Te Whare Whakakotahitanga Mo Te Hauora Taiwhenua

The Successful Design and Delivery of Rural Health Services: THE MEANING OF *SUCCESS*

Merian Litchfield
Centre for Rural Health
2002

PUBLISHER

Centre for Rural Health
Department of Public Health and General Practice
Christchurch School of Medicine and Health Sciences
University of Otago
New Zealand

ABOUT THE CENTRE

The Centre for Rural Health was established late 1994. It was funded (initially by the Southern Regional Health Authority, then the Health Funding Authority and finally by the Ministry of Health) for a series of projects to support rural health services and community involvement. The Centre was under the directorship of Martin London and Jean Ross from, respectively, rural general practitioner and rural nurse backgrounds. It was also known as the National Centre for Rural Health. The Centre closed in late 2002, with final publications being completed in 2003. The resources and reports created under the auspices of the Centre were uploaded mid 2003 to be available indefinitely.

AUTHOR(S)

Merian Litchfield RGON PhD
Litchfield Healthcare Associates (contracted to CRH)

The views expressed in this report are those of the author and do not necessarily represent the views of the Centre for Rural Health.

CITATION DETAILS

Please cite this work as follows:

LITCHFIELD Merian (2002) **The Successful Design and Delivery of Rural Health Services:The Meaning of Success** Centre for Rural Health : Christchurch, New Zealand

Accessible from www.moh.govt.nz/crh

ISBN **0-9582474-8-X** (Internet)

Please note that as a consistent pagination protocol was applied when Centre for Rural Health documents were uploaded, page numbers in this web-based version may differ from earlier hard copy versions.

DEDICATION

This report is dedicated to the memory of
Sue Dawson
who, as researcher of the
Centre for Rural Health,
1999 - May 2001,
gave the project its foundation.

ACKNOWLEDGEMENTS

Sue Dawson, formerly Rural Health Researcher for the Centre for Rural Health, led this project until May 2001. Her sudden death left a great gap and sadness in the project team. Her principled approach in conducting the project and the rigour with which she collected and collated the data and prepared interim reports provided a full and sound base from which I could proceed with analysis and discussion. I acknowledge Sue's foundational work with great respect and gratitude.

It is clear from Sue's careful reporting how much she enjoyed and appreciated the substantial participation of the many informants: rural residents and practitioners. They responded to her, willingly giving their time when, as the notes revealed, they were already under strain from the heavy demands of everyday rural life and work. Their contribution is greatly appreciated.

The funding from the Health Funding Authority made it possible for the project to be undertaken. This Government recognition of the need to support the Centre for Rural Health in attending to the predicaments of rural communities at a time of major change in the health sector was noted with appreciation by residents and practitioners alike.

The early work of project design and data collection were assisted by Nick Taylor of Taylor, Baines and Associates who made available the findings from his previous research profiling New Zealand rural communities. And the students of the Rural Health Diploma, Christchurch School of Medicine contributed by making available the community profiles they had prepared as part of their programmes of study. The willingness to share information was appreciated.

I thank Martin London, Co-Director of the Centre for Rural Health for the discussions and comments that prompted review of ideas at intervals; Simon Bidwell for his additional reflections on the international literature he had earlier reviewed; Jean Ross, Co-Director of the Centre for Rural Health and Kim Gosman, Co-Director, Directorate of Rural Health, Waikato District Health Board, for the information and conversations that kept the project on track.

Lyn Thompson and Jeanette Treacey have my warmest thanks for their support and kindness that made it possible for me to carry out the project at a distance and move between the two cities from time to time, and for Lyn's gracious assistance in preparing the document for publication.

EXECUTIVE SUMMARY

The Project

The project identified factors taken into account in the judgement of *success* of health service design and delivery. They derive from a series of qualitative studies involving members of three key rural stakeholder groups between 1999 and 2001: community residents, general practitioners and nurses. Although the numbers of informants were relatively small, they were spanned rural areas around the country with a wide range of service delivery models. Hence the data represent a diverse range of opinion and experience of current health service design and delivery in rural New Zealand.

Models of Service Delivery

The information provided by the key stakeholder groups showed the flux in health service delivery at the present time. Comments reflected the impact of declining numbers of GPs although innovation in response was viewed as successful at least in some places. The term model had many meanings with different aspects emphasised as important to success. Two distinct service systems seem to have evolved: on-call accident and medical emergency response and work-day clinic consultation for non-acute care. The excessive and increasing demands on the remaining GPs who provide both was a major source of emotive comment.

Stakeholders' Perceptions of Success

The low morale shown by both rural community residents and GPs was associated with their perception that their needs and circumstances were being ignored in their isolation from the mainstream health system, centred in the metropolitan areas. The community representatives referred to the provision of healthcare that would take account of the particular conditions of rural living in their locality, that would be appropriately responsive for all residents when needed, particularly noting cost, and that would address health in its broadest sense. They appeared to be resigned to travelling out of their areas for some services but wanted attention to be given to people's capability for accessing the range of services across distance and to move with some facility through the system. The system is currently experienced, at least by some, as inconsistent, fragmentary and costly. Communication and transport links were important factors.

GPs expressed concern about the sustainability of their medical service in rural areas, focusing on the constraints of infrastructure and funding. Collocation in the town centres, shared rosters, expanding the range of services involving employment of other health professionals, particularly nurses, were viewed as contributing to greater success. The nurses were frustrated with the limitations of their employment arrangements, contracts and service management. They emphasised their capability and potential to influence service design and delivery more effectively, particularly in providing programmes of health promotion and protection, and collaborating across services and sectors to achieve integration. The perceptions of success of healthcare design and delivery presenting differently by the two provider groups points to the need for both to be contributed to the governance of services. Their views of what was important were complementary and could not be merged into one set of factors representing providers collectively.

Sets of Factors Relevant to the Judgement of Success of Service Design and Delivery Identified by Key Stakeholder Groups:

1. The Voice of the Community

Features of 'Rurality':

- ~ *Life in remote areas*
- ~ *Characteristics of residents*
- ~ *Morale of the community*

Meaning of 'Health':

- ~ *Prevalent diseases*
- ~ *Determinants of health and illness*
- ~ *Personal health circumstances*

Qualities of Service Delivery:

- ~ *Dependability*
- ~ *Responsiveness*
- ~ *Appropriateness in time and place*

2. The Voice of General Practitioners

Infrastructure for Service Delivery:

- ~ *Physical location, facilities and technical equipment*
- ~ *Funding*
- ~ *Service management*

Position Within the Regional Service Network:

- ~ *Service integration*
- ~ *Involvement of nurses*
- ~ *Resources for networking*

Capacity of the Practice to Respond to Community Needs and Demands:

- ~ *Access to a general medical practitioner*
- ~ *Support from the community*
- ~ *A universal service*
- ~ *Affordability*

GP Morale:

- ~ *Financial viability*
- ~ *Management pressures*
- ~ *Constraints on practice*
- ~ *Strain on personal life*

3. The Voice of Rural Nurses

Facilities:

- ~ *Availability of space*
- ~ *Accessibility of supporting services*
- ~ *Technical support, particularly for communication*

Nurse role:
- ~ *Reach into the community*
- ~ *Funding for nursing work*
- ~ *Promotion of public health*
- ~ *Recognition of the nurse's work*

Achievement of Patient/Client Outcomes:
- ~ *Patients'/clients' satisfaction with service received*
- ~ *View of the responsiveness of the service*
- ~ *Changes in morbidity and mortality observed*

Relationships with GPs and Other Health Workers:
- ~ *Collaboration*
- ~ *Employee status*

Work Conditions:
- ~ *Workload*
- ~ *Hours of work*

4. The Integrated Opinion of the Centre for Rural Health Academic Staff

Qualities of Success:
- ~ *Capacity for community participation*
- ~ *Accessibility*
- ~ *Sustainability*
- ~ *Standard of service delivery*
- ~ *Standard of professional practice*

Factors of Success:
- ~ *Funding*
- ~ *Needs of clients/patients and practitioners*
- ~ *Relationships amongst stakeholders*
- ~ *Site of service delivery*
- ~ *Infrastructure*

The Promotion of Community Participation

The identified factors were drawn upon to construct an instrument that could be used as a catalyst for the dialogue between provider groups and rural communities in the design and delivery of health services under Primary Health Care Organisations. The instrument consists of a framework of the major themes representing the principles of the Primary Health Care Strategy (King, 2001): equity, appropriateness, accessibility, a high performing system. The success factors identified by the community informants are transmuted into the framework as general quality standards relating to each theme and features of rural life and healthcare that might be taken into account.

The instrument is intended as one component of a package of resources for community participation. It draws attention to what some people around the country believed to be the indicators of successful design and delivery of health services, based on their experience at this time in the current (but changing) system. As such, for communities it is information to prompt their own construction of locally tailored criteria for the design and evaluation of the services under PHOs. Together with the sets of factors identified by the provider groups the instrument

is useful for providers to prompt their self-evaluation of their capacity to respond to community need.

There was considerable attention given to Maori health concerns in data collection and are reflected in the comments of informants. There was less involvement in the conduct of the project than had been intended. Also, whereas GPs and nurses comprise the major rural health workforce, the voices of other groups and provider personnel were not represented in the data. The sets of success factors, the derived instrument and their use need to be considered in this light.

The findings of the project as a whole invite subsequent exploration of the process of *participation* of all stakeholders in the dialogue required for local service design and delivery, beyond merely involvement.

An Instrument as Catalyst for Community and Provider Participation in the Design and Delivery of Local Health Services

Equity

- **Healthcare is responsive to the circumstances of all identifiable groups of the population with particular reference to "the special relationship between Maori and the Crown under the Treaty of Waitangi".**
  Taking into account:
  - Treaty of Waitangi principles (e.g. the statement forming the foundation for the report of the Rural Expert Advisory Group to the Ministry of Health, March 2002).
  - The demographics of the particular geographic area to identify the target groups within the population, where the inequalities lie.
  - The capacity of the health service personnel and infrastructure to respond to the diverse health needs of people: e.g. respect, understanding, approachability, acceptance, flexibility.

- **A participatory process provides for a partnership amongst key stakeholders in…**
  …designing the service, given the available resources
  …identifying the criteria for evaluation of success of healthcare provision in the area.
  Taking into account:
  - Framework for governance of health services in the area that facilitates representation in participation and achieves on-going dialogue between community residents, providers and funders – "without one group being dominant".
  - Trends in health and healthcare internationally: expectations of healthcare e.g. public health, primary health care, personal health, accident & emergency response.
  - Principles of healthcare from the Government Health Strategy.
  - DHB/PHO service specification, funding and accountabilities.

- **Healthcare is designed to improve "the health status of those currently disadvantaged".**
  Taking into account:
  - The nature of deprivation in the area (e.g. Dep96): who is 'deprived', what are considered 'deprived' circumstances.
  - The service components that address the needs of disadvantaged people of the area
  - How priorities of healthcare are identified.

Appropriateness

- **Healthcare is designed according to a coherent framework of "good health and wellbeing for all New Zealanders throughout their lives".**
  Taking into account:
  - Cultural perspectives of health with particular attention to Maori and Pacific Island perspectives.
  - Holistic approach to health to address e.g. healthy rural lifestyle, the implications of having disease and disability for everyday living in the rural area.
  - Determinants of health and disease nationally and locally.
  - The range of tasks and activities required to address health needs.

- **Healthcare is responsive to the range of need of persons as individuals:**
  …urgent treatment (life-threatening accidents and medical emergencies)
  …management of chronic illness and disability
  …protection of health and prevention of diseases.
  Taking into account:
  - Accident and emergency service: integrated pathway for quickest, most efficient flow of patients to the necessary expertise, facilities and technology.
  - Sources of specialist information and expertise.
  - Networks linking generalist practitioners, nurses, doctors & other health workers with specialist practitioners and support personnel.
  - Structure for collaboration and teamwork that "enable all providers and practitioners (to) influence the organisation's decision-making, rather than one group being dominant".
  - Structure/processes/facilities that protect
    …continuity of care
    …care by personnel who are familiar with rural life and living, and the particular locality.

- **Healthcare is provided knowledgeably and safely for best outcomes.**
  Taking into account:
  - Range of health workers in relation to tasks, their qualifications / education / training, preparatory education.
  - Structures for continuing education, professional codes of conduct, ethical practice and disciplinary processes.
  - Structures to facilitate peer, interdisciplinary review of professional practice, and complaints procedures.
  - Credentialling processes for advancing professional practice.
  - Service quality improvement programmes (within DHB/PHO guidelines).

- **Advances in technology efficiently support and enhance healthcare provided.**
  Taking into account:
  - Availability/sources of up-to-date information at the practice base.
  - Procedures for review and up-dating equipment and facilities.

- **Healthcare is responsive to the need for support of whanau/families/groups to manage the care of people with non-critical and chronic illness.**
  Taking into account:
  - Knowledge, capabilities and responsibilities of health workers to attend to whanau/families/groups.

- Availability/sources of information on the range of health and welfare supports.
- Availability of mobile health workers linking with other health workers.

- **Health projects are responsive to the changing patterns of disease within the community as a whole: health promotion/protection from disease.**
  Taking into account:
  - Patterns of health problems for the area.
  - Determinants of health, disease and injuries in the area
  - National public health projects
  - Structure for developing and prioritising public health programmes.

Accessibility

- **Healthcare is reachable by everyone when needed.**
  Taking into account:
  - How people get to a service or how a service gets to people, and the support required: limitations of capability (aged, disabled, caregivers) and rural context e.g. transport, condition of roads, communication technology.
  - Degree of urgency of healthcare needed e.g. emergencies & accidents, management of chronic health conditions, advice on ailments, support for management of disability and illness, prevention of illness and exacerbation, health protection.
  - Capacity of health workers and service infrastructure to ensure people reach the right service e.g. flow of referral between mobile services to home/school/workplace, clinic/hospital base, outreach services, other sectors (housing, WINZ etc).
  - Time of services/personnel availability.
  - Availability of technology to maximise the reach (of patients and providers) to specialist advice, assessment and treatment.

- **Healthcare is affordable by everyone.**
  Taking into account:
  - Cumulative cost to the consumer of services including e.g. consultation, treatments, support therapies, referral for specialist care.
  - Cumulative cost to the provider and sustainability of the service.
  - Demographics of the area including extent of deprived circumstances and welfare support.

- **Healthcare is comprehensive and integrated.**
  Taking into account:
  - Availability/sources of information on the range of providers and expertise: location of health and welfare services in the region and their links (primary, secondary, tertiary health services; medical and nursing practice; podiatry, physiotherapy, occupational therapy, dentistry; traditional and complementary therapies; pharmacy, laboratory, x-ray; service delivery in other sectors).
  - Network structure for collaboration amongst service providers, including differentiated responsibilities of GPs and medical specialists, nurses and nursing specialists.
  - Technology and other support for flow of advice, referral and information.

A High Performing System

- **Infrastructure supports equity, appropriateness and accessibility of healthcare.**
  Taking into account:
  - Availability and standard of facilities, equipment, technological support .
  - Strategies to promote the cooperation of providers and sharing of resources.
  - Arrangements for administration and maintenance of premises that protect the time and place for professional practice
  - Workforce management, mix of skills and knowledge, retention and recruitment, locums
  - Structure for patient/client satisfaction measurement to inform quality improvement.

- **Service design and delivery are efficient, sustainable and flexible.**
  Taking into account:
  - Arrangements for service management, contracting processes
  - Strategies for cooperation amongst health workers for sharing of resources, peer support and linking activities: e.g. links, collocation.
  - Capacity to accommodate change.

- **Service design and delivery contribute to the life of the community.**
  Taking into account:
  - Needs for a thriving community life (community development/social capital)
  - Strategies to involve communities in governance of the service and in activities supporting the operation of the service e.g. voluntary car pool, ownership/maintenance of the premises, development of first aid capabilities.

Contents

APPENDIX

THE MANIOTOTO: Profile of One Locality
A summary report of the findings from a written questionnaire survey

1. Description of the Locality
- 1.1 Demographics
- 1.2 Facilities/Commodities for Rural Settlement
- 1.3 Moving & Communicating Within & Beyond the Locality
- 1.4 Maori Iwi Affiliations

2. Description of Health & Health Services
- 2.1 Health Problems
- 2.2 Health & Support Services & Their Funding
- 2.3 Health Service Model, Personnel & Support Services

3. Opinions of Success
- 3.1 Analysis
- 3.2 Discussion

INTRODUCTION

Project Purpose

This project was one of a collection of projects undertaken by the Centre for Rural Health in a programme contracted by the Health Funding Authority in 1999. The intention was to investigate what constitutes *success* in the design and delivery of rural health services as the foundation for planning and development. This required a programme of investigation to address the question of what constitutes *success* for the key stakeholders and how it might be achieved in the light of the national changes in the health sector. One thread of the work was the consideration of community participation.

The project was distinctly divided into two phases. Because the project spanned the change in Government and a major shift in conceptualisation of the public health system, the second phase occurred within a health system context requiring different emphases. In particular this involved the shift to a "community and people-focused system" and "needs-based funding for population care". In phase one a base of data was established:

- The collection and collation of data on the experience and opinions of members from three groups of key stakeholders and the academic staff of the Centre for Rural Health, undertaken by Sue Dawson (2000a,b; 2001a,b).
- A review of recent international literature on success in rural healthcare provision and community involvement, undertaken by Simon Bidwell (2001a).

Phase two, undertaken following announcement of the Primary Health Care Strategy (King, February 2001), involved the analysis of these data and integration into sets of success factors to acknowledge the distinct but complementary perspectives of consumers and providers. This provided the foundation for exploring the potential application of these findings in the more recent context of the momentum towards establishment of Primary Health Organisations.

In this report of Phase two, an overview of the sets of success factors is presented. Characteristics of "service models" that focused the responses of the provider groups. The meaning of *success* is discussed. From this understanding of *success* an instrument is constructed and presented for potential development as a catalyst for the local tailoring of design and delivery of health services. It is intended as one component of a package of resources that will inform the partnership required between all stakeholder groups.

Health Policy Context for Consideration of Success

The concept of *success* in rural health care is contextualised within the NZ health system with reference to the Government's fundamental principles stated in the recent health strategy statement. The meaning of *success* is implied in the statement of goals and objectives for service development: "the extent to which they (services) can improve the health status of the population and their potential for reducing health inequalities" (King, 2000, p.vii):

- Acknowledges the special relationship between Maori and the crown under the Treaty of Waitangi
- Good health and wellbeing for all New Zealanders throughout their lives
- An improvement in health status of those currently disadvantaged
- Collaborative health promotion and disease and injury prevention by all sectors

- Timely and equitable access for all New Zealanders to a comprehensive range of health and disability services, regardless of ability to pay
- A high-performing system in which people have confidence
- Active involvement of consumers and communities at all levels.

Report Format

These objectives provide a contemporary template of principles for both the conduct of this project and the presentation of this report. The report has three main sections:

- The meaning of *success*: the voices of three key stakeholder groups and the informed opinion of academic staff of the Centre for Rural Health:
  - ~ Community representatives
  - ~ General practitioner representatives
  - ~ Rural nurse representatives
- The successful design and delivery of health services: a discussion.
- Towards the local design and evaluation of health services: an instrument as catalyst.

SECTION I

THE MEANING OF *SUCCESS*:

The Voices of Three Key Stakeholder Groups & the Informed Opinion of Academic Staff of the Centre for Rural Health

Merian Litchfield (2002)

1. THE VOICE OF THE COMMUNITY REPRESENTATIVES

1.1 Methodology

How the communities perceive *success* was studied through telephone interviews with one, or sometimes a few, representatives of selected rural localities. The initial interview closely followed protocol to collect information about the health services available, the major health problems, the effectiveness of the services, and how the community had been involved in "actually designing or delivering health services in the area". Hence, the data collected provide both a community opinion of the services currently provided and expectations of 'what might be'.

Twenty-one rural localities were selected. The data collection procedure was not completed for five of these localities. An arrangement for data to be collected from representatives of four of these localities – with predominantly Maori residents - by the local Maori provider organisation did not eventuate because of difficulties of timing and other pressures (Dawson, 2001a).

Hence, data from sixteen localities were eventually included. They represent as much of a geo-sociological spread as possible: geographical - eight from the South Island, seven from the North Island and one from Chatham Islands; coastal and inland settlements; remote and not-so-remote economic base - agriculture, horticulture, tourism, energy, forestry, mining, fishing; ethnic mix with attention to proportion of Maori (three of the communities had over 14% Maori); new and well-established communities.

The responses of the interviews were summarised and the text returned to the informants with a request to make any corrections or modifications before returning it for analysis and reporting. An interim report was prepared by Sue Dawson collating the data from 11 areas and published by the Centre for Rural Health in February 2001. The data from the entire 16 areas were analysed for this report.

In one locality, a written form of the questionnaire was widely disseminated by one of the local health professionals and considerable effort was given to soliciting completion and return; 35 residents responded. A third of these residents responded to an additional open-ended question on whether their current health services were "*successful* or *unsuccessful*". This information is woven into the presentation of the findings from community representatives as illustration of individual opinions. A summary report of this sub-component is appended.

1.2 Factors of Success

Factors taken into account in the judgement of *success* of the design and delivery of rural health services are presented within three categories.

- Features of 'rurality'
- Meaning of 'health'
- Qualities of service delivery

1.2.1 Features of 'Rurality'

The informants commented on features of rural life and living that provided the context for provision of healthcare. These are represented by three descriptive themes:

- Life in remote areas
- Characteristics of residents
- Morale of the community.

Life in Remote Areas

Of major concern to residents was the degree of isolation in relation to their capacity to access healthcare when needed. Access concerned both the ability to attend the service bases, locally and in more distant towns (roading, transport), and the telecommunications facilities that enabling consultation within and beyond the particular locality (telephones and news/information media). Features of isolation referred to the terrain and climate in relation to distance from health services as well as personal resources.

Roading was mainly referred to in terms of ease of travel and the length of time required to reach appropriate services when necessary. Having confidence in thoroughfare in and out of the area when needed for health problems was important. The need for unobstructed reach to appropriate services, as fast as possible, was widely expressed.

The lack of public transport meant reliance on private vehicles. In some places it was assumed that a private vehicle was essential to rural living because there was no public transport. But the cars were not necessarily road-worthy, given the roading and distances to be travelled, or ready for immediate use to be able to get to health services in the cities or neighbouring settlements: in some places there were neither garages for maintenance nor a petrol supply, even if it could be afforded. One informant used the term "distance deprivation" to note that some people are prevented from accessing the health care they need.

The practical and economic implications of taking long periods of time out of the day to travel to service bases, sometimes involving overnight stay, aggravated the barriers to timely intervention for health problems.

It was known that not everyone had a telephone, and some people were acutely aware that problems of their isolation could be addressed if there were coverage for cell phones. It was noted that some people did not buy newspapers which meant they had communication problems putting them at a disadvantage in negotiating the system. The informants knew that problems arose for at least some residents through being "out of touch with what was going on" both within their communities and the wider world, but did not know the extent of this as a communication problem.

Characteristics of Residents

These features of life in isolation became issues for service delivery in relation to the particular composition of the resident population of the locality. Significant characteristics of the rural population included: population size, socio-economic status, income source, age, ethnicity.

Seasonal and incidental fluxes in the population size and flux associated with events, certain types of employment and tourism, were noted as creating problems in providing adequate and appropriate healthcare. Transients put strain on the available services and

presented a greater range of health problems than could be responded to. The features of physical isolation aggravated this. Other than tourists, a transient population was related to poverty and unemployment, and was increasing in some localities. The strain on health services was thus reflected back on the longer-term residents, the responsiveness of healthcare for them, and the wealth, even the viability, of the community

Informants referred to the significance of changing patterns of socioeconomic status in their areas. These were particularly related to housing, employment and welfare support. Sometimes cheap housing attracted people on benefits ("a lot of people on the benefit") and others taking up employment opportunities with low incomes. Some people were paying high rentals for the scarce, reasonable quality accommodation aggravating their financial pressures. Most of the informants noted unemployment and the associated poverty and deprivation in their communities as accentuating the adverse effects of isolation.

The interview questions emphasised age as an important factor to be considered. In response, informants noted the increase in elderly and decrease in youth in their populations. Most saw the need for services to provide appropriate care locally that would support them to continue living in the rural locality. In one community the employment opportunities were only for younger persons, which created issues of redundancy and aggravated the strain on service delivery.

Some informants raised ethnicity as a significant demographic factor: high proportion of Maori and new immigrants seeking a time adjustment and cheap housing.

Morale of the Community

Whereas the residents expected, to an extent, the physical, demographic and economic features of life in rural isolation, they noted that the impact of these was becoming more exaggerated and having a cumulative impact on the morale of the whole community. This showed in the ways residents viewed themselves and their prospects in rural life.

Comments were emotional. People referred to their isolation in terms of being apart from other sectors of New Zealand society, ignored and by-passed: "not on the road to anywhere". People were "out of touch with what was going on": they did not necessarily know how to get help when necessary ("stressed people, embattled by having to fight the system"), or even what services were available.

There were comments about apathy, depression and low self-esteem associated with unemployment, parenting difficulties and neglect of children's welfare. There were strong feelings about the impact on a community of transience: "disruptive" force, lack of commitment to community life giving the impression of "taking all and giving nothing…in constant conflict with the law" (Dawson, 2001a), many health and welfare challenges. In one community the transient group were Maori and identified as "the lost tribe" because of the dislocation from their whanau support. In other communities the transient groups were identified as immigrants and were seen either as bringing "a complex but stimulating flavour to local life" or the major challenges to community life of "socio-economic deprivation".

1.2.2 The Meaning of 'Health'

Questions were constructed on the assumption that health status is related to age, poverty and social factors, and attended particularly to the relatively poor health status of Maori. The informants were asked what "seems to be the biggest health problem" and "what would help to reduce these problems" for specified age groups, lower socio-economic groups and the Maori. Subsequent questions asked for comment on other social and family problems and what and how health services are delivered. The responses were in the form of specific diseases and multiple factors relating to life in the rural areas. In the context of health service delivery these data, collated, represent a broad meaning of health relevant to the design of a 'successful' health service. The responses are integrated within three themes:

- Prevalent diseases
- Determinants of health and illness
- Personal health circumstances.

Prevalent Diseases

Diseases were named as medical diagnostic categories that are also those commonly referred to in everyday commentary and debate on our national health status. They were consistent with the prevalence shown in contemporary morbidity and mortality statistics, nationally, rurally and locally: asthma, cancer, diabetes, ear infections, cardiac disease, arthritis, muscular problems, conditions of aging, mental illness, sexually transmitted diseases, substance abuse, accidents (road and work-related).

Determinants of Health and Illness

Informants elaborated their references to prevalent diseases with statements about the determinants and whatever is required for prevention and control. These are presented as factors of everyday living that are known to cause or aggravate the manifestations of diseases/disabilities, the spread of disease through a community, or influence people's access to healthcare. Dynamics of relationships within families and the community, and poverty were the factors most commonly noted.

Family dynamics noted included "marriage breakdown", "family breakdown", "parenting worries", transient partnerships and composition of households, lack of support. These were associated with various factors of lifestyle in rural living: "all the major lifestyle/health problems", substance use ("freely available alcohol and drugs"; "alcohol and drugs are major health hazards for young people", "smoking"), "money worries", "unemployment", "stress", teenage promiscuity. One informant noted the impact on community life of many people with mental illness moving into the area: "there is no support and their difficulties affect both themselves and those around them" (Dawson, 2001a, p.10).

Poverty was seen to be associated with "nutritional deficiencies", lack of the wherewithal to live in adequate conditions, access services and comply with treatment programmes, "pay full price for everything".

Personal Health Circumstances

There were many references to the personal circumstances of people, intertwined with the determinants of health and illness: "lack of skills"; "low self-esteem, ignorance, the inability to identify and articulate problems, and the indulgence in risky behaviour";

"lack of responsibility for personal health"; "(the youth) drive under the influence of alcohol and other drugs".

Other comments related to behavioural factors associated with use of services: "lack of motivation"; "lack of responsibility"; "a total lack of commitment" of some parents to the health of young children; "whakama…lack of confidence"; "lack of understanding of the need for compliance".

1.2.3 Qualities of Health Service Delivery

The questions drew attention to the quality of the services being provided. The informants were asked how the services had changed over the past decade and whether they (consumers) were "getting all the important services they need". The responses to these questions, as well as the incidental comments of judgement that elaborated responses to the other more factual questions, derived from a broad evaluation of the health services as experienced. Comments expressed their reflections on the implications of the changes in the health sector and the trends in general: what they knew of service provision in the past and what they knew of the Government's health strategy, including reference to the debates surrounding its implementation.

Comments are categorised as three qualities:

- Dependability
- Responsiveness
- Appropriateness in time and place.

Dependability

Comments related to the dependability of service delivery. Informants needed to know that they would continue to receive health care. In general, the comments were somewhat ambivalent about the current availability of health services e.g. "people are pretty much getting the health services they need". The loss of some services had left worrying gaps, but replacement with other services had improved other aspects of healthcare. However, many were anxious about the changes occurring when they were in such an isolated situation. An awareness of the scarcity of resources was implicit in many comments, more to be taken into account than to impose an all-encompassing barrier.

A change in the number of GPs in practice was noticeable. Whereas some localities had been advantaged by "more doctors than in the past", other localities had been disadvantaged by fewer GPs: "(GPs are) extremely busy and close to burnout because of reduced numbers". Volunteers for the essential services in support of healthcare were reducing in numbers because more was being asked of them and the population was aging: "high rate of burnout", "high dropout".

The occasional directly negative comments were localised and related to the healthcare to which people no longer had access, or to how the current services were not responding to the needs of their communities. There was an increased turnover of doctors and therefore they (doctors) were not necessarily in tune with the needs of their communities; more so their locums. Nurses provided more consistency but difficulties in relationships amongst service personnel and lack of formal procedures to deal with these affected the capacity of providers to redress the problem e.g. "nurses often carry the can for the doctor…the provider organisation is not responsive to community messages of complaint".

Responsiveness to Need

It was noted that, even if services had been retained, sometimes increased, they were not necessarily designed and delivered (e.g. a hospital had been resurrected "after a paint job") to be more responsive to community and personal needs. There were gaps and new difficulties had arisen for people to be able to access the particular services needed.

The determinants of health had changed which called for modifications; there were more health problems amongst rural populations and they were locally shaped e.g. illegal drug dealing, transience, unemployment.

Changes in the professional relationship had occurred affecting the form of professional consultation and care received. The doctors did not always respond to personal need, either because they did not understand (e.g. "some people find the doctor off-putting…from a culture where women are not seen as equals"), or did not consider options (e.g. "pill-oriented…unsupportive of alternative therapies…not all that holistic in approach"). There were more doctors who were foreign and did not stay long.

Appropriateness

Implications of the changes in the health system for how people were able to get appropriate healthcare were noted, with particular reference to the proliferation of specialist services. There had been an improvement in availability of specialty healthcare but these services were based in the city centres and now made health care "seem disjointed". Some people have to travel great distances for specialist consultation and care.

There was acceptance that rural people had to travel distances to access specialist services, but there was anxiety about whether the most appropriate healthcare, when needed, could be assured. Some specialist services had been made more accessible through having the specialists travel to visit rural clinics from time to time, but this was not necessarily appropriate e.g. a drug and alcohol counsellor was available for three consecutive days - but only every three months.

Nurses' visits to schools had decreased and become routine but health problems do not present in that way. Sometimes services were not appropriately available because the number of clients "don't make visits worthwhile". Mental health services and women's health services including obstetric care were repeatedly noted as "inadequate".

Public health programmes (e.g. cervical screening) were not necessarily available and there was inconsistency in information about how to access them: "health promotion doesn't work".

1.3 Exemplar of a Community: The Maniototo (Appendix)

Analysis of the comments written by the 10 informants who responded to the question "Have you found this model particularly successful, or unsuccessful?" suggest four indicators of *success*:

- People are secure in believing the services with which they are familiar are robust in the face of resource changes (funds and personnel).

- Services provide a timely and responsive first contact with needed services (hospital and doctor), especially for the elderly and disabled, and which will avoid travel to the city if possible

- Access to the services is designed through the investment of the community in the delivery of the services (voluntary representation on the Board of the Company and active involvement in the administration and fund raising), the commitment of health professionals to the people and life of the community, and the "liaison" amongst them.

- Service delivery is sustainable with dependable resources: government funding including professional staffing, voluntary community support, links with specialist services in the city.

In general, it is concluded that the health service was successful because:
- It continued to have the trust of the community in providing essential healthcare
- It supported the viability of the community
- The community had investment in it.

1.4 Overview

These findings convey a community opinion that the successful design and delivery of rural health services for a locality should take account of the particular features of rural life and living and a broad view of health, in order to be dependable, appropriate and responsive to the needs of the individual and community as a whole.

Success is viewed in terms of confidence that the appropriate healthcare will be available and accessible to them when they need it with as much expediency as possible. Availability did not necessarily mean immediate accessibility but it did mean that people have the most *timely* attention to health issues that is possible. The trend to specialisation associated with fragmentation of services and gaps calls for attention to integration of healthcare locally.

2. THE VOICE OF MEDICAL PRACTITIONERS

2.1 Methodology

Questionnaires were disseminated to 190 rural General Practitioners and 114 (60%) returned. Three were the collated responses of joint practices. A few (4) had been passed on to a practice nurse, practice receptionist or manager to complete. These responses could not be included as perspectives of the GPs. Hence 110 questionnaires were included representing 110 GPs and the contributions of a few more colleagues. This is 22% of the approximate total population of 500 rural GPs (Personal communication, Executive Director, Rural General Practitioner Network, 18 February 2002).

An introductory question asked the length of time the GP had *"lived in"* the locality. One did not respond. The group of respondents tended to be longer term residents in the locality, but did include some newer recruits. Over half (58, 53.2%) had been resident for more than 10 years, and over a quarter (31, 28.4%) 20 years or more. Fifteen (15, 13.8%) had lived in their locality less than 5 years and four of these (4, 3.7%) less than one year. Duration of residence ranged from two months to 50 years.

These responses do not distinguish between residence and practice; it is not known how long the GPs had practiced as rural practitioners, whether they had practiced continuously, or whether the duration of residence included childhood.

The respondents were asked to depict the geographical boundaries of their practice on a given map. From this it can be determined that the respondent group is drawn from the full spread of the country. Closed questions (asking for a yes/no answer) asked for considerable detail about the locality, demography, economic basis, community characteristics and health service provision. These data provide information about rurality and its variability around the country, and are published elsewhere (Dawson, 2000a).

Accessible data of relevance to this report are taken mainly from the two final questions. One requested a description of the health service being provided. The other asked whether this model had been *"particularly successful or unsuccessful"*. The responses were sometimes given more meaning in the light of the selection from the 5 options of "what model of service provision is used by your practice". Some cross-referencing with the data on the particular rural circumstances has been included where possible.

Dawson's (2001a) analysis of the questionnaire responses calculates that twenty three (23: 21%) of the respondents either made comments that could not be categorised in terms of degree of success or did not respond to the question at all. However, despite the closed question, it elicited extended descriptive responses, possibly evoked by the half page of empty space that followed. The responses were therefore freely offered comments on whatever thoughts and issues were prompted by the terms *successful or unsuccessful* in relation to their current circumstances. They present the opinion and experience of a sizeable group of rural GPs, most of them knowledgeable about changes in rural life as the context for general medical practice and representing considerable diversity of New Zealand rural localities.

2.2 Factors of Success

In general, the GPs' view of *success* concerned their capacity to continue to practice. Four inter-related factors are identified to present the comments. Three factors represent the substance of the comments. A fourth factor is identified to represent the emotion with which comments were written:

- Infrastructure for service delivery
- Position within the regional services network
- Capacity to respond to community needs and demands
- GP morale.

2.2.1 The Infrastructure for Service Delivery

The factors of infrastructure referred to include:

- Physical location, facilities and technical equipment.
- Funding
- Service management

Physical location, premises and technical equipment

Those who ranked their service "*successful*" had premises in which they were comfortable working and were readily accessible in their location. The GPs who worked in premises that accommodated several service providers - particularly spanning primary and secondary sectors and support services - as a "one stop shop"/ "under one roof"

believed this was highly *successful*. Difficulties previously experienced in solo private practice were overcome by locating and grouping practices centrally in rural towns, where they could also draw on local support services:

> "No x-ray facilities which is a great handicap… Need for an observation facility for semi-acute conditions requiring beds, additional nurse and supplies".
> A shift to "Centre of town near chemist shops" had made the service "very" *successful.*

The condition of the roading and weather considerations had implications for access to the service for people who had to travel out of their locality for specialist or out-of-hours consultations: "the poor state of many of our roads – many are loose metal, twisting, winding roads". Hampered access was aggravated by the influx of tourists and storms in season.

Whether it was more successful to consult from only one base clinic or from multiple satellite clinics in the more isolated settlements was a point of disagreement. To consult from satellite clinics still meant the clients/patients must travel to the main centres for supporting diagnostic and treatment services. A few saw that the advantages for remote communities of having access to the GP on a regular visiting basis outweighed the disadvantages of being without support services. Others did not agree.

The two GPs who operated within a Special Area Medical Officer (SAMO) scheme were very positive about its *success*: the nurse operated an outreach clinic through telephone supervision by the GP, the use of standing orders and following defined procedures for obtaining and dispensing medications. However, one of these GPs believed this was not sustainable.

Employment by, or working in an alliance with, community trusts or HHS/DHBs had brought both benefits and difficulties. Money might not be available, priorities might differ, or owners might not see the value in allocating resources to the upkeep and development of equipment and facilities e.g. in one locality an "upgrade of the computer system (was) required but (this was) not greatly attractive to the practice owner"; in another locality the owners "spend money on luxuries". There was some relief from the burden of administration, but this did not necessarily make the practice more attractive : "the GP does not have a capital investment in a building, which should make it easier to attract other doctors. That's the theory but NZ graduates are afraid of rural and small town practice."

Funding

Funding was the factors noted most frequently and emotively. The issues related to the decline in funding for the service, the consequent viability of a business given the dropping income, and the flow-on implications for service provision.

Changes in the demography of rural communities have meant a drop in the capacity for people to pay for their healthcare (decline in numbers and economic status aggravated by the migration of the people more likely to be "deprived" and have chronic disorders):

> "Even with low charges - total fee $27 and a lot of no discharge consultations - (the practice) still has a lot of bad debt; also due to a lot of people moving around the …region."

> "Less *successful* as (the) area becomes more socio-economically depressed."
> "The doctor subsidises non-payers and low payers.".

At the same time the requirements for obtaining public funding that would sustain service delivery are becoming increasingly complex, time consuming and disruptive: "the Government formulae for primary health care funding rely on increasing patient co-payments which become less and less affordable…"; "Conditions (have been) eroded…"

In this context of a shift in funding source, the way the GPs have provided their service in the past is no longer sustainable; traditional funding models of service delivery are no longer appropriate:

> "We cannot continue providing the service we do without assistance."
> "(The model – private, group practice) was very *successful* until 1999… (When the group were) unable to employ additional GP over the winter (tourist) season… "not related to the model but to the lack of available medical manpower."
> "The present combination of GP owned private practice and nurse provided scheme … works well <u>but</u> (original emphasis) it is not a good model for the future as I am unlikely to be able to find someone to buy my practice and my buildings. It is not easy with the model to generate enough income for 2 doctors, yet the practice size is more than one doctor can cope with. We need to go back to some form of special area incentive to attract another doctor to the area"
> "Eroded…problem getting locum, no regular holidays…"
> "The 'sole' GP system worked here when I first came just on 25 years ago, but nowadays I feel that a minimum of 2 doctors have advantages to both patients and doctors (knowing one's patients and knowing one's doctor). The drop in rural numbers plus financial market, make this impossible…(doctors and supporting service providers are) gradually squeezed out financially."
> "(in private practice) fee-for-service leads to a sickness industry."

Implications of the resource limitations were noted in relation to service design. Health promotion and disease prevention were secondary to acute personal care:

> "Two philosophies…a struggle to implement in the current climate which promotes the opposite."
> "Successful in providing individual health care services … areas of preventive medicine are neglected e.g. diabetes."

Many GPs noted that the solution to the funding problems lies in greater Government investment:

> "Need for a comprehensive and cohesive support package for rural GPs and rural health services in general"
> "A provider-led bulk funded integrated facility emancipated from fee-for-service mentality".
> "(GPs provide) at least a comparable service (to the CHE/DHB for a particular community) and "with considerably more efficiency".

Many GPs noted their efforts to address the challenges of funding. These included cost-cutting changes to the infrastructure for their practices and greater collaboration amongst them. Arrangements involved (variously) sharing premises, facilities, equipment and administration processes: "…many tasks shared between the health professionals cooperatively", and relief from the strain of the on-call accident and emergency work.

However, there was ambivalence about the funding advantages of relinquishing ownership to a community trust or local body: *success* depends on the management expertise. Sub-letting of the premises to other service providers, including medical colleagues, was noted as an additional source of income that supplemented the practice business.

For some GPs, moving into a group model of service delivery had involved an advantageous shift to a more central location. This had enabled consolidation and integration of support services. Locating the practice near a community hospital was frequently noted as efficient: to draw on the personnel, services, facilities and equipment in support of their general practice e.g. "Solo practitioner in a combined 5 doctor centre attached to the Trust hospital and maternity unit, x-ray, physio and lab facilities." *Success*, however, required further government support:

> "Two beds (hospital wing of a rest home) are available (on average) for GP admissions, which are very useful but could be used more if the HFA would fund more…We could make very good use of an x-ray unit, and it would certainly be ideal if all the GP services, x-ray etc were attached to (the hospital unit)."

Service Management

The changes in health policy and funding have raised issues relating to the management of service delivery. Formal management structures and processes now demanded have had implications for professional practice: conditions of work. They have distracted them from their primary focus on providing health care, threatened professional control over practice, and have not been able to redress the problems of workload associated with the shortage of GPs. These factors have been aggravated for some who have relinquished the management to provider organisations/agencies:

> "I believe the problem is not only or mostly $$; quite a lot is cultural in that we are being pulled away from our core activity to meet the needs (or satisfy the prejudices) of a deeply ignorant and biased policy making apparatus"
> "(the service model) is *successful* but has become weighed down with bureaucratic requirements and paper work".
> "…disrupt *successful* systems with disincentives."
> "It's important to note that we owe the *success* of the surgery to the fact that we have not been dis-empowered with its management. Ownership of the complex is an interesting topic for discussion. Management needs to be left in the hands of the providers, with local community …input." (Emphasis original)

One service was categorically "*unsuccessful*" because "it is managed by someone who has no managerial skills, there is poor budgeting and money gets spent on unnecessary luxuries instead of things which would improve patient care."

One GP had "Survived 20 years of constant change in the health system, (now) unable to recruit another resident GP…" that would keep the service viable.

Many noted problems of recruitment and retention to ease the workload e.g. "a problem getting locum, and no regular holidays"

A few GPs continuing to manage their private practices solo indicated that being "on call 24 hours/day, 7 days/week" cannot be sustained when they resign or retire.

2.2.2 Position Within the Regional Service Network

Comments on how the GPs viewed their service in relation to other health services, and how they were working to integrate service delivery, are represented by three themes:

- Service integration
- Involvement of nurses
- Resources for networking

Service Integration

Comments about the relationships between services were concerned with the comprehensiveness and coordination of service delivery, particularly through collaborative efforts. They conveyed the GP service as pivotal in a network of services that links primary and secondary health service sectors, private and public service providers, and spans geographical areas. Most GPs noted they had collaborative arrangements with other GPs.

There was considerable variation in how the relationships amongst personnel were viewed and the *success* of their efforts in achieving a goal of service integration . Some were positive about the consequences of their efforts to integrate services: "work well as a team to provide a very comprehensive and continuous service to the area".

The nature of collaboration amongst GPs involved various business and management arrangements, and linked neighbouring localities, sometimes over extensive regions where the population was sparsely spread. Collaboration amongst GPs enabled rosters to maintain service coverage, including the organisation of locums: "interchangeable staffing". Most were specific in referring to the structures and rosters providing for full accident and emergency cover.

For some this collaboration amongst GPs had involved a shift to be able to share the infrastructure for practice in a regional centre, where service delivery could also be part of or near a complex of supporting services: "under one roof"; "one stop shop". For others it involved just the rostered on-call arrangements, while retaining their solo or small group practices in neighbouring localities.

Service delivery from a general practice extended through various forms of outreach arrangements with other service providers and agencies to be able use facilities, equipment and personnel. These included the community hospitals, public health agencies, community trusts, Maori providers.

Despite their efforts to link services many were disillusioned. Fragmentation of care continued. Providers remained separate, practitioners were not working together and there were separate documentation systems. Relationships with the personnel of the publicly funded hospitals and their community services were not always supportive. Despite "'subjective' support… there is not 'objective' support by the community, local council at regional/national health authorities". There is duplication of services and competition amongst providers for contracts and public funding:

> "patch protection"
> "fighting over funding and contracts"
> "lots of grey areas in terms of who is responsible for services and there is a lot of overlap of services".

Relationships with Maori providers were noted by several GPs: e.g. "difficult interaction with iwi provider". Reasons given included that they operated on a different funding basis and there were not established networks facilitating integration. Patients access both practices. As well as causing duplication and competition, the situation interfered with clinical practice:

> "Iwi funded marae based clinic once a week…free service but no after hours cover provided…problems of patients delaying seeking assistance as waiting for free clinic once a week. Difficulties of some listed patients attending both general practice and marae clinic…confusion about diagnoses, investigations and management".

A few GPs referred to maternity care. Midwives were amongst the personnel with whom the GPs had or were seeking collaboration, with varied *success*:

> "Integrated maternity service with GPs and midwives providing shared care approach for local maternity unit – working very successfully – one of the last bastions!!"

Involvement of Nurses

The significance of involving nurses in support of the general practice was noted by most of the GPs. For some the significance of their contribution was conditional:

Dependent on the numbers of nurses available

> "Provided there is a trusting relationship with the health professionals it works well".

Most noted they had one or more practice nurses as employees and many noted arrangements with nurses employed in the public system: "general practice" seemed to imply the involvement of nurses. The role of nurses was viewed as extending the GP practice. For some GPs this meant relieving the strain of work conditions, and for others extending people's access to the service:

> "If nurse practitioners staffed the complex after-hours, fielded all the calls, and shared on-call responsibilities with the Drs, should the resident GPs both leave, the model is incredibly attractive for replacement Drs. to come, AND STAY" (emphasis original)
>
> "We run appointment books for both the GPs and nurses."
>
> "(People are) disadvantaged by not having a doctor or nurse available when I am away"
>
> "Section 51 funded general practice – working 8/10ths in surgery – providing comprehensive general practice care with practice nurse integration and close liaison with district/public health nursing service. Very close well-developed team work …" (also involving many other support personnel, services and facilities).

The potential for outreach of the practice to residents in the more remote areas had been achieved by having a nurse solely operating a satellite clinic, working within the infrastructure of the GP practice (the SAMO and other schemes). This was noted as a very *successful* model but could not be sustained by a solo GP model. Some nurses shared equally in, or provided back-up support for, the on-call accident and emergency care roster.

Links between general practice and the publicly funded system (hospital and outreach services) were made possible particularly through nurses who staffed the hospitals and their outreach community services (e.g. district nurses, community health nurses, public

health nurses). Although employed by the CHE/HHS/DHB, some of these nurses had their base in the privately owned medical centre and there was "close liaison". However, it was also noted that the changes in funding, contracting and capabilities of nurses had inhibited collaboration:

> "Previous regular meetings with the community health staff stopped because of competitive contracting".

Whereas there was belief in the potential for *success* this involvement of nurses offered and comments conveyed a commitment, it was not sufficient:

> "Historical nature of the local general practice could allow for improved integration of services provided and this is being worked towards."

Resources for Networking

Resources included personnel and a supportive infrastructure for the practice including technology that enables communication between all service providers, reaching through all parts of the regions.

The workload of the GP would be eased and the viability of service delivery increased with more people working in varied roles as a supporting network:

> "GPs workload is such that we are reactive rather than proactive – need support in the form of mental health workers/diabetic nurses/educators/district nursing/better care locally for elderly/mentally ill…more ambulance drivers/trained."

Advances in technology had expanded the capacity for networking e.g. "Cell phone and ambulance pager used heavily", and computerised documentation systems. But there were concerns about the lack of consistency. For integration services needed to "use the same software". Aggregation of services provided for good networking for some, but not for others. In one multi service centre, integration was hampered by separate equipment, facilities and systems, and different funding sources:

> "A different notes system, our own reception area and computer system…and separate phone system…the surgery (on paper) is theoretically competing for 'business' from the work the hospital does and it is being paid for with limited funds targeted for the primary health sector".

The solution was the rationalisation of resources through a total reconfiguration of service delivery:

> "A dignified and mutually agreed (public service provider organisation) exit from the …site" and "a provider-led, bulk-funded, integrated facility.

2.2.3 Capacity to Respond to Community Needs and Demands

There were fewer comments relating directly to professional practice than to the infrastructure and place of the service in relation to other providers. The questionnaire particularly addressed the latter two topics; the focused *success* question was introduced in the context of models of funding. However, the capacity for GPs to practice professionally was implicit in their comments. The capacity for GPs to be accessible to people are identified within four themes:

- Access to a general medical practitioner
- Support from the community

- A universal service
- Affordability

Access to a General Medical Practitioner
In general the GPs comments of *success* related to whatever facilitated and sustained access to their practice. The nature of their professional practice *is* their availability to their communities:

> "(People are) disadvantaged…when I am away":
> "Very successful at grassroots level"
> "OK for people, hard on the practitioners"

A GP owned, centrally located, private practice with three GPs who employ practice nurses and "take turns" to operate satellite clinics around the region, was successful because it provided full medical coverage ("24 hour service 7 days a week"), reached into remote areas and offered people "a choice of three doctors".

GPs' efforts and judgement of *success* concerned the protection of their professional practice. The various ways they had worked to maintain service delivery – and hence to support the healthcare they believe addresses need and demand - are reported in the previous sections on service delivery. Their judgements of the degree of their success are reflected in the section on morale.

Support From the Community
The support of the community was seen as essential but had to be earned. "A close relationship between GP and community" required continuity over a period of time. With membership of the community trust owning the service or facility, people participated in the design of their health service. This gave them a "sense of control" and they were a source of support.

There was need for expression in a more material way:

"(There is) subjective support…but no objective support of community, local council or regional/national health authorities".

For a solo GP, general practice could only be successful when there were assumptions of self-responsibility in healthcare: "doesn't work for people who want others to take responsibility".

A Universal Service
Although many noted how they had worked to develop a comprehensive primary care service, including health promotion and disease prevention, it was not necessarily available to all members of the population. Many comments conveyed a belief in equity and access for all people, but inadequate resources (financial, facilities, personnel) for service delivery discriminated against some groups:

> "Discriminates against poorer people"
> "Not user friendly for Maori".
> "Alright … sometimes being Maori (GP employees of a provider organisation) is seen as a more important attribute than 'being competent in the job'…management decisions are not always clinically sound, or even ethical".

A three GP private practice with practice nurses and involvement of district nurses employed by the HHS/DHB was "particularly successful … Wherever we have seen a need we have arranged for someone to provide for that need".

Affordability

Many GPs commented on the increasingly limited capability of people to pay fees for health care. This had compromised the capacity of general practice to continue to respond to need:

> "And so remove access from patients who can no longer afford co-payment at GP or chemist"
> "Difficulties for a proportion accessing services because of cost."

To some GPs this was as an issue of "neglect" by the government funders.

> "The community are forgotten by the HFA, based in (the regional city)".

The need to travel to for medical consultation exaggerated the affordability issue. The grouping of general practitioners with support services had limited the need for clients to travel. But there was need for supplementary public funding to ensure people could access healthcare, including bringing specialist services to the rural localities e.g. "more local hospital clinics to save our patients travelling". One GP proposed the redirection of primary care funds to support private general practice as a "provider-led, bulk funded, integrated facility".

2.2.4 General Practitioner Morale

Morale was not a direct focus of the questionnaire but comments were often emotive and foreboding of collapse, referring to the impact on their work of the changes and trends in the health sector over recent years. However, Dawson's (2001a) analysis of the questionnaire responses showed that only five (5, 4.6%) judged their "model of service provision" to be *"unsuccessful"*. The data suggest that the GPs had worked to continue to provide an at least reasonably *successful* service despite the challenges of change but many had become despondent about being able to accommodate any further. The responses point to four interrelated sources of low morale that are further elaborated as factors of success in the subsequent sections:

- Lack of confidence in the financial viability of service delivery
- Increasing pressures of managing the infrastructure and conditions of work
- Constraints on professional practice
- Strain on personal and family life:

The following extracts show some expressions of low morale and varied combinations of its sources:

> "I watch and wait with interest as the canoe is paddled vigorously towards the waterfall"
> "Brought us to a crossroads"
> "Waiting for disaster to strike"
> "Battle fatigue"
> "We have had ten years of destructive tinkering at best – little courage displayed and lots of paperwork. Treasury/Gov(ernment) will kill off every last rural practice in its aim to get Auckland GPs to go to Westport."
> "Squeezed out by all the changes"

> "I am quitting (have sold practice) due to personal/health reasons. Part of this is the poor state of rural practice, withdrawal of secondary services, decreasing return, fed-up with on-call, lack of Government commitment".
> "IPA system – too many hidden agendas for our taste"
> "Unable to get funding for…many of (our) extra and useful…initiatives"
> "Not able to provide integrated services…no further services catered for in the community"
> "Beleaguered family"
> "Conditions have been eroded…would like to sell practice and leave."

The comments of some GPs conveyed features of their work associated with a more positive morale, seemingly associated with choices and adjustments they had made to the way they provided their service and retained autonomy in their professional practice, given the health sector changes, e.g.:

> "I'm sure the central location …has had an influence (5-GP private practice, *very successful*); 4 years ago we started with only two full-time GPs and since then we have kept on growing."
> "I think that it is particularly successful (3-GP private practice) as we get paid according to how hard we work"
> "(Private practice) advantage – professional autonomy (although simultaneously) … patients unable to pay other than subsidised professional fees… Option of capitation declined due to previous disenchantment with NHS".

2.3 Overview

The responses to the questionnaire referred to the challenges to the viability of rural general practice posed by demographic changes in rural populations, declining rural GP numbers, and changes in health policy and funding. They reflected a view of *success* as the protection and facilitation of GP practice. Hence the major theme of *success* for most GPs was sustainability. Comments related mainly to the degree of support provided by the infrastructure for service delivery, resources, working conditions and links with other service providers. A *successful* infrastructure facilitated the operation of the practice and consultations while allowing for a reasonable working day and satisfying lifestyle beyond work.
Comments noted and implied that reliance on fee for service was increasingly inadequate. In private practice, contracting with HHS/DHBs to provide specified services and expanding the practice to involve a wider range of health workers was *successful.*.

Where sustainability was threatened there was considerable strain in personal life. For some GPs the loss of morale was so great that they questioned or intended leaving rural practice, although conditions rendered this prospect both an ethical dilemma and a financial loss. Both professional practice and the viability of the business were compromised.

The continuation of solo private practice in the more remote localities was questionable when the current incumbents had moved on. Collocation into group practices with sharing of management and resources had enabled efficiencies that made the privately owned general practice sustainable as a business, and full medical coverage for extensive rural areas feasible in terms of containing the workload and ensuring respite. For patients/clients it had contained the expense of travel to access the support services associated with medical diagnosis and intervention.

Formal links with secondary and tertiary providers, or employment by a provider that spanned sectors were successful in supporting the general practice to be responsive to need, although there were compromises: autonomy in professional practice and control over the infrastructure were challenged when priorities were at variance.

For some, success was viewed in terms of capacity to accommodate and adapt to the changes in funding source. Management structures and processes were important to success. General practice had been expanded by some through integrative approaches involving other personnel and service providers. Nurses had enabled the reach of a more centrally located service into outlying areas, increased the capacity for personal consultations, and extended the service to include forms of health promotion and disease prevention.

Most saw that continuation of a universal medical service had been threatened by the changes in the health system: the funding and administrative requirements. Some were disillusioned about the trends, with a sense of foreboding. Some looked to the Government to restore the conditions that would redress the decline in service delivery and submitted proposals for increasing, or redirecting public funding. Some had found ways to accommodate the new demands, constantly adapting the practice, and seemed to have a sense of a manageable future.

3. THE VOICE OF NURSES

3.1 Methodology

Following the survey of rural GPs, the questionnaire was truncated to elicit the opinion of rural nurses on the *success* of the services in which they were employed. Baseline data on occupation (indicating the employer) and length of time "lived in (the) locality" were collected. As for the GPs, the nurses were asked to identify (from a given list of five options) "what model of service provision is used by your practice". The other two questions were the same as for the GPs. Both requested extended answers: a description of how the health service was provided and whether the nurses had "found this model of service provision particularly successful or unsuccessful".

114 questionnaires were disseminated to "rural nurses". Twenty-nine (29) were returned, three of which were discarded because they had been completed by a GP, a "service director" and "unit manager" (the latter two did not identify themselves as nurses). Hence, the questionnaire respondents represented twenty-six (26, 24%) of those who received it. Just under half (12) were practice nurses employed in a "GP owned private practice". Four were employed by a community trust and four by a Maori provider. Six were employed by a CHE/DHB.

Almost two thirds (17, 65%) had resided in their rural area for more than 10 years, and two of these nurses for more than 40 years. Of those with residence of less than ten years (9), three (3, 12% of total) had less than 5 years. The respondents therefore tended to be long term, consistent with the trend found in the previous study of rural nurses(Litchfield & Ross, 2001) although not as exaggerated as would be expected in the whole population of rural nurses. It is similar to the GP sample that was also drawn more from longer-term residents.

The actual number of "rural nurses" nationally is not currently known but it is clear this is a very small proportion of those who would identify as "rural nurses" (Litchfield & Ross, 2000). That so few nurses responded raises questions about the research process (e.g. the orientation of the questions and approach made to the nurses, the nurses' perception of the relevance of participation for them in their work, and their confidence in their capability to respond to the particular questions). Furthermore, the question asked of the nurses did not allow responses to reveal the known complexity of employment arrangements that influence the nature of the healthcare they are able to provide (Litchfield & Ross, 2000). However, although the findings cannot be considered representative, they are presented here as a reflection of opinions of some individual nurses drawn from a range of employment arrangements around the country.

3.2 Factors of Success

As with the GPs, the nurses interpreted "model of your health service" in varying ways and therefore their comments were not consistent in their focus on a range of aspects of service delivery. They are accommodated within five themes:

- Facilities
- Nurse role.
- Achievement of patient/client outcomes
- Relationships with GPs and other health workers
- Work conditions.

3.2.1 Facilities

Nurses employed in medical practices, more than other rural nurses, made reference to the physical facilities for their work. Facilities were viewed as the context for the delivery of the services by the general practice or medical centre. Significant features of service delivery of significance to the nurses were:

- Availability of space for service provision
- Accessibility of supporting services
- Technical support, particularly for communication.

Availability of Space

Work-space for nurses was identified as a factor delimiting service delivery. Some nurses had their own consulting space or clinic that was helpful. The potential for expansion of the range of services offered by the medical centre or general practice was seen to depend on the capacity of the existing facilities to accommodate them.

> "Like other rural services we do not have the personnel to deliver services due to outside constraints e.g. no accommodation for staff."

A nurse who viewed herself as a "nurse provider" in her own right (in a "Special Area"), believed that a lack of understanding of her role had played out as "difficulty getting equipment required to fulfil (the) role". The physical facilities of the context for service delivery needed to take account of the distinct contribution that the nurses make (see below):

> "Need (for) stronger definition to make it (the role) more easily understood".

Accessibility of Supporting Services

Accessibility of paramedical services supported the medical consultation and enhanced the general health and well-being of patients/clients: e.g. x-ray, laboratory, podiatry, physiotherapy, counselling, osteopathy, optometry, occupational therapy. Having supporting services centralised and aggregated ("concentrated"; "on one site") was important ("helpful") in one locality, while assistance for people to go to other services ("some travel assistance to aid clients to make appointments at hospital or other secondary health services") was important in another locality.

> "The recent addition of other health professionals has improved our service hugely so that patients do not have to travel into the city."
> "The service (Maori Provider) enhances existing health services in making them more affordable, appropriate – for those services we do not provide or do not have the expertise we subcontract through memorandum of understanding e.g. cervical screening, retinopathy clinics."

Technical Support

The technology to support communication networks was particularly important. The facilities for linking people in the community with the health service bases and professionals as well as with other health professionals and supporting personnel were noted. For nurses in more remote areas there were considerable difficulties associated with telephone reception:

> "Cell phones don't work and only have RT (?radio telephone) coverage within 10km radius"
> "Cellphone and beepers do not work".

> The lack of links was aggravated by the limited transport facilities and difficult roads ("all not sealed"), that threatened ready access to health care and hampered access to specialist expertise when needed.

Arrangements with a hospital enabled technical support:

> "Adult care and treatment in conjunction with local hospital - share resources i.e., they provide equipment we supply human resources."

Other aspects of technology noted related to record-keeping. Having "regular updates" of the "med tech, computer system" had streamlined record keeping and enabled expansion of public health projects. This had extended the reach of the service to residents in the area e.g. "recalls for immunisation, health checks, mammography, cervical smears, blood tests, health screens, breast-screen programme". The fax facility had improved the service by enabling prescriptions to be filled and delivered faster.

The availability of the technology was not sufficient, however; problems were experienced when there was poor coordination of usage:

> "Problems with prescribing and faxing to chemist – pressure to fax scripts through before 1pm, and the need to keep a supply of drugs for dispensing… if needed urgently"
> "There are gaps in information coming into the practice, i.e. on discharge from hospital – we are not always aware of when and if there is a need for follow-up".

3.2.2 Nurse Role

Many of the nurses referred to how aspects of their work contributed to what and how services were being delivered. They referred to the responsiveness of the service to the needs of the people and the whole community as well as to the public health agenda. Comments are accommodated within four sub-themes:

- Reach into the community
- Funding for nursing work
- Promotion of public health
- Recognition of the nurse's work

Reach into the Community

The nurses commonly referred to the significance of their role in bringing them close to their communities: integral to community life (most had lived in their communities for many years) and "knowing the people":

> "There was a 'big push' by management 3 years ago to have my base moved to a town office! I strongly opposed it on the grounds that a rural out-reach service cannot be provided from a town based office – one has to be 'in' the community"
> "Appropriateness – staff are local, they know the whanau dynamics as well as community dynamics!".

Being mobile and going out to the people was viewed as important. Those employed by community trusts, Maori Provider organisations and HHS/DHBs noted it as a *success* feature, while other nurses noted that being confined within the medical centre restricted the people they could be attending, and the healthcare they could be providing.

> "Often take service to clients rather than clients to service (clinic base) e.g. marae or school, kohanga visits…community like and trust the staff";

> "Staff are local, they know the whanau dynamics as well as community dynamics…"
> "People on the practice register who do not often seek help or are casual or itinerant patients do not get much input from the practice except for offers of appropriate screening"
> "The patients who present for care appear to find the care satisfactory. However there are others in the community without the money or the knowledge to seek help"

Funding for Nursing Work

The extent to which nurses could contribute to healthcare was inhibited when funding was not dedicated to nursing practice. When the HFA/MOH contracts were held by their GP employer, the nurses' primary responsibility was to support medical practice and the operation of the general practice; the design of the service was focused on medical care:

> "Under this model patients do not have sufficient access to a nurse. The nurses are educated to provide a more comprehensive service than we are able to provide because of the funding through the GP";
> "The payment system is hindering the development of nurse led services. A nurse only consultation is not eligible for GMS claim. Any charge to the patient increases their costs which is unacceptable in the socially, economically disadvantaged area we serve, and cuts the income generated by the surgery. This disadvantages doctors, nurses and patients"
> "Public Health Nurses historically worked in infant care which made working with families more holistic and gave access at much earlier time. The change in contractual emphasis has meant in some cases health care not accessed until school - when referral made to PHN."
> "Gaps in the service provision occur: if a service (contact visits to well elderly) is not covered by a contract – funding."
> "The doctors do some health education at the secondary school. If a nurse is asked to do any health education at schools or elsewhere in the community it is done in her own time."
> "A more comprehensive and accessible service could be offered to the community with different structuring and without worrying about whether the work you are doing is generating any money for the employer."
> "People on the practice register who do not often seek help or casual or itinerant patients do not get much input from the practice except for offers of appropriate screening."

When employed by the HHS/DHB a nurse could contribute to healthcare more effectively by holding the contract with ACC directly:

> "The ACC contract between ourselves and ACC has worked successfully for 1 year and has enabled us to cover that "grey" area which has always existed out here."

Promotion of Public Health

Contribution to health promotion and disease prevention was viewed by most as an essential dimension of the nursing role: a role they were well prepared to undertake. While there was achievement in some areas there were barriers in others. Barriers for the nurses employed in general practices were associated with broader work conditions; the emphasis placed on the management of acute conditions with which clients presented was at the expense of the public health agenda. Many nurses expressed considerable frustration at the barriers.

> "Huge effort on self-care and prevention of disease."
> "It works because the community have access to early assessment and advice should they choose to do so and so hopefully can get further medical treatment earlier rather than later."
> " The huge volume of work (i.e. patient and paper work) that nurses are dealing with each day is severely curtailing; our ability to develop screening programmes, health promotion programmes or to devote time to patient education – all of which are areas I see as absolutely crucial for nurses to be working in as rural nurses in the Primary Health Field"
> "Gaps in provision of services e.g. vision screening and problems with low income families when vision deficits identified."
> "The service is demand led with little time for health promotion or education".
> "Missing: health education…not enough time to see people properly: always having to 'fix' things. Heaps of work."

Recognition of Nurse's Work

There were repeated comments about the need for the particular work of the nurse and its significance to be recognised. A fee-for-service model assumed a medical service as core, obscuring the value of the nurse's work for clients and health, even if funded through a small fee. The fee is paid to the general practice:

> "There is usually a small cost to the patient for the service I provide, although 30% of time would be telephone work and 20% would be support and back-up to family and to patient where no fee can be charged".
> "Nurse provided service is user friendly and cheap for consumer. Very accessible and provides comprehensive nurse assessment and referral service."
> "Nurse provider role needs stronger definition to make it more easily understood."
> "(The DHB) is not fully aware of role/responsibilities of rural nurses – difficulty with pay rates etc."
> "Not much opportunity (financially) to set up nurse provider service but plenty of evidence to suggest that additional nurse provided services would be advantageous."

3.2.3 Achievement of Patient/Client Outcomes

Some nurses referred to health outcomes as a feature of the judgement of success of a health service. However it was noted that a successful health service did not necessarily mean positive health outcomes. How people took responsibility for health matters and used the services was a significant feature. Comments related to

- Patients'/clients' satisfaction with the service received
- Their view of the responsiveness of the service
- Changes in morbidity and mortality observed.

Satisfaction

Satisfaction related to the individual patient and community opinion of access to the service. This was influenced by the motivation of people to seek healthcare, the time taken for consultation and the relationships with the staff. A few nurses indicated patient satisfaction specifically with their nursing service. One nurse drew on the results of a "yearly questionnaire/survey" to judge success and another recognised the need for one: "you should ask the community that" (Question: 'Is this service model successful?')". Satisfaction was compromised by the work conditions of nurses and GPs.

> "The patients who present for care appear to find the care satisfactory. However there are others in the community without the money or the knowledge to seek help."

"Patients had to wait, sometimes for long periods of time, in waiting rooms while the doctors were called out to attend to accidents, medical emergencies or delivery of a baby." (General practice)
"I hesitate to call it a successful service. Patients face big delays in the surgery waiting rooms. They complain of difficulty in getting appointments due to the huge demand from people wanting to see a doctor."
"Mostly successful although appointments are sometimes running late depending on workload." "Community like and trust the staff"
"Nurse provided service is user friendly, cheap for consumer, very accessible"

Responsiveness

Comments about responsiveness referred to the conditions under which people could receive the most appropriate healthcare. Features included the site and timing of service delivery, the choice offered, the containment of cost, integration of care, and whether the design of the service could take account of personal living circumstances.

"Appropriateness…access in the home where they want or on marae – they feel it is their territory (safe zone) does not belong to the person delivering the service."
"It provides easy, early access to medical help…service is free…liaison, referral point to other services…saves people many kilometres of travel and cost".
"(Where there are gaps in services) patients can go home with no help, or knowledge of availability or how to get help."
"It works because the community have access to early assessment and advice should they choose to do so and so hopefully can get further medical treatment earlier rather than later." (A nurse working independently fee-for-service under a negotiated contract with the HHS/DHB.)
"This model should be successful as it is a free medical area. People are offered every possible service, can get transport assistance if they have to leave the area to attend a specialist appointment".
"Resource person for accessing equipment, information, advocacy in accessing health services."

The involvement of the community was seen to achieve responsiveness:

"This community service provided is extremely successful as it came into being as a result of a community need by the community and is therefore fully supported; needs of the community constantly monitored and needs met as required."
"Success with Community Health Committee who are committed to the well being of the community:

Morbidity and Mortality

The impact on morbidity and mortality was implied in reported observations of people's health status relating to the prevalent diseases, including how they contributed to their status.

"Free medical service does not necessarily mean that people's health is better. People still need to take responsibility for their own health.
"In previous times, conditions made healthcare much less effective: people could not access care…it was awful…people died …I've personally seen radical changes and we have made significant progress. But still problems: obesity, (diabetes), smoking related diseases, poverty and the use has increased – some people less skilled in survival – used to be vege gardens, now video shop."

3.2.4 Relationships With GPs and Other Healthcare Workers

Many of the nurses' comments referred to interactions with personnel, but *success* of the service provided was particularly bound up with how they viewed their relationships with medical practitioners. Comments are presented within two sub-themes:

- Collaboration.
- Employee status

Collaboration

Many comments conveyed the nurses' view of themselves as integral to the staff providing a collective service - nursing, medical and other – with the use of "we" and "our". Further, they tended to assume the GP practice as central (e.g. "the huge demand from people wanting to see a doctor"; "it provides easy, early access to medical help"), and the form of collaboration to be the assistance of the GP and facilitation of the service.

> "Being part of an IPA has provided a venue for sharing knowledge, working as part of a team and reducing the feeling of isolation."

Otherwise collaboration was expressed in the way they (nurses) communicated with each other in relation to arrangements for healthcare for patients/clients.

Comments noted a particular "liaison" feature of the nurse role that linked all nurses with GPs, and facilitated communication and networks amongst all services and personnel. A few comments implied a broader distinct nursing purpose and practice, complementary to the medical purpose and practice, which had an impact on people's access to appropriate healthcare. However it was noted in other responses that difficulties in achieving collaboration could be ameliorated through less "control" over healthcare provision being asserted by the medical practitioners.

> "Serve as a liaison, referral point to other services"
> "(Grouping services) improved our service hugely…easier consultation between health professionals".
> "There is an element of dependency on the nurse (by residents of the community) which is not unexpected but with advice and education, people at most times will happily make the trip to town to see their GP or the duty doctor."
> "GPs and nurses very flexible in hours and place of care given. Due to muddying of role boundaries – care can be managed by one or all of the practitioners depending on case."
> "Good communication between kaiawhina, rural nurse and clinic-in-staff gas been developed over past year."
> "The variety of agencies involved in home help and district nursing can mean gaps in communication."
> "The success is dependent on the collaboration between services: St Johns, local hospital, GPs, PHN, other Maori providers. Good communication".
> "Within the service various other health professionals' clinics are based e.g. public health nurse, monthly dietitian and diabetes nurse educator, physiotherapist, mental health key workers. Iwi based service liaise and meet about shared patients/concerns in community." (Varied funding sources for each were noted)
> "Excellent networking with e.g. palliative care, ostomy nurses, wound nurse.
> "(pressures on GPs are crippling) but there is not the legal or professional support yet for nurses to develop into a support role for the doctor."

Employee Status

In comments of nurses employed in general practices, employer-employee relationship and associated collaboration issues were noted. As employees, the nurses had expectations of on-going support for improved work conditions, training and education. This influenced the view the nurses had of their role.

> "The payment system is hindering the development of nurse led services…this disadvantages doctors, nurses and patients."
> "Accountability, business interests and allocation of work become issues with the employee/employer relationship. A more comprehensive and accessible service could be offered to the community with different structuring and without worrying about whether the work you are doing is generating any money for the employer."
> "I think our service is what the 'practice nurse' subsidy was designed for - I am available to the patients at little or no cost to them…The doctor can provide a better service to his patients through my assistance without disadvantaging (GP)".
> "We are encouraged to attend relevant study days etc. for upskilling and accreditation…we value the close relationship between other health workers and the supportive role our GPs foster."
> "A very satisfactory community clinic to work for – will fund ongoing updates for training."
> "Expectations or support level from GPs vary – even day to day with the same GP"

3.2.5 Work Conditions

Many comments referred to work conditions, mostly noting specific issues that indicated dissatisfaction ("hard on staff"), although several noted their service agencies as good places to work ("it's a joy to work up here"). A relationship between staff work conditions and accessibility of the service to people was implied. Two major sub-themes incorporate the issues raised concerning conditions of work:

- Workload
- Hours of work

Workload

Workload was commonly noted as increasing and stressful. For some it was through increasing expectations of the existing staff; for others it related to loss of staff without replacement, temporary or permanent. Comments concerned nurses, doctors and all personnel involved with service provision, and did not seem to be related to service setting.

> " I believe our medical centre is providing excellent service despite the crippling workload we face every day…the GP is under constant crippling pressure from (huge demand from people wanting to see a doctor)…magnified a hundredfold by the enormous amount of paperwork he is expected to deal with on a daily basis."
> "Paper work…keeps climbing".
> "At times doctors and nurses over worked when on call, especially in holiday weekends.…the huge volume of work (i.e. patient and paper work) that nurses are dealing with each day is severely curtailing …" public health programmes. "A one-on-one roster for the GP is totally unacceptable…"
> "Reduced staffing levels challenge one's ability to provide the expected services".
> "Heaps of work. Still room for improvement…?another nurse to help…20 people a day still only a dream."
> "Difficult to staff at times"
> "Burnout"

Hours of Work

Hours of work related to employment arrangements and the availability of locums to relieve staff for education/training, holiday and sickness. Many of the nurses noted their work as part-time; the opportunity to choose working hours was important. Although many recorded multiple employers and roles they did not make comparative comments. However, many nurses inferred that the time commitment demanded of them, particularly for after hours on-call work, was unreasonable.:

> "Difficulty in obtaining locums for relief of (overwork), study or holiday leave"
> "A one on one roster for the GP is totally unacceptable"
> "Unable to single handedly provide a 24 hour/7 day service"
> "Working part-time is ideal for me – I have other community commitments".

3.3 Exemplar

One nurse presented a detailed description of the first part of her working day at the health centre in which she had worked for many years. This elaborated the responses of many other informants to express a particular understanding of *success*. It illustrates the capability of the nurse to:

- respond to a wide range of health concerns with immediacy (multiple signs and symptoms related to diverse medical diagnostic categories and treatment regimes);
- take account of what had led to the problem and what might eventuate;
- respect the uniqueness of each health predicament;
- draw on considerable knowledge of the person, condition and requirements for medical attention.

The presenting predicament as a whole, e.g.:

> "9.15am: (Diabetic person with toe wound) - BSC (blood sugar) 16.4!! What did you have for breakfast? – 'Boil up from last night' – Taken pills? – 'NO!!'
> 9.10am: Phone – acute abdomen – bring in – by the time they get here, pray doctor here.
> 9.25am: Pensioner – acute wheeze – wanders in. Lungs bad…Obviously unwell +… Not a happy person … Kaiawhina to find pensioner daughter.
> 9.30am: "Phone – baby crying all night – wants to come in…Pamol and came about 10am: Doctor should be here!
> 10am: Arrival of baby.
> 9.59am: "Midwife (at the secondary hospital site) link gynaecology – start (medication) - Can you do BP? – 36weeks antenatal – 140/100. Been (in the city) four days – recheck tomorrow – thinking about inducing – hasn't slept, anxious."

The health care activities, e.g.:

> "9.15am: Change dressing toe (of diabetic); 9.25am: Nebulize (pensioner) – Peak flow 100 – T.35˚ – (5 minutes later) find another blanket for cold pensioner – pray doctor (comes) soon…
> 9.15am: Change dressing on toe.
> 9.40am: "(Patient enquiry) 'Ran out of my pills' – (interim replacement from store at health centre) and make appointment this week to see doctor".

Outcomes, e.g.:

> 10.15am: Doctor arrives …check pensioner – post nebulizer peak flow still 100 – needs TPS – Admit".
> Temporary symptom relief until doctor's appointment.
> Stabilised diabetic status and alert to more intense monitoring.

The management of the patients' consultation at the health centre, e.g.:

> 10.15am: Doctor checks and orders hospital admission for pensioner "…lives alone, organise ambulance to take…doctor writes letter, phone ward, talk to staff nurse…"

The management of the service operation in general, e.g.:

> "9.50am: Another fasting blood – cholesterol etc…spin blood…fix bloods – labels – bags – chill
> 9.55am: Rural nurse link – going to do Form 1…will be at school till xx
> 10.15am: Doctor arrives, wants coffee, had a long night, seems tired and grumpy - labs need checking, pile of mail to sort – gets put to one side – check pensioner".

"And so it goes on……"

3.4 Overview

In general, the nurses' comments were more descriptive than evaluative in content. They referred to the healthcare received by people in the area and the nature of their work - their activities, capabilities and responsibilities. They were concerned with what supports or inhibits them in achieving the potential of their role directly in relation to people's health, and/or indirectly in relation to the delivery of the service.

Hence their comments were more about the design of the service than its delivery. They believed they could – and should – be providing much more holistic care and health promotion/protection and disease prevention programmes than their current conditions supported, or even allowed in some places. The emotive comments were concerned with the barriers to their potential for initiative.

Whereas some nurses noted good relationships with doctors and collaboration amongst healthcare workers in general as the key to the success of their health service, others noted a misunderstanding of the nurse role as a barrier to the collaboration that could achieve more effective healthcare.

The nature of the employment arrangement shaped the focus of the comments, and hence the way *success* was viewed. Some nurses saw their role as integral to the delivery of the medical service for which they were employed; success related to the contribution they could make to the healthcare for clients registered for the service and presenting at the service base. Others referred to their role as a distinct nursing contribution directly to health, complementary to medical practice, and commented on their actual and potential efforts to reach to the whole community. Many expressed frustration at having their role curtailed because of their employment status, when their employers held the contracts and designated the funding.

Nurses employed by CHE/DHBs tended to refer to distinct components of their work such as health education in schools, rather than work conditions or relationships with other healthcare providers. Nurses in the Maori provider organisations emphasised the essential nature of ethnicity in shaping their work. And nurses employed by community trusts referred more to the how the community was involved and client satisfaction.

4. INTEGRATED OPINION OF NCRH ACADEMIC STAFF

4.1 Background

The academic staff of the Centre for Rural Health had been involved in discussion about methodology as the project progressed. Sue Dawson, the lead researcher, compiled data from each group of informants to publish three interim reports: general practitioners (June 2000), nurses (October 2000) and community representatives (February 2001). The documents consisted of extracted quotes and notes.

To begin the integration of these data, Sue Dawson and Ron Janes drafted a paper for publication: *"Are we getting better yet? – An exploration of the variety of meanings of the term 'success' in health service provision"*. Raw data and information from the international literature were integrated into lists of indicators according to the perspectives of the different key players in healthcare provision. The draft could not be developed beyond a preliminary stage. However, the tentative conclusion stated that the meaning of *success* was variable and addressed complexity: a definition would be "messy":
"Definitions of success will therefore vary, depending on whose experience, point of view, and vested interests are involved" (p.5).

The academic staff of the Centre for Rural Health was invited to study all this data. Their reflective opinions, together with their selection of significant points from the questionnaires/interviews and the international literature review (Bidwell, 2001a), were compiled as a list of: "factors/aspects/components of *success*". This contributed an informed opinion to the study of *success* of rural health service design and delivery

The list was presented as an inventory organised within seven sections. This was intended as a beginning framework for the development of "checklists for *successful* rural health services" (Dawson, 2001b), but this project could not proceed further:

Different models (or components of models) of rural health service provision
Community involvement in rural health services
Catalysts/precipitating events
Access
Sustainability
Standards & outcomes
Health professionals.

4.2 Qualities of Rural Health Services

The inventory of opinions have been regrouped and divided into descriptive and qualitative categories. The two descriptive features of rural health services (models of service provision and catalysts/precipitating events for community involvement) are addressed separately. The qualitative category includes factors of service design and delivery that the NCRH staff members have identified as significant to the judgement of *success*.

- Capacity for community participation
- Accessibility
- Sustainability
- Standard of service delivery
- Standard of professional practice.

4.3 Factors of Success

Through a further phase of analysis, five factors of service design and delivery were identified to inclusively re-organise the items from the extensive inventory of expressed opinions. These are the factors the staff members believe should be addressed in an evaluation of *success*, according to the qualities noted in 5.2:

- Funding
- Needs of clients/patients and practitioners
- Relationships amongst stakeholders
- Site of service delivery
- Infrastructure

4.4 Overview

The academic staff of the Centre for Rural Health, in taking an overview of the collated and organised data relating to the key stakeholder groups to date, contributed an additional perspective to the meaning of *success*.

Their statements of opinion reflect a greater familiarity with the New Zealand health policies, recent statements of strategy and the dialogue surrounding their implementation. They contribute an academic perspective of the informant groups: nurse, GP and community: knowledge and experience as practitioners, educators of practitioners, researchers and pivotal facilitators of rural practitioner networks. Hence the qualities of services are expressed in terms of the broad factors already part of the policy language, debates about funding and service development, and have the inevitable orientation of a health professional's (vis-à-vis public/community's) perspective brought to the development of health policy.

Accordingly the inventory of statements of opinion frame the meaning of *success* in relation to the structure and operation of *service delivery*, and the way in which these are supported or not supported by funders, managers, practitioners and consumers as clients/patients.

5. CHARACTERISTICS OF MODELS

5.1 The Meaning of 'Model'

The questionnaires used for the two provider groups (GPs and nurses) asked informants to select their "model of service provision" from a list of five discrete options relating to funding alternatives: community trust, GP owned private practice, nurse provided service, special area scheme, iwi provided service.

It was clear from the inconsistencies in the selection of the "nurse provided service" option that it did not fit as a discrete category (Dawson, 2000b). Further, many responses from the GPs and nurses included more than one option suggesting that models are now more complex than assumed in the past. Analysis of data therefore drew mainly on the responses in the extended-answer sections where informants were asked to describe "how your health service is provided" and comment on whether "this model is particularly successful or unsuccessful".

It was apparent the term 'model' was interpreted differently: informants attended to different features only one of which was the administration of funds. However, there was a distinct division in type of service delivery into accident-emergency response and other healthcare. PRIME was one pervasive model noted for accident and emergency services.

5.2 Differentiated Services

5.2.1 Accident and Medical Emergency Response

Key features of accident and emergency services included:

- Centralised administration – still at different levels of locality – area, region, national.
- Availability of expert medical opinion 24 hours.
- 24 hour coverage of readily accessible, appropriately responsive paramedical expertise and up-to-date facilities/equipment.
- Communication technology and transport to provide the greatest immediacy and accuracy of response, the smooth flow through the network of services, and the safety of all personnel involved.
- Various arrangements for teamwork (medical, nursing, local support service employees, volunteers).

5.2.2 Other Healthcare Provision

Models of healthcare design and delivery, other than the accident and medical emergency response, were very varied and changing. Different features focused the responses; these are divided into service delivery and design:

5.2.3 Service Delivery

- Funding source: fee-for-service, MOH (direct to provider- multiple contracts), community trust (MOH + fund-raising, donations), MPO.
- Capacity of the local population to sustain the service: usage and payment
- Administration and Management structures: solo and group general practice (independent and shared business arrangements)
- Site/facilities of service delivery: centralised base with or without satellite clinics; adjacent to, linked to, or distant from a secondary hospital (DHB administered,

community trust administered, GP or nurse administered); owned or rented premises; independent or shared facilities/equipment.
- Position in the network of services of the region for flow of patients: between primary, secondary and tertiary services, support services (laboratory, x-ray, pharmacy), public and private provider agencies.
- Form of access for patients: clinic based for consultation or home visiting; by appointment, referral or walk-in; hours of availability.
- Communication and documentation systems to enable collaboration beyond the service: outreach GP and nurse practices (to community trust clinics, to community hospitals, to tertiary hospitals and specialists), in-reach specialist doctor and nurse practices (from DHB services, community hospitals, other agencies); group practices.

5.2.4 Service Design

- Range of healthcare provided: accident and medical emergency response; non-emergency consultation/monitoring/surveillance; hospital follow-up; health protection (screening and health education); health promotion projects; service coordination; individual, family, community orientation.
- Who provides the healthcare with what knowledge/qualifications. Key personnel and relationships/collaboration: GPs, nurses, office managers, paramedical personnel (pharmacists, lab. technicians, radiographers), podiatrists, physiotherapists, home help, DHB employed nurses (district, public health, specialists e.g. asthma nurse), Plunket nurses, midwives, complementary therapists.
- Flow of patients/clients amongst through the system: teamwork, referral arrangements, information sharing.
- Patient/client source: universal/focused; within catchment/locality/ area/region; tailored to particular groups (Maori/other ethnic groups, disadvantaged, age).

5.3 Comment

Thus there are two distinct components of health service design and delivery that separately focus the judgement of *success*: accident and medical emergency and on-going healthcare. The increasingly specialised technology becoming available is exaggerating the difference that once was of little importance. And the increasingly technical nature of some interventions means that a greater range of personnel can undertake them within the scope of protocols. These trends bring attention to the success factors identified above: collaboration amongst practitioners and the information and communication technology as a supportive infrastructure.

A thread running through the GP comments was the strain of the on-call work. For some this was leading to burn-out. Others had developed ways of reducing, or containing, the proportion of out-of-clinic-hours involvement that were successful at least for the near future. These included:

- Group GP rosters locally and regionally, sometimes spanning multiple neighbouring catchment areas, and covering extensive geographical areas. For some GPs the on-call rosters were the only form of collaboration.
- Involving nurses as alternative practitioners or medical extenders (under supervision by telephone)
- Collaboration with or delegation to local community hospital staff (employees of local community trusts and HHS/DHBs) supported by emergency facilities and links to the accident and emergency staff in regional tertiary hospital

- Reliance on the local paramedical arrangements as outreach services of the regional tertiary hospital.
- Availability for urgent out-of-hours calls only for clients registered with the (solo) practice.

The spread of the PRIME scheme around the country attests to its success in opening up possibilities for cooperative arrangements involving GPs, hospital staff, community nurses and trained local paramedics. There were no adverse comments made about PRIME. The networks, nationally and regionally coordinated, are specialised, focused and self-organising in providing an integrated emergency response locally, involving personnel with different knowledge and skills.

This is quite distinct from the provision of other forms of healthcare which serve a different purpose for consumers. Therefore, it is reasonable to suggest that the judgement of success of health service design and delivery in the future will refer to distinct service systems (e.g. health outcomes, administration, funding and workforce). In his review of the literature, Bidwell (2001a) cited initiatives in Australia involving different forms of coordinated services at regional level that have been "successful in maintaining local access to a range of services" (p.46). But these did not differentiate the accident/emergency response from other forms of health care.

Questions arising are: who the first-line personnel should be for each of two distinct forms of health service, how the different service systems draw on the expertise of the personnel available, how personnel accommodate the two different forms of practice in relation to work conditions, how "emergency" is defined by consumers and practitioners, and the conflict of interest between providers and consumers.

Given the variability found in the combinations of the features of the health service models in operation, there was no way to determine from the data whether, or how much, each of the features contributed to the model's *success* in any one setting. However, a list of features such as this might contribute to the foundation for developing guidelines to construct and descriptively compare models in the light of health sector changes.

SECTION 2

THE SUCCESSFUL DESIGN & DELIVERY *of* RURAL HEALTH SERVICES:

A Discussion

6. THE TASK

6.1 Review

The task of Project 6 was to explore the meaning of "success" in the design and delivery of health services, and the nature of community participation. Through stages one and two the opinions and experience of members of three major groups of key stakeholders were collected: rural residents, GPs and rural nurses. An overview taken by academic staff of the Centre of Rural Health was included as a fourth source.

This report presents the analysis of this data. The way each group perceived success was presented in a set of factors. In this section the meaning of success presented in these sets of factors is discussed. The perceptions of the groups are compared and considered in relation to the New Zealand and international literature discussed by Bidwell (2001a), other recent authors and the Government's health strategy (King, 2000) and primary health strategy (King, 2001).

6.2 Different Perceptions of Success

The data from the questionnaire responses of GP and nurse informants together comprise a provider perception to contribute with the other two key stakeholder perspectives (consumers and funders) to the exploration of what constitutes success in the design and delivery of rural health services. Although rural nurses and GPs have been referred to as "the cornerstone" of primary health service delivery (Annette King, Minister of Health, in a radio comment), the diversity and complementarity of perspectives of different providers are considered essential to success (King, 2001). The data drawn on here would be helpfully elaborated with the involvement of other providers such as pharmacists, physiotherapists, NGOs, volunteers.

There were distinct differences between the perspectives of the two provider groups. They differed in their interpretation of the same questions asked of them, and what they paid attention to as the meaning of success of their service model. They differed in the barriers to success identified. The variation is inevitable given the distinct experiences in their work, the nature and orientation of their knowledge of health and health care (Carryer et al, 2000; Litchfield & Ross, 2000), and the distinct forms of their investment as contractors/employers and employees in service delivery. The general practitioners did not refer to their professional practice per se; success was the ability to continue practicing. Therefore, the issues of maintaining the business, funding for expansion of services, retention and recruitment, the availability of locums and the stress of overload were paramount.

In their responses the community informants attended to healthcare, bringing a perception that was entirely different from the two provider groups. A different set of factors emerged. This was at least in part methodological. They were asked about health problems and to describe services available. Many did refer indirectly to the success or failure of existing services and a few emotive comments were drawn from personal experience as illustration. But in general, the informants were more reflective and abstract in identifying healthcare needs.

In their comments the nurses attended to issues that spanned the comments of both GPs and community informants: service delivery and healthcare needs. They viewed success in terms of capability and support to address health and well-being of people as individuals and keeping communities healthy. They attended more to the nature of their work: the nursing activities and responsibilities in relation to health issues. Thus they perceived their work as an interface

between the people and the medical practitioners, with the potential to contribute more towards access and the successful delivery of services if acknowledged as complementary to medical practice.

Because of these different perceptions, the discussion is developed around a provider dimension and community/consumer dimension. Discussion of the provider dimension takes account of the distinct but complementary perceptions of GPs and nurses.

7. TERMINOLOGY

It became apparent early in the data collection process that the provision of healthcare for rural populations is complex and in flux. The term 'success' evoked varied responses derived mainly from local experience affirming the well cited observation in the literature that there is "no cookie-cutter key to success" (Bidwell, 2001a) As a way of creating some order in the diversity of perceptions in order to proceed with discussion of the data it was helpful to redefine the key terms of the project. The terms, although not discrete concepts, reflect the different emphases brought by each of the three stakeholder groups as noted above.

Healthcare is the care received by people through the health services. It is the response of the services to health issues that influence how all people as individuals and families, and as citizens of their communities, get on with life and living in their rural circumstances. Healthcare focused the comments of the rural resident informants. The nurses also addressed healthcare in relation to service design and sometimes issues of service delivery.

Service design refers to the nature of the healthcare provided, including:

- The aspect/s of health addressed
- What activities comprise health care
- How these inter-relate with all other aspects of health and health care: when and where the health care is available, who (expertise) provides the health care.

Service design focused the comments of the nurses and how the structure for service delivery supported their work in providing healthcare.

Service delivery refers to the infrastructure through which the appropriate health care is available to rural residents within the limits of the resources including components:

- Facilities
- Technology
- Funding
- Qualification/competence of personnel
- Quality of system performance

The general practitioners focused their comments on service delivery, it's capacity to support the health care they provided and it's sustainability.

In general, ***success*** was viewed in relation to these three interrelated threads of the health system:

- Healthcare is ***successful*** when all people receive the appropriate health care.
- Service design is ***successful*** when the healthcare provided is appropriately responsive to health issues and is delivered in a way that is accessible to everyone on equal terms.
- Service delivery is ***successful*** when the infrastructure facilitates access to the healthcare designed and is sustainable within given boundaries.

8. THE SPECIAL RELATIONSHIP BETWEEN MAORI AND THE CROWN UNDER THE TREATY OF WAITANGI

The need for improved health status and reduced health inequalities of the Maori were recognised in focused questions of the questionnaire used for the community representative interviews. Most responses noted the importance with reference to the extent to which services were "culturally appropriate", and capable of addressing issues of equity of access. The holistic Maori understanding of health to be addressed for services to be successful was acknowledged in some responses e.g. dislocation from whanau support.

A few of the nurse and GP informants were employed in Maori provider organisations but it was not possible to differentiate the *success* of these services from others. One GP drew attention to some difficulties in being an employee of a Maori Provider Organisation. There were some references to the practice difficulties when clients accessed both the private GP facility and the Maori provider/iwi facility operating nearby.

In general the nurses described their work according to needs of Maori for access and their links with other services and personnel e.g. Tipu ora, visits to kohanga reo and marae. Emphasising a partnership approach, several noted the involvement of local kaiawhina and other staff in service design who "know the whanau dynamics as well as community dynamics". The nurses were mobile, taking health care and specially developed public health programmes to their people e.g. aukaiti kai papa (smoking cessation): "on the marae, kura kaupapa, kohanga reo, whanau home and community", where people "feel it is their territory – safe zone". One nurse noted that, in tending to a population of over 90% Maori, the service had developed as "very much bicultural with 40%:60% (Pakeha: Maori) staff ratio" and "Maori cultural needs met as per (iwi) protocols".

Although the informants from all groups acknowledged the need for protection of the healthcare of Maori, greater involvement of Maori in the preparation and data collection would have raised other issues surrounding the success of service design and delivery. Some of the communities selected for inclusion had large Maori populations and there were efforts to develop a partnership approach to data collection there. However, for various reasons, this did not eventuate. Therefore the sets of factors identified need to be further explored to address the principles underpinning the implementation of the Primary Health Care Strategy as stated by the Rural Expert Advisory Group (2002).

9. PROVIDER DIMENSION

9.1 Workforce

In this discussion of workforce the data from the two provider informant groups, despite the limitations of representation, are significant in raising a range of issues concerning collaboration and teamwork.

Because the nurse and GP groups responded to the same two open-ended questions there were some consistencies including the significance of a supportive infrastructure (next section) and working together. The informants of both groups revealed a particular understanding of what it means to live rurally . They were concerned with the implications for rural residents of the loss

of services and increasing sector demands to sustain a viable health service. This is consistent with the international trend towards the construction of primary rural health care as a distinct, generalist discipline in its own right that has, in other countries, been the basis for programmes to retain and recruit healthcare professionals (Bidwell, 2001a). The issues of "rurality" are increasing in significance for providers as for rural residents.

The implications of declining numbers of rural GPs was an obvious issue of concern for the GP informants and also mentioned by some nurses: their concerns were for communities left without a medical presence and for the strained work conditions, income, family life and morale of the remaining GPs. The latter had found various ways to stave off the impact with as little disruption as possible to the service they were providing, but it had been at a cost personally, professionally and financially and most did not have a positive outlook. Hence sustainability of the GP workforce, assuming retention of their general practice, was a consistent thread throughout the GP data, many unable to see survival beyond the near future. This is consistent with internationally reported trends (Bidwell, 2001a).

However, a few had a more optimistic outlook than others. Taking an overview, success seems to have been associated with a general movement of GPs to more centralised locations in the towns where different forms of collective arrangements had been established e.g. on-call rosters, shared premises, employment of a greater range of personnel. This trend is exemplified in the international literature by the increasing use of the term "collocation" as a feature of sustainability of the general practice and retention of medical practitioners in rural localities. However, in Queensland where the workforce has reportedly been reconfigured within successful integrated service arrangements, collocation, although desirable, is not "important to the successful operation of the service as a whole" (Bidwell, 2001a, p.9).

As apparent in the literature (Bidwell, 2001a), the successful design and delivery of health services is much more complex than numbers of doctors. The Australian developments suggest success is associated with extending the view of local workforce to regional level and broadening the view of health: networks that acknowledge the complementarity of expertise of different healthcare workers and teamwork. In this study, and reported internationally, how doctors and nurses might work collaboratively was a major issue for both groups but their purpose for collaboration was viewed differently.

GPs referred to nurses as extending the accessibility of their practice and relieving the strain ("use of nurses"), while nurses referred to expanding the range of healthcare the whole community might receive if they (nurses) were free to develop new roles. This suggests their autonomy as practitioners in their own right. Not all nurses viewed their work in this way, however. This variability in conception of role lends support to the findings of a previous study that outlined four complementary rural nursing models (Litchfield, 2001).

Nurses did not refer to numbers, retention and recruitment issues directly but noted the increasing issues relating to high workload. In particular, these were associated with the changing employment and contract arrangements that defined and limited their work. However, many nurses, particularly influenced by the expanding educational opportunities, have been innovative in expanding their activities within new roles actually made possible by the contracting arrangements (Litchfield & Ross, 2000).

Therefore, whereas workforce issues influencing success, according to GPs, focus attention on a supportive infrastructure and education for the protection and avoidance of further loss to

communities, according to nurses, they focus on a supportive infrastructure and education for new roles that expand health care. Developments in "academic rural practice" in Australia and the US, as a retention and recruitment strategy, recognise the educational component. Bidwell (2001a) noted the international trend to recognising rural medicine and rural nursing as "distinct disciplines". However, the nurses in this study were concerned not just with expanding their work into "multiskilled roles" as claimed by Bidwell, but rather with expanding new roles that are complementary to the medical roles.

The imminent establishment of Primary Health Organisations, in the light of the recommendations of the Rural Expert Advisory Group (March 2002) for the implementation of the primary health strategy in rural areas, opens the way for nurses as practitioners to contribute more substantially to the success of rural healthcare.

9.2 Infrastructure

As noted above, infrastructure was a major feature of success for both nurses and GPs but with different meanings. For GPs it involved financial viability, the premises and service management. The low morale revealed in their comments was largely associated with the inadequacies and consequently the sustainability of general medical practice in rural areas, at most beyond the next few years.

The management of services was a feature of concern to both groups, particularly in meeting the increasing demands for contracting and documentation required of service delivery within the new primary health care context. GPs seldom mentioned aspects of governance but nurses were concerned with how they were, or might be, involved in the processes of governance. As employees, nurses viewed success in terms of workplace and participation in the governance that would facilitate their capacity to address health in their own way. Their need for facilities and equipment to support their nursing work was not necessarily recognised and their requests sometimes ignored. This limited what they felt they could achieve.

There was not agreement amongst GPs on what premises and facilities arrangements were successful. Ownership was a business asset for one and a drain for another. Having access to a rural community hospital and its facilities and equipment enhanced the practice of some while others made no comment about the disadvantage of not having access.

According to the community informants the residents of some localities had invested in premises hoping to either maintain or attract health services, often in vain and this had contributed to the low morale. There were few examples of community involvement in providing and/or managing premises and facilities noted. The findings of this study support those of Barnett & Barnett (2002) that the formation of community trusts, Independent Practice Associations and Maori Provider Organisations have contributed to resolving problems of infrastructure for many GPs, avoiding issues of entrapment. However, not retaining control over their infrastructure was a concern for some GPs; priorities for owners and practitioners could be viewed differently.

9.3 Integration

9.3.1 Service Networks

The issues of workforce and infrastructure are related to the success of service integration. Integration of services was reported to have occurred, to a degree, with the collocation of GPs towards the larger centres, and expanding to include multiple healthcare workers. The GP informants commented on integration in support of the

general practice; the nurse informants commented on the communication amongst personnel. The community informants were concerned about the flow of patients/clients through the system to be able to access the most appropriate services when needed, given the issues of rurality.

Collocation was a trend towards 'one-stop-shops' with the GP practice pivotal, supporting services and sometimes arrangements with the HHS/DHB community services to expand the base for more nursing support and other outreach support services. These medical/health centres appear similar to the Multi Purpose Centres (MPC) established in Queensland (Bidwell, 2001a) in that they operated as aggregates of services, sharing location and some aspects of administration. The MPCs were established when the local hospital was lost or threatened, and have been successful in reconfiguring services around the hospital, including attracting GPs.

In New Zealand the community trusts, Maori provider organisations and IPAs seem to have provided an alternative infrastructure similar to the more fully integrated Multi Purpose Services (MPS) in Australia. The MPSs developed around a "shared vision", including aged care services and provision for the pooling of funds. The MPS model was reported as the "most viable option" when "the hospital's annual budget is less than $2 million" (Bidwell, 2001a, p.9). He Korowai Oranga assumes Maoritanga as core and therefore supports the wider regional design and delivery of services.

There was considerable comment from the nurses on the constraints posed by the contract/funding and employment situations. The nurses saw how they could be linking their service with other health services and services in other sectors, but they were contracted and employed for specific activities (practice nurses confined within the medical/health centre) and believed this was limiting and fragmenting the healthcare of clients/patients. In attending more to the design than delivery of health services nurses saw they could be contributing more to health if they had the mandate and resources. Health promotion and health education projects were being compromised.

9.3.2 Collaboration and Teamwork

In theory collaboration through teamwork has been widely associated with success (Bidwell, 2001b). In this study both GP and nurse informants asserted the importance of collaboration and teamwork for the success of health service delivery. And this is strongly supported in the New Zealand literature (Gribben & Coster, 1999; King, 2001; National Health Committee , 1999; Ross, 2001). But in the literature of the United States, UK and Australia there has commonly been reference to difficulties in collaboration, and the findings of this study point to a similar situation here.

In the light of the nurses' experience of the constraints of the contracting/employment context, the findings of this study suggest there is more to the relationship between doctors and nurses influencing teamwork than has been reported in the literature . Bidwell (2001b) cited UK experience in which "'the primary health care team' has been conceptualised as based around a GP practice" (p.2). Yet, efforts at 'team building' to support them have had very limited success: the promises of success, he observes, have not been borne out. How an equal partnership might be achieved in which "providers and practitioners can influence the organisation's decision-making, rather than one group being dominant" (King, 2001, p.5) remains vague. In this study one relevant issue related to the nurses' perception of GP control over the funding and governance of the

service, that they believed had impacted on how much they might respond to the needs of patients/clients to negotiate the health system beyond the local setting.

The findings from this study provide distinct sets of factors for two provider groups. They show what each might separately attend to when considering their capacity to respond to the health needs and priorities identified. Thus, when considered as distinct provider perspectives, they inform a more equitable dialogue. This might go some way to overcoming the current problems of collaboration and teamwork. However, it is the participation of all key stakeholders that will be necessary for shared governance as required for the operation of the new Primary Health Organisations. Collaboration and teamwork take their meaning in the context of local community participation.

10. COMMUNITY DIMENSION

10.1 View of Healthcare

In their comments on healthcare the community informants assumed a very broad view of health, including but more than the management of diseases. They referred to the diverse and changing nature of the population and the circumstances of living in their rural locality. They wanted the health of the community as a whole taken into account: the determinants of health and illness. They noted particular health patterns associated with living in their locality (e.g. car accidents through the summer months of increased tourists; drug and alcohol problems associated with a transient population). They were concerned with lifestyle and the challenge of achieving a healthy population when people do not necessarily take responsibility for health matters in their families, when many people are hard to reach and when the use of services is inconsistent.

The community informant responses in this study are consistent with the Government's key directions for primary health care (King, 2001), and the health movement internationally. In his international literature review, Bidwell (2001a) identified the shift in the meaning of health to be the foundation for considering the *success* of health service design and delivery, referring to the 1986 Ottawa Charter:

> "Health is to be thought about holistically, as residing in the overall well-being of a person and as affected by every aspect of his or her existence…Health care is thus mandated to move past a clinical, curative focus and actively improve the health of whole populations" (p.3).

It is acknowledged that inclusion of more informants from Maori rural communities, contributing from a Maori perspective of health, would have affirmed and expanded a holistic approach to healthcare, necessary for success.

10.2 Receiving Healthcare

There were many consistencies between the findings of this study and those reported by Rural Women NZ (2001) from their survey of rural households. There was anxiety about on-going access to medical care where services were being lost: GPs, specialists and hospitals. As discussed in the provider section above, the issue presents as more complex than numbers and shortage of doctors; people were concerned about the availability of healthcare in general, including care of the aged, care of the mentally ill and maternity care, concerned about being

ignored in their isolation from the mainstream health system. The perception of threat posed by the loss of services to the viability of whole communities was shown in the analysis of the Maniototo data (Appendix). The sense of isolation was associated with the low morale.

The Rural Women NZ report (2001) noted that despite "some measures (to address) the difficulties in attracting and retaining GPs in rural areas, the reality is that for many rural communities there has been no improvement in service" (p.11). The findings from this study suggest the emergence of more optimism in some places. Where new service configurations had arisen following the loss of existing services, people were disappointed at the loss but at the same time were pleased to have some innovations. Whatever the changes, people were concerned about qualities of service delivery: dependability, affordability and appropriateness.

In both studies distance was a major issue although more complex than just drive time. Distance and cost were interrelated. Difficulties were compounded by factors such as the availability of private and/or public transport, condition of the roading, climate, the range of services to be accessed, where they are sited in relation to each other, their opening times, relationships with professionals, home responsibilities, time off work, time spent in waiting rooms, the extent to which time and cost can be anticipated, characteristics of the resident population, and many more.

However, as also reported by Rural Women NZ, the responses gave the impression that rural people were resigned to the inevitability of travel for at least some services (e.g. hospital, specialist care, other than the acute accident and medical emergency response), to be able to access the full range of services. But the cost in time and money were problematic, and there were safety issues involved. The overall cost was inhibitive, aggravated by the complexities of moving between services. And when people did travel distances, sometimes taking time out of work and making complex arrangements to cover for their absence, they needed to be confident that they would get the necessary care without compounding delay and unexpected expense. It was support for the flow through the system that was important to them. In this, their needs have been recognised by the rural nurses although they (nurses) feel the current infrastructures restrict their capacity to respond.

The findings suggest that the informants were envisaging a regionally integrated model. The Multi Purpose Service organisations in Australia are illustration of such a model, with the range of services integrated around a "common vision" and "provision for pooling of all funds" although not necessarily involving the collocation of medical services (Bidwell, 2001a). Some Maori Provider Organisations are models with similarities. The nurses' efforts to reach out into communities and to create networks suggest their readiness and capacity to respond. The GPs reported efforts to establish shared rosters for on-call coverage regionally.

Further, the findings point to major infrastructure issues of information and communication technology and transport links in rural New Zealand, as well as the collaboration amongst personnel across services and sectors. As core features of rurality, increasing in importance with the demographic and healthcare changes occurring, these need to be addressed as special issues in the design and delivery of rural health services.

The views of consumers give weight to those of providers in relation to the infrastructure and integration of service delivery, but significantly turn attention to the fundamental concerns of personal and family cost in time, strain and money. And this raises questions about the implications, in the broad picture of New Zealand society, for what is currently discussed as

'social capital' (Robinson, 1999; Caldwell, 2001): the capacity for a rural community to survive or thrive - the capacity for a population to be healthy. The opinions of the community informants about their healthcare reflect these broad concerns.

10.3 Participation in Service Design and Delivery

While the Government's Primary Health Strategy places community participation as key in health service design and delivery locally, the impression from the responses of community informants was that participation currently is minimal. How people participated in this study provides some indication of the issues to be taken into account in the move towards Primary Health Organisations.

The community residents interviewed by telephone had been solicited because they would be knowledgeable and articulate as informants of the features of the locality, its residents and health services. But the process of completing the interview schedule was complicated and delayed by many factors (Dawson, 2001b). Some required repeated efforts to make contact and some did not respond to the invitation to participate at all. Several of those who did participate commented that people were only willing to give opinions on healthcare provision when personal experience aroused awareness of an issue or problem. They noted that some efforts to participate (e.g. responding to requests for a resident opinion, or preparing a submission to Government) had been thwarted leaving a sense of indignation and subsequent apathy; sometimes attempts to be involved had been ignored.

Bidwell's (2001a) review of the literature identified a key barrier to successful community participation was people's lack of information: if communities are to participate, they must be provided with the knowledge to make informed choices. The responses of the community informants in this study showed fragmentary, ad hoc knowledge of local demographics, health patterns and availability of services. Their identification of "health problems" in the area tended to focus on diseases commonly referred to in the media as national priority targets. Further exemplifying the limited knowledge of communities, the data from the Maniototo collated from the written responses of 10 residents showed considerable variability in knowledge of the range of services available, driving times between service centres in the region, days per year that the road is closed, etc.

As well as an informed community, strong leadership is seen as an important feature of successful community participation (Barnett & Barnett, 2002; Bidwell, 2001a). The fragmentary support of local health services apparent in the responses in this study suggests there has not been strong leadership except for specific projects such as building public amenities. In some comments there was reference to lack of commitment to the community, a sense of dependency and even some opposition to leadership. However Barnett & Barnett (2002) noted that where community leaders have emerged locally some positive changes have been achieved as seen in the formation of community trusts and purchasing the premises for a health centre or hospital.

Both Bidwell (2001a) and Barnett & Barnett (2002) observed that leadership has sometimes come through the efforts of local health professionals. In New Zealand, as the community informants affirmed in this study, this has achieved success in retaining health services in some places. Bidwell found in the international literature that leadership had commonly come from "outside facilitating agents committed to sustainable community development as in projects undertaken in the US and Australia" (p.47).

Bringing the discussion of success of rural health service design and delivery to the broader context of community development focuses attention on the processes of community participation. The findings of this study point to the difficulties in terms of the attitude, information and leadership required. In this light a distinction can be drawn between 'involvement' and 'participation' of communities. The challenge of PHOs to establish successful design and delivery of health services is the active participation locally in decision-making and priority setting. There is obviously need for a new conceptualisation of the process by which people can participate, beyond just involvement that can be token only, and that will be consistent with the major shift in orientation of the New Zealand health system.

SECTION 3

TOWARDS THE LOCAL DESIGN & EVALUATION OF HEALTH SERVICES

11. FACILITATING COMMUNITY PARTICIPATION

The project to examine the meaning of success for key stakeholders in the design and delivery of health services concluded with a framework of three sets of factors presenting the perceptions of each group: rural residents as consumers, GPs and nurses as providers. A subsequent stage of the project was to explore the use of these sets of factors to inform and facilitate the process of community participation in the design and evaluation of their services at a local level. To this end this section presents the relevance and potential use of the sets of factors.

Although the sets of factors for consumers and providers express quite different purposes for judging *success*, both were reflections of experience and knowledge of the status of health and services as they are now: consumers were concerned with healthcare needed and providers were concerned with the health services provided, reporting achievements and barriers. Therefore they are complementary, representing each group at a point in time. Further, the sets of factors are the generalised collation and analysis of data from localities spanning the country, and as such they comprise a national statement.

Considered in the context of the radical change under way as the new DHBs settle and work to establish the novel provider PHOs, the use of the sets of factors is limited by their being both fixed at a point in time and by obscuring the variability of localised sensibilities. The informants themselves attested to the uncertainty of sustaining the forms of service delivery that people are familiar with, and the confusion of the changes under way. Also, naturally, the use of the sets of factors needs to be considered in the light of the methodological limitations noted in the report and the limited representation of key stakeholders locally and nationally.

At this time the DHB implementation of the primary health care strategy is proceeding towards the establishment of Primary Health Care Organisations and national specifications are being defined. The Rural Expert Advisory Group (2002), examining its implementation in the rural context, reiterated the need "for realising opportunities and supporting locally devised solutions to issues in primary health care" (p.2). Community participation and innovation are viewed as key to achieving a locally responsive health service that reflects the principles of the national strategy.

As shown in the findings from the interviews with community informants in this study, and echoed in the international literature, partnerships between the key stakeholders are complex and difficult:

> "…relations between communities and health authorities have at times been traumatic and dysfunctional in New Zealand, Australia and Canada. To some, it has seemed that those in power pay lip service to the notion of community consultation, but continue regardless with a fixed agenda" (Bidwell, 2001, p.38).

It became clear in this study, supported by the literature, that an important part of the challenge to bring together the key stakeholders is to redress the lack of knowledge and the associated reluctance to be involved because of the "reality of power relations". To this end the distinct sets of success factors offer a starting point.

The sets of factors, despite their limitations, are a source of information for all potential participants. Therefore they have provided the foundation for construction of an instrument to facilitate dialogue amongst key stakeholders. They have been transmuted into a list of broad

standards that represent success of health service design and delivery, framed within the principles of the Primary Health Care Strategy, and suggested factors that might be attended to in constructing criteria for measurement. They are intended to have their roots in the community perspective of need for healthcare and the practitioners/providers capacity to respond, given their perspectives of success. Thus the framework is a coherent framework for use as a catalyst for consumer participation with practitioners/providers locally in the design and evaluation of their services.

12. AN INSTRUMENT AS CATALYST

12.1 Equity

- **Healthcare is responsive to the circumstances of all identifiable groups of the population with particular reference to "the special relationship between Maori and the Crown under the Treaty of Waitangi".**
  Taking into account:
  - Treaty of Waitangi principles (e.g. the statement forming the foundation for the report of the Rural Expert Advisory Group to the Ministry of Health, March 2002).
  - The demographics of the particular geographic area to identify the target groups within the population, where the inequalities lie.
  - The capacity of the health service personnel and infrastructure to respond to the diverse health needs of people: e.g. respect, understanding, approachability, acceptance, flexibility.

- **A participatory process provides for a partnership amongst key stakeholders in…**
  …designing the service, given the available resources
  …identifying the criteria for evaluation of success of healthcare provision in the area.
  Taking into account:
  - Framework for governance of health services in the area that facilitates representation in participation and achieves on-going dialogue between community residents, providers and funders – "without one group being dominant".
  - Trends in health and healthcare internationally: expectations of healthcare e.g. public health, primary health care, personal health, accident & emergency response.
  - Principles of healthcare from the Government Health Strategy.
  - DHB/PHO service specification, funding and accountabilities.

- **Healthcare is designed to improve "the health status of those currently disadvantaged".**
  Taking into account:
  - The nature of deprivation in the area (e.g. Dep96): who is 'deprived', what are considered 'deprived' circumstances.
  - The service components that address the needs of disadvantaged people of the area
  - How priorities of healthcare are identified.

12.2 Appropriateness

- **Healthcare is designed according to a coherent framework of "good health and wellbeing for all New Zealanders throughout their lives".**
  Taking into account:
  - Cultural perspectives of health with particular attention to Maori and Pacific Island perspectives.
  - Holistic approach to health to address e.g. healthy rural lifestyle, the implications of having disease and disability for everyday living in the rural area.
  - Determinants of health and disease nationally and locally.
  - The range of tasks and activities required to address health needs.

- **Healthcare is responsive to the range of need of persons as individuals:**
  …urgent treatment (life-threatening accidents and medical emergencies)
  …management of chronic illness and disability
  …protection of health and prevention of diseases.
  Taking into account:
  - Accident and emergency service: integrated pathway for quickest, most efficient flow of patients to the necessary expertise, facilities and technology.
  - Sources of specialist information and expertise.
  - Networks linking generalist practitioners, nurses, doctors & other health workers with specialist practitioners and support personnel.
  - Structure for collaboration and teamwork that "enable all providers and practitioners (to) influence the organisation's decision-making, rather than one group being dominant".
  - Structure/processes/facilities that protect
    …continuity of care
    …care by personnel who are familiar with rural life and living, and the particular locality.

- **Healthcare is provided knowledgeably and safely for best outcomes.**
  Taking into account:
  - Range of health workers in relation to tasks, their qualifications / education / training, preparatory education.
  - Structures for continuing education, professional codes of conduct, ethical practice and disciplinary processes.
  - Structures to facilitate peer, interdisciplinary review of professional practice, and complaints procedures.
  - Credentialling processes for advancing professional practice.
  - Service quality improvement programmes (within DHB/PHO guidelines).

- **Advances in technology efficiently support and enhance healthcare provided.**
  Taking into account:
  - Availability/sources of up-to-date information at the practice base.
  - Procedures for review and up-dating equipment and facilities.

- **Healthcare is responsive to the need for support of whanau/families/groups to manage the care of people with non-critical and chronic illness.**
  Taking into account:

- Knowledge, capabilities and responsibilities of health workers to attend to whanau/families/groups.
- Availability/sources of information on the range of health and welfare supports.
- Availability of mobile health workers linking with other health workers.

- **Health projects are responsive to the changing patterns of disease within the community as a whole: health promotion/protection from disease.**
  Taking into account:
  - Patterns of health problems for the area.
  - Determinants of health, disease and injuries in the area
  - National public health projects
  - Structure for developing and prioritising public health programmes.

12.3 Accessibility

- **Healthcare is reachable by everyone when needed.**
  Taking into account:
  - How people get to a service or how a service gets to people, and the support required: limitations of capability (aged, disabled, caregivers) and rural context e.g. transport, condition of roads, communication technology.
  - Degree of urgency of healthcare needed e.g. emergencies & accidents, management of chronic health conditions, advice on ailments, support for management of disability and illness, prevention of illness and exacerbation, health protection.
  - Capacity of health workers and service infrastructure to ensure people reach the right service e.g. flow of referral between mobile services to home/school/workplace, clinic/hospital base, outreach services, other sectors (housing, WINZ etc).
  - Time of services/personnel availability.
  - Availability of technology to maximise the reach (of patients and providers) to specialist advice, assessment and treatment.

- **Healthcare is affordable by everyone.**
  Taking into account:
  - Cumulative cost to the consumer of services including e.g. consultation, treatments, support therapies, referral for specialist care.
  - Cumulative cost to the provider and sustainability of the service.
  - Demographics of the area including extent of deprived circumstances and welfare support.

- **Healthcare is comprehensive and integrated.**
  Taking into account:
  - Availability/sources of information on the range of providers and expertise: location of health and welfare services in the region and their links (primary, secondary, tertiary health services; medical and nursing practice; podiatry, physiotherapy, occupational therapy, dentistry; traditional and complementary therapies; pharmacy, laboratory, x-ray; service delivery in other sectors).
  - Network structure for collaboration amongst service providers, including differentiated responsibilities of GPs and medical specialists, nurses and nursing specialists.
  - Technology and other support for flow of advice, referral and information.

12.4 A High Performing System

- **Infrastructure supports equity, appropriateness and accessibility of healthcare.**
  Taking into account:
  - Availability and standard of facilities, equipment, technological support .
  - Strategies to promote the cooperation of providers and sharing of resources.
  - Arrangements for administration and maintenance of premises that protect the time and place for professional practice
  - Workforce management, mix of skills and knowledge, retention and recruitment, locums
  - Structure for patient/client satisfaction measurement to inform quality improvement.

- **Service design and delivery are efficient, sustainable and flexible.**
  Taking into account:
  - Arrangements for service management, contracting processes
  - Strategies for cooperation amongst health workers for sharing of resources, peer support and linking activities: e.g. links, collocation.
  - Capacity to accommodate change.

- **Service design and delivery contribute to the life of the community.**
  Taking into account:
  - Needs for a thriving community life (community development/social capital)
  - Strategies to involve communities in governance of the service and in activities supporting the operation of the service e.g. voluntary car pool, ownership/maintenance of the premises, development of first aid capabilities.

13. POTENTIAL APPLICATION

An instrument such as this might contribute towards the implementation of Primary Health Organisations by addressing key points:

- "Primary Health Organisations will be expected to involve their communities in their governing processes.
- "All providers and practitioners must be involved in the organisation's decision-making, rather than one group being dominant." (King, 2001, p.viii)

The framework of standards of successful design and delivery of health services is a beginning conception of a quality improvement instrument that could be developed further with wider input and review of the terminology. Given the methodology of the project and the terminology of national policy in common use, the framework stands more as an academic than a lay statement, albeit substantiated as far as possible by the opinions and experience of community and practitioner informants from around the country.

In its current form, the instrument can be viewed as a reflection of the national agenda for the health system informed by perceptions of key stakeholders, bringing attention to the quality basis for establishing the Primary Health Organisations. The instrument and its suggested application are consistent with the characteristics identified by Gribben and Coster (1999) in their proposal of the most appropriate form of primary health care model, forerunner to the PHO. In general it is community-oriented in facilitating "the continuing relationship between the community and the provider organisation…" (p.123) and can act as a catalyst for "tailor(ing)

programs to meet the particular needs of a defined population" (p.123). It facilitates "collaboration between clinical medicine and public health" (p.124) and, informed by the opinion and experience of practitioners working in a diversity of models at this time of change, it allows for developments to build on what has already been achieved.

But its potential use goes beyond the strengthening of the general practice team that currently exists. It prompts a view to future possibilities inviting novel service design and configurations. Through recognising the complementarity of distinct practitioner contributions and the consumer perception, the framework has its use as a catalyst for the dialogue amongst all the key stakeholders that gives them voice as equal participants in the same forum.

As a coherent statement available to providers, practitioners and community residents alike the framework prompts clarification of terminology, questioning, discussion and critique in public forums. For consumers it provides an additional source of information of how at least some people around the country are currently thinking about and envisaging healthcare in relation to the perceptions of service delivery held by some practitioners and providers, drawing attention to particular factors of interest to the public health agenda. For providers it offers a focus for reflection and evaluation of their distinct capabilities and capacity to respond to local healthcare needs.

Importantly, the instrument as a catalyst for community participation in service design and quality assurance needs to be piloted in rural communities so the *process* can be studied and articulated at local level. How the community forums would be most appropriately facilitated is a major point in question to be explored within the uniqueness of New Zealand communities.

A further project, using the findings of this project as a resource with some communities, might aim to construct foundational guidelines or cues for the participation of all stakeholders in the local construction of success criteria for their rural health service configuration.

REFERENCES

Barnett, P. & Barnett J.R. (2001). *Community Ventures in Rural Health: The Establishment of Community Health Trusts in Southern New Zealand*. Australian Journal of Rural Health, 9: 229-234.

Bidwell, S. (2001a). *Successful Models of Rural Health Service Delivery & Community Involvement in Rural Health: An International Literature Review*. Christchurch: Centre for Rural Health.

Bidwell, S. (2001b). *Rural Health Care Teamwork: Selective Review of Literature.* Unpublished paper. Christchurch: Centre for Rural Health.

Caldwell, F. (2001, April). *Health Impact of Belonging to Social Groups.* Health Research Council News, p.4.

Carryer, J., Dignam, D., Horsburgh, M., Hughes, F. & Martin J. (2000). *Locating Nursing in Primary Health Care*. In: National Health Committee (Ed). Discussion papers on primary health care. Wellington: National Health Committee.

Dawson, S. (2000a). *General Practitioners' Perceptions of the Success of Models of General Practice in Rural Communities in New Zealand*. A report on the results of the rural community questionnaire. Christchurch: Centre for Rural Health

Dawson, S. (2000b). *Rural Nurses' Perceptions of the Success of Models of Service Delivery in Rural Communities in New Zealand*. A report on the results of a questionnaire for rural nurses. Christchurch: Centre for Rural Health

Dawson, S. (2001a). *Community Involvement in Health Services in Rural Communities.* Christchurch: Centre for Rural Health.

Dawson, S. (2001b). *Checklists for Successful Rural Health Services.* Unpublished paper. Christchurch: Centre for Rural Health.

Gribben, B. & Coster, G. (1999). *A Future for Primary Health Care in New Zealand*. Australian Health Review, 22(4),118-131.

King, A. (2000). *The New Zealand Health Strategy*. Wellington: Ministry of Health.

King, A. (2001). *The Primary Health Care Strategy*. Wellington: Ministry of Health.

Litchfield, M. (2001). *A Framework of Complementary Models for Rural Nursing*. Christchurch: Centre for Rural Health

Litchfield, M. & Ross, J. (2000). *The Role of Rural Nurses: National Survey.* Christchurch: Centre for Rural Health

National Health Committee (Ed.), (1999). *Discussion Papers on Primary Health Care*. Wellington: National Health Committee.

Robinson. D. (Ed.), (1999). *Social Capital in Action*. Wellington: Institute of Policy Studies, Victoria University of Wellington.

Ross, J. (2001). *Dimensions of Team Effectiveness in Rural Health Services*. Christchurch: Centre for Rural Health

Rural Expert Advisory Group to the Ministry of Health (2002). *Implementing the Primary Health Care Strategy in Rural New Zealand*. Wellington: Ministry of Health.

Rural Women New Zealand (2001). *Rural Health Survey*. Wellington: Rural Women New Zealand.

APPENDIX

THE MANIOTOTO:
Profile of One Locality
A summary report of the findings from a written questionnaire survey

1. DESCRIPTION OF THE LOCALITY

1.1 Demographics

- Resident population of the locality is 1800
- Ranfurly is the biggest centre with 830 residents
- Most see there is a seasonal change in population to "some degree". Some people see a significant variation
- Sources of income:
  - ~ Agriculture
  - ~ Retailing
  - ~ Transport
  - ~ Education sector
  - ~ Health sector

1.2 Facilities/Commodities for Rural Settlement

- "The town has all the expected facilities/commodities".
- There is variation in difficulties with basic facilities: water, sewage, animal borne contamination, use of chemical sprays. Some experience none and others "serious".
- There are 3 primary schools, 1 secondary school, childcare a few days a week (for a charge) and a library.
- There is a range of sports facilities and opportunities; occasional communal activities. Some money is spent on beautification in the wider localities.

1.3 Moving and Communicating Within and Beyond the Locality

- "The physical nature of the locality (rivers, high country, weather and roads) makes access a little difficult for most people but some find it "extremely difficult". Road access is lost for a few days a year.
- The town is an average of 1.5 hours drive from the nearest city centre.
- "There is no air access
- A few people don't have a telephone; a few don't have a TV.
- Cell phone coverage is "satisfactory".
- There is a locally based newspaper/newsletter and radio station.
- There is no transport to health services within the locality; a daily bus is the only transport to health services outside the locality.
- Only a few people commute to work outside the locality.

1.4 Maori Iwi Affiliations

Few responses. Only one iwi was noted: Ngai Tahu.

2. DESCRIPTION OF HEALTH AND HEALTH SERVICES

2.1 Health Problems

One note of health problems: alcohol & drug abuse.

2.2 Health and Support Services and Their Funding

- Volunteers provide ambulance and fire services: payment is required for ambulances.
- Domiciliary support services and care for the elderly are free of charge.
- There are no support services (such as drug and alcohol services).
- "There is a hospital but no birthing facility.
- "There is almost the full range of nurses permanently in positions."

2.3 Health Service Model, Personnel and Support Services

- "Community-owned health company with RHA funding.
- Hospital and medical centre, and base for the services to the community in general – an information base.
- Outpatients service 24/7; maternity block; medical beds, long stay and respite care
- Retirement home; pensioner flats
- GP working from a hospital (medical centre in the hospital building that belongs to the trust) - on call
- Nurse practitioners on call
- RNS + nurse aids in hospital
- District + community nurses
- Westpac helicopter
- St John Ambulance service volunteers – who often become short in supply
- Radiology 1/7; physios – 2 part-time; massage therapist 1/7; occupational therapist 2/7
- Weekly clinics: orthopaedic surgeon; surgeon.
- Specialists in Dunedin Hospital
- Home help
- Presbyterian support
- although coverage by most health professionals a lot of these are part-time"

3. OPINIONS OF *SUCCESS*

3.1 Analysis

Analysis of responses to the question:
"Have you found this model particularly successful, or unsuccessful?"
Of the 35 respondents:

- 7 gave a single response; all were positive.
- were unqualified: "yes"; "successful".

- 4 were qualified with a superlative: "very", "most", "particularly".
- 10 gave a more elaborate response about *successful/unsuccessful*. Some were guarded but none noted the service as *unsuccessful.*
- 8 were actively working in services in the area: e.g. teacher, midwife, development coordinator; 2 were "retired" and the line of work not specified; a few non-respondents were working in service jobs in the area.
- Most were long-time residents: 2 less than 10 years (1yr and 4 yrs)
- All responses were positive, but 3 were guarded: "mostly"; "most of the time"; "adequate for normal day to day needs". 2 of the 3 were the more recent residents.
- Responses can be categorised according to the traditionally defined factors: 'availability, accessibility, affordability (government), sustainability; three further factors are: investment in the service from community and professionals, providing a sense of security, and giving an identity/security to community life.
- Those who were guarded were referring to doubts about whether the services were sustainable in the light of government funding and availability of qualified staff.
- All respondents focused on the services that already exist: those they know. All but one referred to the services as if self-contained locally; one referred to the services in relation to the wider service provision in the area. This respondent noted the difficulties for accessing specialist healthcare in the city.

3.2 Discussion

These data give a limited snapshot of a community's view of what success in a health system means:

Most residents didn't know (given the indicators of "success" assumed in the rest of the questionnaire), didn't judge it important, or didn't feel qualified to write an opinion on what "successful" or "unsuccessful" means. Those already working in the services and trade of the locality were more likely to have their say and to be positive. These residents held a vested interest in their community having an identity and being a viable economic collective.

In this way they could be seen to be leaders of the community, investing in their community through their involvement in decision-making about whatever will support its viability. They have a status in the community that assumes an ability to articulate what is required. However, this leaves many voices of residents unheard, particularly those who are more vulnerable to health problems.

People were more likely to see the services that exist as successful when they had lived longer in the area and were less likely to know what other possibilities were in operation elsewhere. The view of healthcare was more likely to be considered as a local issue rather than a more extensive regional or national public service.