkbox"/>	_____
A lack of understanding of the role of the NP by work colleagues	<input type="checkbox"/>	<input type="checkbox"/>	_____
A lack of understanding of the role of the NP by Nursing/Midwifery Director	<input type="checkbox"/>	<input type="checkbox"/>	_____
A lack of understanding of the role of the NP by yourself	<input type="checkbox"/>	<input type="checkbox"/>	_____
A lack of understanding of the role of the NP by other health care professionals	<input type="checkbox"/>	<input type="checkbox"/>	_____
A lack of understanding of the role of the NP by Nurse/Midwife Management Facilitators	<input type="checkbox"/>	<input type="checkbox"/>	_____
Lack of access to continuing professional development	<input type="checkbox"/>	<input type="checkbox"/>	_____
Lack of academic qualifications	<input type="checkbox"/>	<input type="checkbox"/>	_____

- Lack of resources to set up/develop the role _____
- Lack of secretarial support _____
- Lack of support from other NPs _____
- Lack of clinical support _____
- Other (please specify) _____

Q 18. ARE YOU THE FIRST PERSON TO FILL THIS NP POSITION?

- Yes
- No, there was one previous holder
- No, there were two previous holders
- No, there were three previous holders
- Don't know

Q 19. CAN YOU PRESCRIBE OR ORDER MEDICATIONS?

- No
- Yes, by prescription only
- Yes, by standing order only
- Yes, by prescription and standing order

Q 20. IF YES, THE MEDICATIONS THAT I CAN PRESCRIBE OR ORDER ARE (Please list)

Q 21. IN YOUR ROLE, CAN YOU PERFORM THE FOLLOWING?

a. Order Laboratory (Pathology) Tests? Yes No

If yes, Please specify _____

b. Order Radiology Imaging Tests? Yes No

If yes, Please specify _____

Q 22. TO WHOM CAN YOU REFER PATIENTS/CLIENTS? (You may choose more than one option)

- Dietician
 - Physiotherapist
 - Other NPs
 - Occupational therapist
 - Speech therapist
 - Radiographer
 - Community mental health nurse
 - Public health nurse
 - Social worker
 - Psychologist
 - Medical staff
 - No-one
 - Other (please specify)
-

Q 23. FROM WHOM DO YOU RECEIVE REFERRALS? (You may choose more than one option)

- Dietician
- Physiotherapist
- Other NPs
- Occupational therapist
- Speech therapist
- Radiographer
- Public health nurse
- Community mental health nurse
- Social worker
- Psychologist
- Medical staff
- Nurse/Midwives
- Self-referrals from pts/clients/relatives
- No-one
- Other (please specify)

Q 24. WHAT TYPE OF FEEDBACK/SUPPORT DO YOU RECEIVE ABOUT YOUR WORK AND/OR ROLE? (You may choose more than one option)

- Do not receive feedback at all
- Clinical supervision
- Mentorship
- Team meetings
- Formal performance review (Please specify frequency) _____
- Informal
- Ad hoc performance review
- Other (please specify)

Q 25. IF YOU DO RECEIVE FEEDBACK, FROM WHOM DO YOU RECEIVE IT? (You may choose more than one option)

- Director of Nursing/Midwifery
- Nursing/Midwifery Director
- Nurse/Midwife Management Facilitator
- Clinical Service Coordinator
- Nurses/Midwives
- Patients/clients
- Families of patients/clients
- Medical staff
- Members of the multidisciplinary team
- Other (please specify) _____

Q 26. DO YOU HAVE A PERSONAL PROFESSIONAL DEVELOPMENT PLAN?

- Yes
- No
- Don't know

Q 27. DO YOU WRITE AN ANNUAL REPORT ON YOUR ACTIVITIES?

- Yes
- No
- Don't know

Q 28. IF YOU ANSWERED YES TO Q26 TO WHOM DO YOU SEND IT?

- Clinical Service Coordinator
- Nurse/Midwife Management Facilitator
- Director of Nursing and Midwifery
- Nursing/Midwifery Director
- Chief executive
- Medical staff
- Other (please specify)

Q 29. DOES YOUR ORGANISATION HAVE A STRATEGIC VISION FOR THE DEVELOPMENT OF THE SPECIALIST SERVICE THAT YOU PROVIDE?

- Yes
- No
- Don't know

Q 30. DO YOU CONTRIBUTE DIRECTLY TO THE DEVELOPMENT OF YOUR ORGANISATION'S SERVICE PLAN?

- Yes
- No
- Don't know

Q 31. HAVE YOU EVER MEASURED THE FOLLOWING PERFORMANCE OUTCOMES FOR YOUR PATIENTS/CLIENTS? (You may choose more than one option)

	Yes	No
Numbers seen/Occasions of service	<input type="checkbox"/>	<input type="checkbox"/>
Waiting times	<input type="checkbox"/>	<input type="checkbox"/>
Effectiveness of interventions	<input type="checkbox"/>	<input type="checkbox"/>
Referrals made	<input type="checkbox"/>	<input type="checkbox"/>
Referrals received	<input type="checkbox"/>	<input type="checkbox"/>
Telephone consultations	<input type="checkbox"/>	<input type="checkbox"/>
Patient/client satisfaction	<input type="checkbox"/>	<input type="checkbox"/>
Quality of life indicators	<input type="checkbox"/>	<input type="checkbox"/>
Reduction in hospital admissions	<input type="checkbox"/>	<input type="checkbox"/>
Reduction in visits to the ED	<input type="checkbox"/>	<input type="checkbox"/>
Reduction in attendance to the GP	<input type="checkbox"/>	<input type="checkbox"/>
Other (please specify) <input type="checkbox"/>	_____	

Q 32. IF YOU MEASURE PERFORMANCE OUTCOMES, DO YOU CHANGE YOUR CLINICAL PRACTICE AS A RESULT?

- Yes
- No
- Don't know

Q 33. DO YOU HAVE THE RELEVANT POST-GRADUATE QUALIFICATION IN YOUR SPECIALIST AREA OF PRACTICE?

- No
- No, currently undertaking the course
- Yes, at Certificate level
- Yes, at Diploma level
- Yes, at Masters/honours level
- Yes, at PhD level

Q 34. DO YOU HAVE ANY OTHER POST-GRADUATE QUALIFICATION?

- No
- No, currently undertaking the course
- Yes, at Certificate level
- Yes, at Diploma level
- Yes, at Masters/honours level
- Yes, at PhD level

Access To Your Services - please mark one number on the Likert Scale only

Q 35. MY ROLE PROVIDES THE PATIENTS/CLIENTS I SEE WITH GREATER HEALTH CARE ACCESS

Strongly Agree 5.....4.....3.....2.....1.....Strongly disagree

Q 36. SINCE ESTABLISHING MY SERVICE AS AN NP PATIENTS/CLIENTS STATE THAT THEY HAVE TO TRAVEL FURTHER (LONGER DISTANCE AND MORE FREQUENTLY) TO OBTAIN ACCESS TO HEALTHCARE SERVICES

Strongly Agree 5.....4.....3.....2.....1.....Strongly disagree

Q 37. IF I HAD A PBS PRESCRIBER NUMBER IT WOULD INCREASE THE SERVICES THAT I COULD PROVIDE FOR PATIENTS/CLIENTS

Strongly Agree 5.....4.....3.....2.....1.....Strongly disagree

Q 38. IF I HAD A PBS PRESCRIBER NUMBER THE TRAVELLING TIME FOR MY PATIENTS/CLIENTS WOULD BE INCREASED

Strongly Agree 5.....4.....3.....2.....1.....Strongly disagree

Q 39. SINCE MY ROLE WAS ESTABLISHED MY PATIENTS/CLIENTS RECEIVE LESS HEALTH PROMOTION

Strongly Agree 5.....4.....3.....2.....1.....Strongly disagree

Q 40. SINCE MY ROLE WAS ESTABLISHED MY PATIENTS/CLIENTS RECEIVE MORE PRIMARY HEALTH PREVENTION ADVICE AND EDUCATION

Strongly Agree 5.....4.....3.....2.....1.....Strongly disagree

Q 41. SINCE MY ROLE WAS ESTABLISHED MY PATIENTS/CLIENTS RECEIVE LESS SECONDARY HEALTH PREVENTION ADVICE AND EDUCATION

Strongly Agree 5.....4.....3.....2.....1.....Strongly disagree

Q 42. SINCE MY ROLE WAS ESTABLISHED MY PATIENTS/CLIENTS SAY THAT THEY ARE BETTER INFORMED ABOUT THEIR CONDITIONS

Strongly Agree 5.....4.....3.....2.....1.....Strongly disagree

Q 43. SINCE MY ROLE WAS ESTABLISHED THERE IS NO DIFFERENCE TO THE TIME THAT MY PATIENTS/CLIENTS RECEIVED INTERVENTIONS

Strongly Agree 5.....4.....3.....2.....1.....Strongly disagree

Q 44. SINCE MY ROLE WAS ESTABLISHED CLIENTS PRESENT FOR TREATMENT AT AN EARLIER STAGE OF THEIR ILLNESS TRAJECTORY

Strongly Agree 5.....4.....3.....2.....1.....Strongly disagree

Q 45. I CAN ARRANGE DIAGNOSTIC TESTS QUICKLY FOR MY PATIENTS/CLIENTS

Strongly Agree 5.....4.....3.....2.....1.....Strongly disagree

Q 46. I EXPERIENCE DELAYS IN ARRANGING SPECIALIST CONSULTATIONS FOR MY PATIENTS/CLIENTS

Strongly Agree 5.....4.....3.....2.....1.....Strongly disagree

Q 47. WAS THE FUNDING SOURCE FOR YOUR POSITION IDENTIFIED AND PART OF THE HEALTH SERVICE BUDGET CYCLE BEFORE YOU TOOK UP YOUR POSITION?

Yes

- No
- Don't know
- Not applicable

Q 48. WAS THE NEED FOR THE NP ROLE YOU ARE IN IDENTIFIED AS PART OF A SERVICE WIDE SERVICE PLANNING PROCESS?

- Yes
- No
- Don't know
- Not applicable

Q 49. HAD THE POSITION DESCRIPTION FOR YOUR NP ROLE BEEN CIRCULATED AND AGREED TO WITH KEY COLLEAGUES/MEMEBERS OF THE CLINICAL TEAM YOU WORK WITH?

- Yes
- No
- Don't know
- Not applicable

Q 50. HAVE YOU AND THE CLINICAL TEAM YOU WORK WITH AS A NP HAD THE OPPORTUNITY TO PARTICIPATE IN (A) TEAM BUILDING EXERCISE(S) TOGETHER?

- Yes
- No
- Don't know
- Not applicable

Q 51. HAVE YOU HAD EXECUTIVE SUPPORT FOR YOUR ROLE AS AN NP (ie support from senior management)?

- Yes
- No
- Don't know
- Not applicable

Thank you so much for taking the time to complete this questionnaire.

Amanda Adrian & Mary Chiarella

For more information

**Nursing and Midwifery Office
Department of Health**

**PO Box 287
Rundle Mall Adelaide 5000**

**Telephone: (08) 8226 0749
Fax: (08) 8226 7602
<http://www.nursingsa.com>
nursing@health.sa.gov.au**

Non-English speaking: for information in languages other than English, call the Interpreting and Translating Centre and ask them to call the Department of Health. This service is available at no cost to you, contact (08) 8226 1990.

© Department of Health, Government of South Australia.
All rights reserved.
Printed August 2009.



**Government
of South Australia**

SA Health