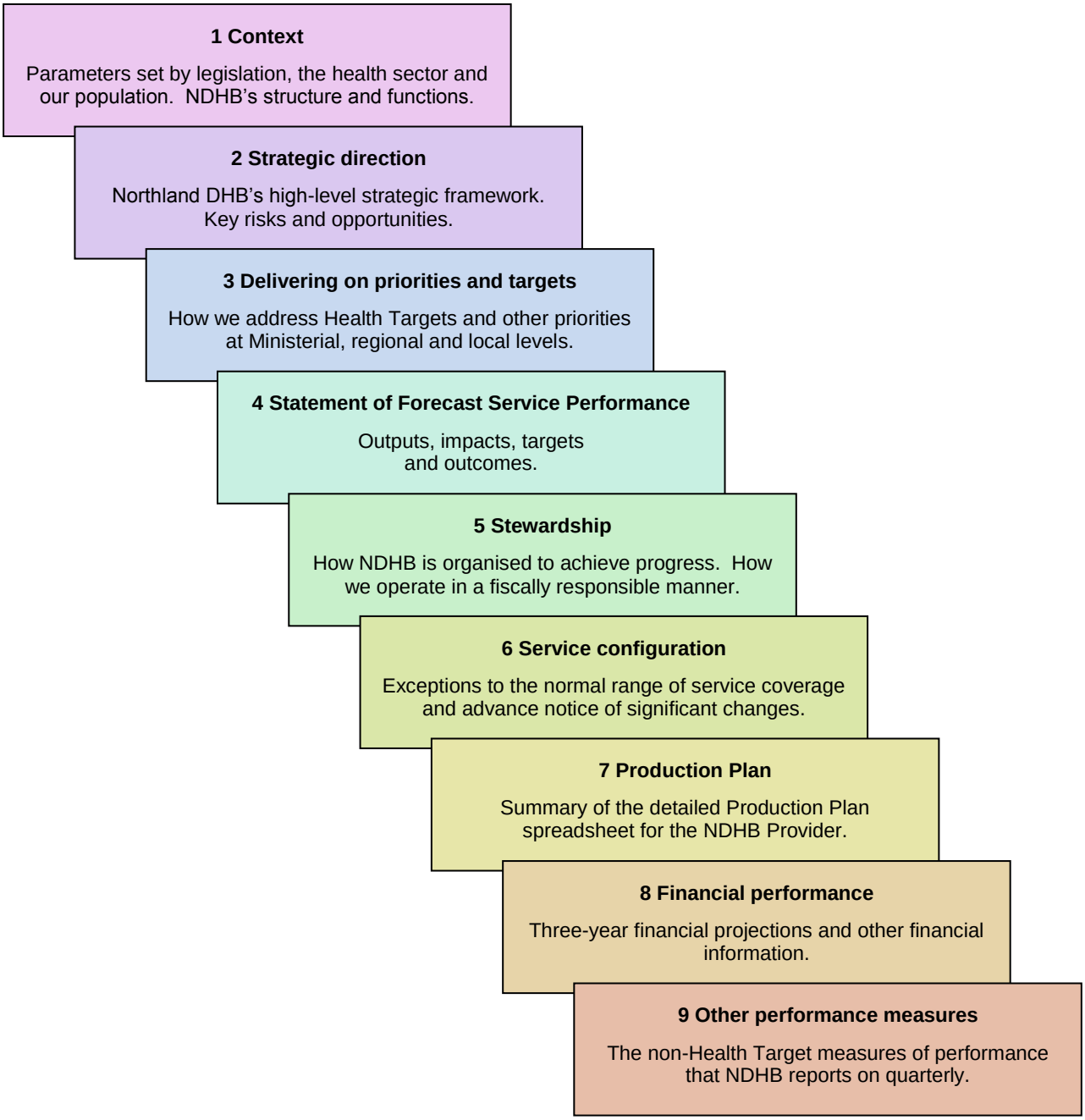
NORTHLAND DISTRICT HEALTH BOARD
Te Poari Hauora A Rohe O Te Tai Tokerau

ANNUAL PLAN 2011/12

incorporating

STATEMENT OF INTENT 2011/12 - 2013/14



The Annual Plan, the Statement of Intent and the Regional Health Plan

Statement of Intent as a subset of the Annual Plan

Northland DHB's Statement of Intent is a subset of the Annual Plan. It can be assembled by combining sections 1, 2, 4, 5 and 8. The plan is also available as a separate document.

Linkages to the Northern Regional Health Plan

The approaches taken by Northland DHB and by the Regional Health Plan have been planned as much as possible to be consistent. Where Annual Plan material links to the RHP, the relevant number(s) in the RHP's overarching intervention framework (Appendix 2) are shown in the format of:

RHP 1.1, 1.11

Office of Hon Tony Ryall

Minister of Health
Minister of State Services

11 JUL 2011

Mr Tony Norman
Chair
Northland District Health Board
Private Bag 9742
WHANGAREI 0148

Dear Mr Norman Tony and team

Northland District Health Board 2011/12 Annual Plan

This letter is to advise you I have approved and signed Northland District Health Board's (DHB) 2011/12 Annual Plan for three years.

This year has seen significant change to the accountability framework for all DHBs with the introduction of annual Regional Service Plans to replace District Strategic Plans and one Annual Plan that incorporates the Statement of Intent. These changes are designed to help improve the way we plan service delivery by setting a long term direction and clear pathways to get there, through an integrated approach linking the different levels of health care.

I want to thank you for your cooperation as we transition to this new way of thinking and look forward to your continued support as we strive for improved health services for all New Zealanders.

Clinical and financial sustainability

All DHBs are expected to budget and operate within allocated funding and identify specific actions to improve financial performance in order to live within their means. This includes seeking efficiency gains and improvements in purchasing, productivity and quality aspects of your DHB's operation and service delivery.

I am pleased to see your DHB is planning to breakeven for the three planning years and that your plan notes a focus on identifying actions to ensure you continue to live within your means.

Primary Care

Delivering better, sooner and more convenient services closer to home has been a priority for the Government and DHBs for a number of years. Closer integration of services across primary and secondary care and a greater range of services being delivered in the community should not only reduce pressure on hospitals but also improve the patient experience. It is important that you collaborate with your regional DHB colleagues to develop this integration effectively.

Private Bag 18041, Parliament Buildings, Wellington 6160, New Zealand. Telephone 64 4 817 6804 Facsimile 64 4 817 6504

I am pleased to see an enhanced commitment to achieving this priority area in your Annual Plan including more tangible actions and deliverables to show how you will achieve real progress towards providing a better range of services in the community. I expect you to be active in advancing these improvements to the way primary care services are delivered in the community.

Regional Collaboration

Greater regional collaboration is a key aspect of the new accountability arrangements and supports more effective use of clinical and financial resources. Better collaboration amongst DHBs is essential to address priority vulnerable services and has the potential to maximise efficiencies through shared back office functions, as well as IT, workforce support and development and capital investment. As core elements of the National Health Board's work, I look forward to seeing the benefits of collaborative partnership with your fellow DHBs as these important regional initiatives are implemented.

Your Annual Plan incorporates a strong regional flavour. It is evident that your DHB is working to realise the benefits of regional and sub-regional collaboration, and that this influences your local service planning.

I expect to see delivery on your agreed Regional Service Plan actions as detailed in your Annual Plan and look forward to seeing greater ongoing support for the work of Health Benefits Limited in developing shared back office functions where appropriate. I also thank you for your continued commitment to work with the Health Quality and Safety Commission.

Health of Older People

The prioritisation of investment in services to ensure the health and support needs of older people are met is important. An ongoing programme will be required to manage the impact of our ageing population on health services and support the provision of high quality and sustainable services in this area.

I am pleased to see more detail in your Annual Plan on how you are planning to deliver health services for older people. I am especially interested to follow your progress in relation to addressing the respite care needs of your community and the effective use of recent additional funding for this service.

How you will provide new and expanded services for people with dementia is of importance to me as is your DHB's continued application of the comprehensive clinical assessment tool (interRAI) currently being rolled out nationally. Better articulation of how improvements are being sought in this priority area will be expected from all DHBs in next year's Annual Plan.

Clinical Leadership

Clinical leadership is fundamental to improving patient care and has an important role in supporting overall service delivery in a number of ways. Engagement with clinical leaders aids job satisfaction for health care professionals and improves delivery of workforce initiatives. The success of clinical networks is based on clinical input working across regions and nationally to assist with overall service delivery. Clinical leadership also plays an important part in the integration of service delivery closer to home.

I expect to see clinical leadership embedded as a way of working within your DHB and the ways in which you seek engagement with your clinicians continue to expand over coming years.

Health Targets

New Zealanders have high expectations that they will have access to quality health care services when they need them. The Government's Health Targets are selected to drive ongoing improvements in specific priority areas in order to meet the growing expectations of the public.

I appreciate Northland DHB's efforts to deliver on the Health Targets and your progress in delivering on these. It is good to see that you have identified more specific actions within your Annual Plan that you will take to ensure you achieve your planned performance on the six Health Targets. I expect to see these actions translate into improved performance in 2011/12, particularly for Shorter Stays in Emergency Departments and

Mental Health Ringfence

I am approving your plan with the expectation that your DHB will work closely with the National Health Board to agree and ensure appropriate use of any currently unallocated mental health ringfence funding in line with policy.

Annual Plan Approval

My approval of your Annual Plan does not constitute acceptance of proposals for service changes that have not undergone review and agreement by the National Health Board. All service change or service reconfigurations must comply with the requirements of the Operational Policy Framework and you will need to advise the National Health Board of any proposals that may require my approval.

Additionally, my acceptance of your Annual Plan does not indicate support for any capital projects requiring equity or new lending, or self-funded projects that require the support of the Capital Investment Committee. Approval of such projects is dependant on both completion of a sound business case, and evidence of good asset management and health service planning by your DHB. Approval for equity or new lending is also managed through the annual capital allocation round.

I acknowledge that the impacts for DHBs of the earthquakes in Christchurch over the last year are difficult to determine and that these have not been taken into account in producing Annual Plans. The impacts of these events are ongoing for the health sector and will need to be managed beyond what is included in your Annual Plan.

I would like to thank you, your Board and management for your valuable contribution and continued commitment to delivering quality health care to your population and wish you every success with the implementation of your 2011/12 Annual Plan.

Finally, please ensure that a copy of this letter is attached to the copy of your signed Annual Plan held by the Board and to all copies of the Annual Plan made available to the public.

Yours sincerely

Hon Tony Ryall
Minister of Health

Contents

Signatories

Agreement dated this ..... day of 2011

between

Her Majesty the Queen
In right of her Government of New Zealand
Acting by and through the Minister of Health

Tony Ryall
Minister of Health

and

Anthony Norman
Board Chairman

Karen Roach
Chief Executive

Executive summary

Northland District Health Board will continue to improve the delivery of services during 2010/11 while maintaining a balanced budget. The Board has maintained a balanced financial position since 2003 and will continue to operate within a viable and financially sustainable cost structure. Shared services savings are expected to be $2m in 2011/12.

We will further improve efficiency and work within the district and regionally to target needy populations, improve timeliness, reduce waiting times and raise health status. Already this year we have shown significant improvement in our Health Target performance, and we are committed to making further gains. A high level of performance across the Health Targets, particularly for Maori, will be a strong indicator of improved access to services.

Improving Maori health and reducing inequalities continue to be driving forces. The *Maori Health Plan 2011/12*, a companion document to the Annual Plan, sets down key performance measures for health services, and Maori health and reducing inequalities are addressed throughout the Annual Plan. NDHB is also strengthening internal and external monitoring systems so that all indicators, including Health Targets, are reported by ethnicity.

A new Acute Care Reform Programme aims to provide acutely ill patients access to the highest quality of acute care by the right person, in the right setting, first time. The improvements identified by its six work streams will contribute towards reducing ED waiting times and freeing up resources.

The Annual Plan contains numerous initiatives focussed on older people, including reducing admissions to secondary care, more services for those with dementia, improved respite care, as well as primary care programmes to link older people and their carers with appropriate services so they can continue to live in the community. NDHB expects home based support and residential care services to be the best possible, and is committed to the new InterRai monitoring and audit approach.

This year Northland has established the Alliance Leadership Team (ALT) which comprises senior representation from the DHB, PHOs and NGOs to provide leadership to make more appropriate services available closer to home. Changes will occur in the nature and type of services delivered in the community and the way primary and secondary services interact. NDHB is also establishing an overarching clinical governance group with clear terms of reference and alignment to ALT.

Information systems and services are key to supporting good health planning within the district and the region. Northland's high information system priorities – patient administration, clinical workstation, clinical data repository, laboratory, pharmacy and ED information systems – are acknowledged within regional planning, and capital plans have provision for the necessary investments to address these.

NDHB staff have been prominent in regional planning processes at all levels and in all workstreams (information services, diabetes, cardiovascular disease, cancer, older people, patient safety, laboratory services, radiology, and the regional training hub). NDHB staff have established solid working relationships with staff in the Auckland DHBs and we are committed to continuing to work with them to implement the Northern Region Health Plan.

1 Context

1.1 Legislative context

Northland DHB is one of 20 DHBs established in 2001 in accordance with section 19 of the Public Health and Disability Act 2000. Section 22 of the Act requires Northland DHB, among other things, to:(a) improve, promote, and protect the health of people and communities

(b) promote the integration of health services, especially primary and secondary health services

(c) promote effective care or support for those in need of personal health services or disability support services

(d) promote the inclusion and participation in society and independence of people with disabilities

(e) reduce health disparities by improving health outcomes for Maori and other population groups

(i) uphold the ethical and quality standards commonly expected of providers of services and of public sector organisations.

The Public Health and Disability Act was amended in 2010. The changes establish a more structured approach to deciding on the services to be planned, funded and provided at national, regional and local levels, and to put a stronger emphasis on DHB collaboration to plan and provide health services regionally. The changes in the Act and its regulations are designed to support better planning across the sector. The Act now no longer requires DHBs to prepare District Strategic Plans, on the basis that the strategic framework for each DHB's planning will emanate from its regional plan.

The DHB is categorised as a Crown Agent under section 7 of the Crown Entities Act 2004. Section 49 of this act states that boards of governance must ensure that DHBs act in a manner consistent with their legislative objectives and functions, and their SOI.

The Statement of Intent (SOI) has been prepared by the Northland District Health Board to meet the requirements of section 139(1) of the Crown Entities Act 2004 and sections 42 and 39(8) of the Public Health and Disability Act 2000.

1.2 Health sector context

As well as complying with the two acts mentioned above, DHBs must also meet other overarching requirements.

DHBs have a statutory responsibility under the Treaty of Waitangi to put into practice its principles of partnership, protection and participation. NDHB is acutely conscious that Maori, who comprise about a third of our population, suffer most from health and other inequalities.

DHBs are required to adhere to the Ministry of Health's *Operational Policy Framework*, "a set of business rules as well as policy and guideline principles that outline the operating functions of DHBs", and the *Service Coverage Schedule*, a policy document that describes the types of services that DHBs must ensure are provided.

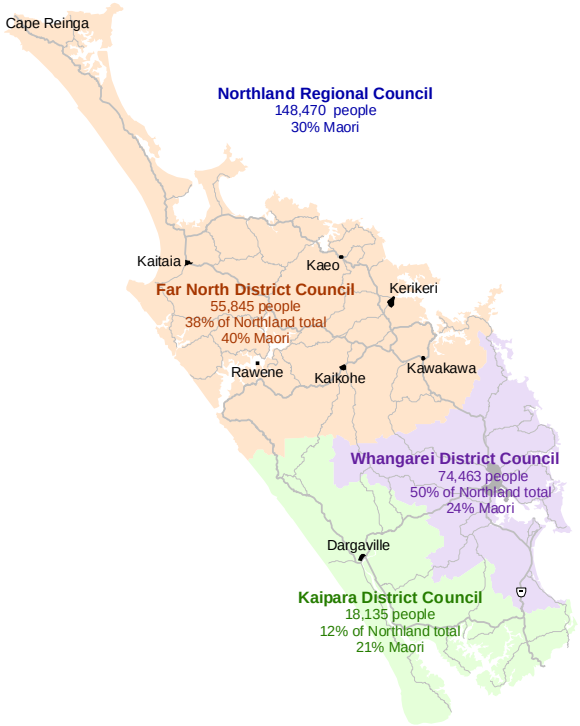
The *MoH's Statement of Intent* is useful in identifying what the health sector is expected to achieve within the context of whole-government expectations.

The National Health Board's *Long Term Health Sector Plan* (LTHSP) will provide high-level direction over the next 20 years to guide future decisions about service configuration and investment at all levels of the system. It will outline the future direction for publicly funded health services, offer options for new models of care and service configurations, and describe the challenges the sector faces. After the LTHSP is finalised, the NHB will use it to inform their review of national, regional and district plans, and it will support DHBs in their long term local and regional planning.

1.3 Population profile

Population summary

Graphic 1 Northland and its population, 2006 Census



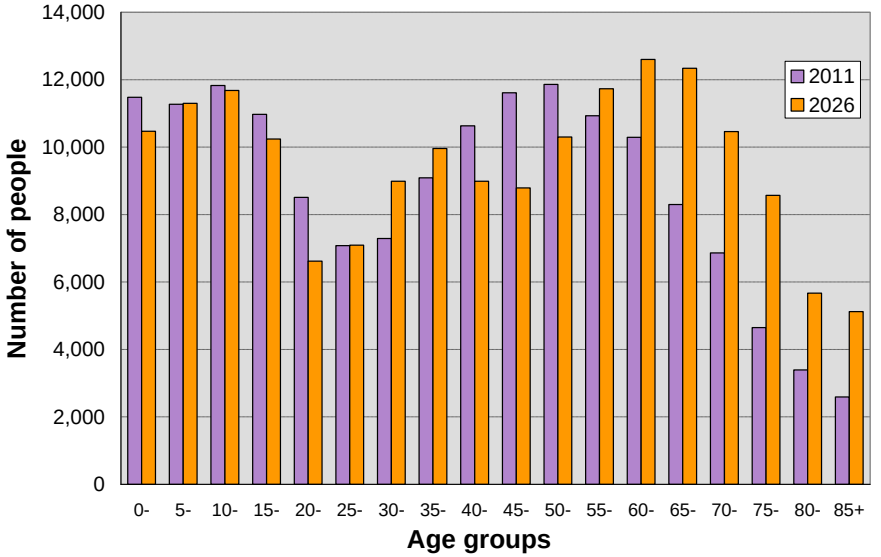
Northland's projected population for 2010 is 157,420, 3.6% of New Zealand's population.

Just over half live in Whangarei District Council, 37% in the Far North District Council and 12% in Kaipara District Council.

Nga Iwi o Te Tai Tokerau comprise 30% of Northland's population. Out of the total Maori population, about half live in the Far North District, 40% in Whangarei, and 10% in Kaipara. Iwi in Northland include Ngati Kuri, Te Aupouri, Ngaitatoko, Te Rarawa, Ngati Kahu, Whaingaroa, Ngapuhi, Ngati Wai and Ngati Whatua.

Ageing population

Graphic 2 Projected Northland population growth by age



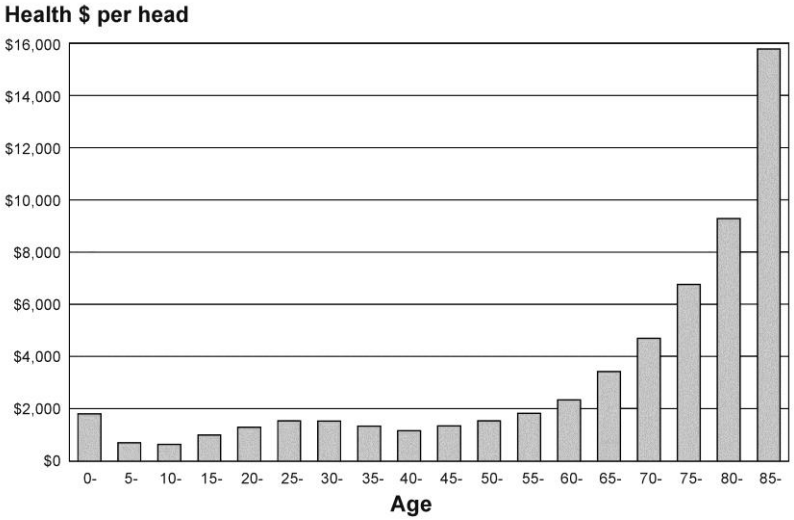
Northland's population is 'ageing' because the older population is increasing significantly while the number of children and youth is decreasing. From 2011 to 2026, children (0-14 years) are projected to drop from 21.8% of the population to 19.6%, while older people (65+ years) are projected to grow from 16.3% to 24.7% (Graphic 2). Nationally over the same period, the over 65s will increase from 13.3% to 19.3%, indicating that Northland's proportion of older people is not only higher than the national average, but is projected to grow at a faster rate.

Service use increases with age

Increasing age is a strong indicator of the need for health services (Graphic 3). As people age they tend to have greater health needs and comorbidities (multiple health conditions) and therefore consume more health resources.

This is influenced by growing trends in a number of long term conditions that become more common with age such as cardiovascular disease (heart disease and stroke), cancers, respiratory disease and dementia.

Graphic 3 Health expenditure by age in New Zealand

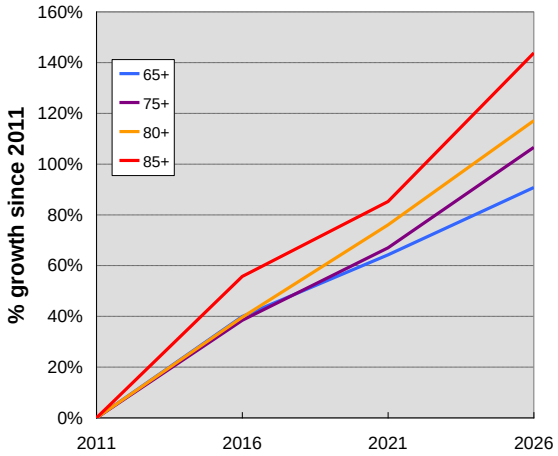


Adapted from: MoH, 2004. Population Ageing and Health Expenditure: NZ 2002-2051. Wellington: MoH.

Implications

Graphic 4 indicates that the older the age group, the faster the growth. Between 2011 and 2026, ages 65-79 will increase by 83%, while ages 85+ will increase by 144%. Put alongside Northland's already older population and the rapid leap in resource usage by the 'older old' described in Graphic 3, it represents a challenging prospect.

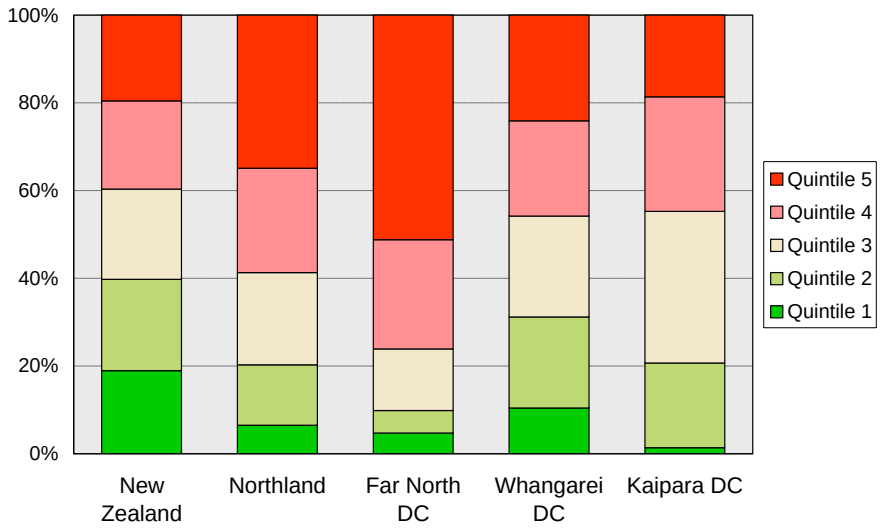
Graphic 4 Percentage growth in older populations 2011-2026



Deprivation

Northland has one of the most deprived populations in the country (Graphic 5). While 20% of NZ's population is in the lowest quintile of the deprivation index, the equivalent measure for Northland is 35%. The most deprived local authority area is the Far North District Council with 51% in the lowest quintile; within FNDC the most deprived areas are Hokianga 83%, Whangaroa 41% and north of the Mangamukas 55%.

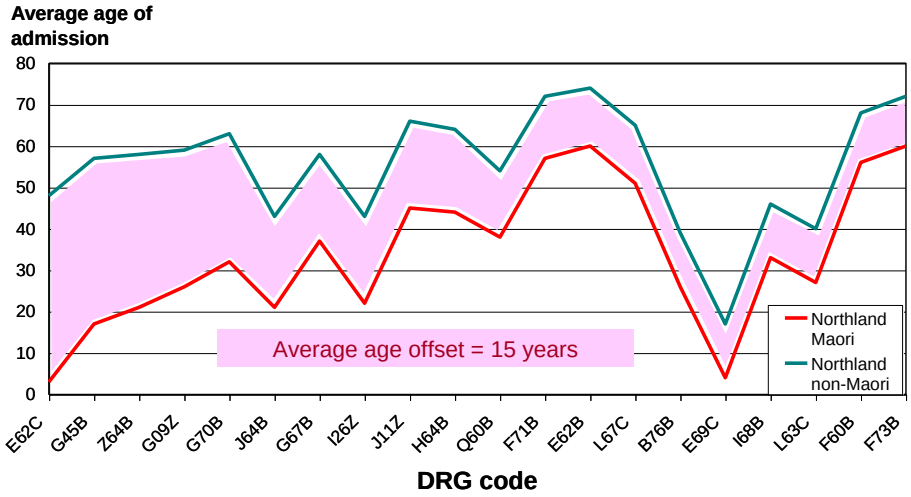
Graphic 5 Deprivation by area, NZ, Northland and its District Councils



Age offset for Maori

Graphic 6 depicts the twenty Diagnostic Related Groups[1] (DRGs) with the highest number of admissions to Northland hospitals. On average, Maori are admitted 15 years younger. This is strongly related to higher rates of deprivation and early onset of long term conditions such as heart disease, diabetes and cancers.

Graphic 6 Age offset of admission to NDHB hospitals, top 20 DRGs



(Deloitte research commissioned by NDHB, 2006)

Rurality

Northland's only true urban area is Whangarei, which contains about one-third of our population. The remainder live in towns (the largest of which are Kaitaia, Kerikeri, Kaikohe and Dargaville at about five thousand each) and rural areas across the district. Many of these are isolated; it takes over five hours to travel from Northland's northern to southern extremities and up to two hours west to east. Northland has the highest proportion of unsealed roads in New Zealand and public transport is very limited.

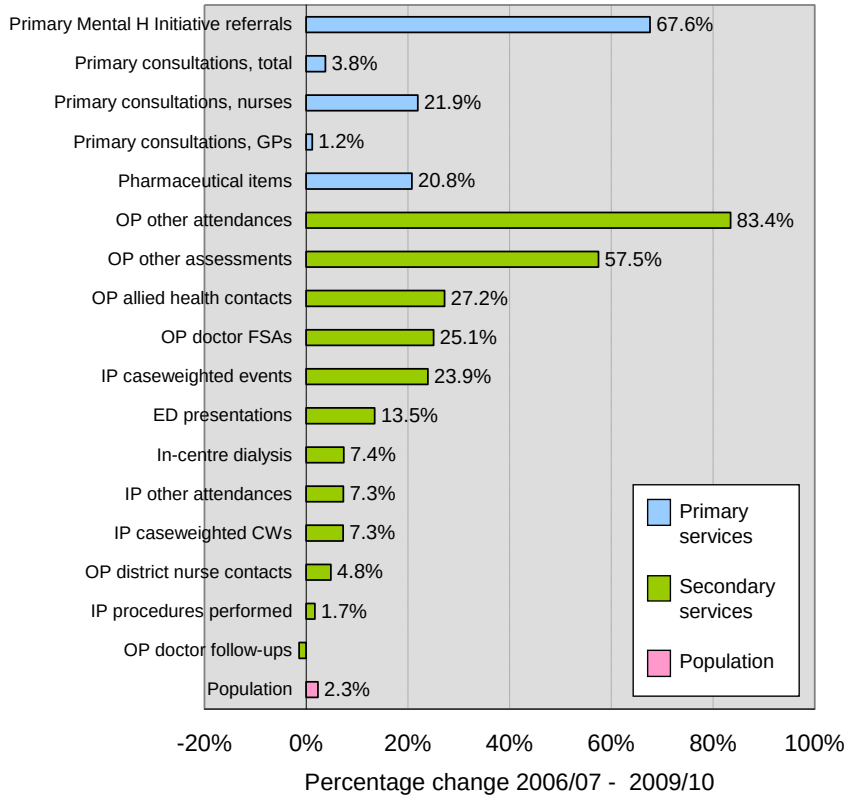
[1] Groups of conditions with broadly similar causes and level of need for services.

1.4 Health profile

Growth in demand for services

Graphic 7 shows, across a comprehensive range of services, the rate of growth in volumes between 2006/07 and 2009/10. Volumes of nearly all types of service have increased more quickly than the Northland population. Only two types of service have grown more slowly than the population, both the result of deliberate strategies: outpatient doctor follow-ups, where there has been a plan to reduce follow-ups and increase first specialist assessments; inpatient procedures, more of which are now being done in the outpatient setting or they are staying less than three hours and hence are not counted as inpatient admissions.

Graphic 7 Growth in key health services in Northland 2006/07 - 2009/10[2]



[2] IP: inpatient; OP: outpatient; FSA: first specialist assessment; CW: cost-weights.

The Northland population's health needs

Key priority	Explanation
Long term conditions	The 'big 3' are diabetes, cardiovascular and cancer.
RHP 1.1, 1.11, 1,17, 1.19	36% of Northlanders die from **cardiovascular disease** (heart disease and stroke). 22% of adult Northlanders have been told they have high blood pressure and 14% that they have high cholesterol, both known risk factors for cardiovascular disease. While **diabetes** is not a major killer in itself, it is a primary cause of heart disease and a great deal of unnecessary illness and hospitalisations are related to poor management of the condition.
RHP 1.3, 1.31, 1.35, 2.33, 3.2, 3.21	39% of Northlanders die from **cancers**. The four most common sites are, in order trachea-bronchus-lung, colorectal, prostate and breast.
Older people RHP 1.2, 1.21, 1.27, 2.21, 2.22	Our aging population is placing significant demands on health services provided specifically for older people (residential care, home based support services, day care). It also affects the prevalence of long term conditions which become more common with age.
Maori RHP Strategic Challenge; component of 'Life & Years' goal	Maori experience low levels of health status across a whole range of health and socioeconomic statistics. They comprise 30% of Northland's population, but 52% of the child and youth population, a key group for achieving long-term gains. Maori experience early onset of long term conditions, presenting to hospital services on average about 15 years younger than

Key priority	Explanation
	non-Maori (see Graphic 6).
Child and youth RHP 1.4, 1.41	The child and youth population in Northland is projected to decline over the coming years, but it remains a priority because healthy children make for healthy adults. Children in Northland are also more needy than adults; areas whose deprivation rating is in the lower half of the scale contain 70% of Northland's adults but 85% of our children.
Oral health	Northland's 5-year olds have often had the country's highest average score of damaged (decayed, missing or filled) teeth and one of the lowest percentages of teeth without tooth decay (33% compared with the national 41%). Data for adolescent oral health is scanty, but it suggests a similar, if not worse, picture. RHP: Not a priority regionally.
Lifestyle behaviours	The way people live their lives and the behaviours they exhibit have an enormous influence on health status. There are a wide range of influences, but key ones are smoking, diet, alcohol and other drugs, and physical activity. RHP: Not addressed as such, but lifestyle behaviours are a prime cause of the plan's major disease priorities.
Social influences	Many of the causes of ill health rest with social and economic factors such as housing, education and economic prosperity. The health sector cannot affect these directly, but DHBs can work on them collaboratively with other government and local body organisations. RHP: Relationships with agencies outside the health sector (Auckland Council, Housing, Work and Income, Justice and Social Development) are mentioned as an area in which improved partnerships should be developed.

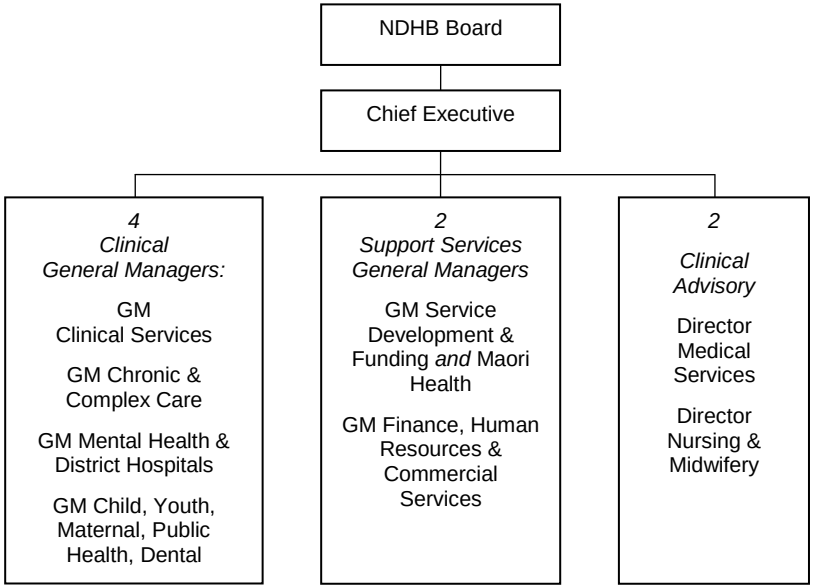
1.5 Operating environment

This section contains a high-level description of the structure and funding of Northland DHB and the key factors affecting the organisation's performance.

Structure of Northland DHB

Governance for NDHB is provided by a Board of eleven, seven of whom are elected and four appointed by the Minister of Health. Their role is to provide strategic oversight for the DHB, taking into account the Government's vision for the health sector and its current priorities.

Graphic 8 High-level organisational structure of Northland DHB



The Chief Executive reports to the Board and is responsible for the organisation's performance.

Reporting to the Chief Executive are six General Managers and two senior clinical advisory positions. The GMs are structured according to the DHB's two core functions of providing services and funding services (described in

more detail in 1.6 Nature and scope of functions). The provision of services by NDHB is the responsibility of the clinical GMs, while funding and planning falls under the GM Service Development and Maori Health. The other GM ensures financial and other support services for both provider and funder functions.

Factors affecting NDHB's performance

Northland DHB's performance is affected by a number of factors (explained more fully in 2.5 Key risks and opportunities), some of which are shared by all DHBs while others arise from Northland's distinctive characteristics:

Factors which affect all DHBs

- funding levels
- managing within budget
- demand-driven contracts
- Inter-District Flows (IDFs)
- regionalisation
- information systems and data
- new models of care
- employment costs and issues.

Factors more applicable to Northland DHB

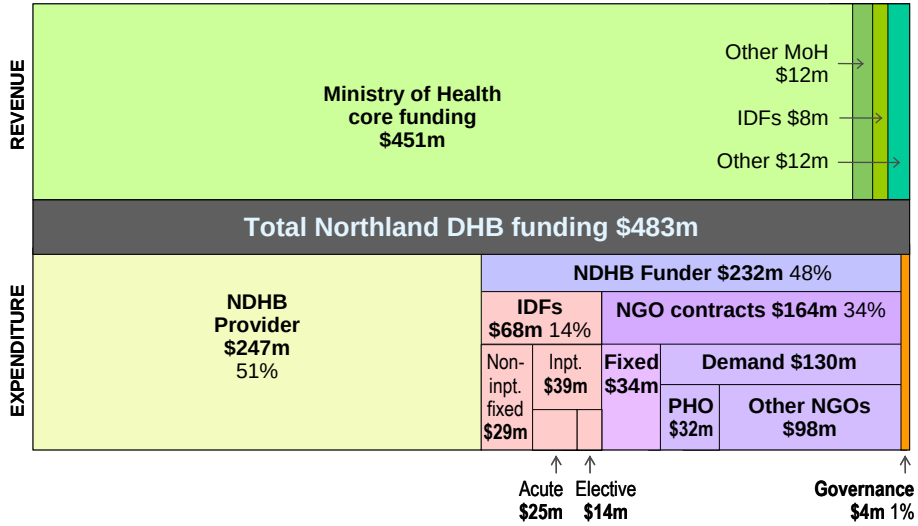
- high-needs population
- new prioritisation tool.

1.6 Nature and scope of functions

Northland DHB has been charged by the government with responsibility for the health of all Northlanders (1.1 Legislative context). To fulfil this, Northland DHB has two overarching functions, the provision of services (section 1.6.1) and the funding and planning of services (section 1.6.2).

Graphic 9 explains this split by expenditure groups. In 2010/11 Northland DHB received $483M from Vote:Health, the total funding for health services for Northlanders paid from the public purse. Just over half of this goes to the NDHB Provider (mostly for hospital services), and just under half to the Funder. The Funder budget is largely spent on contracts with Northland's NGOs and the payment of Inter District Flows to other DHBs (both of which are explained under 1.6.1), with a small amount to run the Funder function (1.6.2).

Graphic 9 Northland DHB funding 2010/11, revenue and expenditure



1.6.1 Provision of health services for Northlanders

Publicly funded health services for Northlanders are provided by a combination of:

- the NDHB Provider service
- non-governmental organisations
- DHBs in Auckland
- national services.

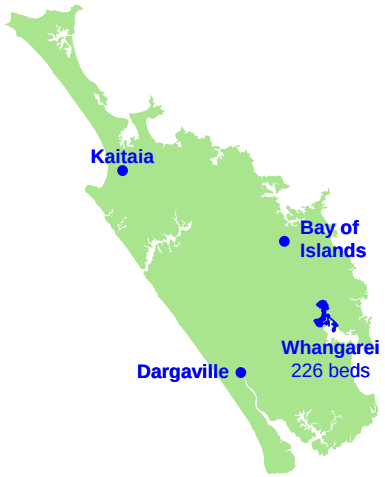
Each of the four provider types is described under its own subheading below. This is followed by a more detailed description of types of service by Output Class and type of provider in Graphic 12.

NDHB Provider

The NDHB Provider consumes just over half the DHB's total budget. It comprises three main parts (explained further under (a) to (e) in Graphic 12):

- hospital services (Graphic 10) and hospital-based community and outreach services
- Mental Health and Addiction Services
- a community and primary services arm.

Graphic 10 Northland DHB's major facilities



Non-governmental organisations

Northland has 232 contracts with 129 NGOs who provide a wide range of public, primary and community services across Northland (Graphic 11). They consume about a third of NDHB's total budget.

DHBs in Auckland

Hospitals in Auckland, primarily Auckland Hospital itself, provide more specialised (tertiary) services for Northlanders, mainly in cancer and cardiac care. Because of low patient volumes, these are too expensive for Northland DHB to provide. NDHB is charged for these services through the Inter District Flows mechanism which accounts for 14% of our total funding.

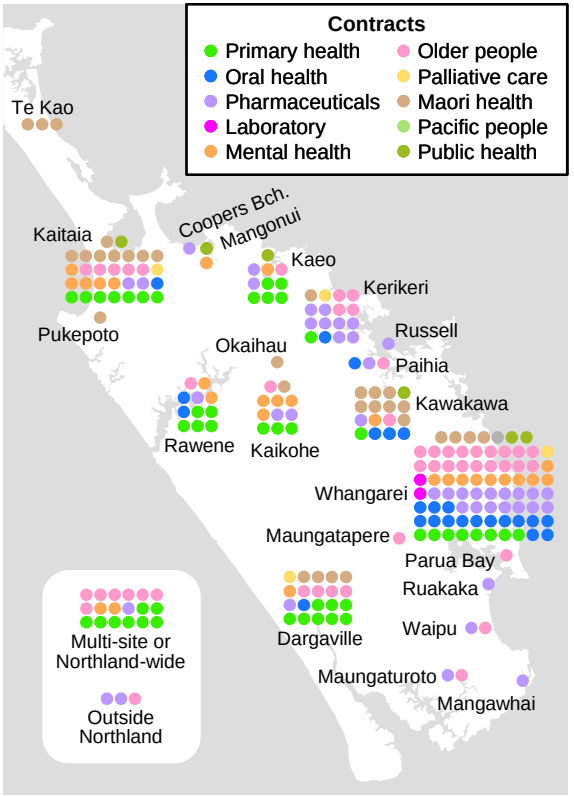
National services

Units in major urban centres provide highly specialised services that are planned, funded and monitored at national level by the National Health Board:

clinical genetics, paediatric pathology, paediatric metabolic services, paediatric cardiology and paediatric cardiac surgery. The National Health Board also oversees the National Service Improvement Programme for some major clinical services: cardiac surgery, paediatric oncology, paediatric gastroenterology, neurosurgery and major trauma.

The Ministry of Health still holds a few national contracts with NGOs such as with Plunket and St John.

Graphic 11 NGO providers and contracts, Feb 2011



Type	No. of contracts	No. of providers
Primary care	46	15
Oral health	24	18
Pharma-ceuticals	43	33
Laboratory	2	2
Mental health	27	14
Older people	48	29
Palliative care	4	4
Maori health	33	10
Pacific people	1	1
Public health	4	3
Total	232	129

Service coverage in more detail

A full range of health services for the Northland population are provided by a range of organisations as described in Graphic 12. More detailed descriptions of the services provided under each Output Class are provided in 4.1.3 Output Classes.

Graphic 12 Types of service by Output Class and type of provider

Type of provider	Output class						
	Prevention	Early detection & management	Intensive assessment & treatment				Rehab & support
			Secondary local	Secondary specialist	Tertiary	Quartenary	
NDHB provider	✓a	✓b	✓c	✓d			✓e
NGOs (funded by NDHB)	✓f	✓g					✓h
Community & voluntary	✓i	✓j					✓k
Other DHBs					✓l	✓m	

a "Population health" services provided to the community at large by the Child, Youth, Maternal, Public and Dental Services arm of the DHB:
- *health promotion:* public health awareness, working with schools, etc
- *health protection:* water and sewerage, licensing of premises, environmental monitoring etc
- *collaborative work* with organisations outside the health sector on a number of initiatives.

b Community and primary services delivered to individuals by the Child, Youth, Maternal, Public and Dental Services arm of NDHB:
- oral health services
- home healthcare
- well child and youth services (screening, immunisation, communicable disease tracing, sexual health, child protection, hearing and vision, mobile ear nursing services).

c District hospitals in Kaitaia, Bay of Islands and Dargaville that provide inpatient and outpatient services for medical, paediatric and maternity services, surgery (Kaitaia only) and renal dialysis (Kaitaia and BOI).

d Services at Whangarei Hospital which provides *inpatient beds, outpatient clinics and day services* across:
- medical and surgical services, which include a variety of specialties (medical specialties such as cardiac rehab, surgical specialities such as orthopaedics etc) and special units (eg the Diabetes Service); surgical services also provide operations through theatre complexes in Whangarei and Kaitaia.
- child health services which include paediatric and neonatal services, as well as child health outpatient services including behavioural and developmental services
- secondary maternity services.

Emergency departments exist at all hospital sites.

Mental Health and Addiction Services provide a full range of specialist inpatient and community services for people across all age groups who have a moderate to severe mental illness or addiction. These include inpatient services at Whangarei, subacute units in the Mid and Far North, a detoxification unit in Dargaville and community mental health and addiction teams in each geographical unit. Services are age-specific and there is a specific service designed to meet the needs of Maori clients.

e *Needs Assessment and Service Coordination* (NASC) which: (a) determines an older person's eligibility, (b) assesses their need for publicly funded disability support services (needs assessment) and (c) allocates services which are then delivered by third party providers (service coordination, which includes several of the services listed under (h) below).

Assessment, treatment and rehabilitation services for older people: includes an acute service at Whangarei Hospital only and community rehab teams attached to each district hospital.

Specialist palliative care liaison team that supports provision of generalist palliative care (see under (h)) and support services for people receiving palliative care who have personal health needs.

f NGO providers of public health services such as social marketing for tobacco control and school-based health promotion programmes. Also includes a few community and voluntary organisations who receive funding from NDHB to implement targeted programmes such as Maori community action to reduce obesity.

g NGO providers of largely *primary care services* such as general practitioners, pharmacists, dentists and community laboratory.

NGO providers of *mental health services* in the community.

h Services for people assessed by the NASC service, (see (e) above):

- *age-related residential care (ARRC):* rest home, hospital level and secure dementia services
- *aged residential hospital specialised services:* psychogeriatric care for older people delivered by two providers in Whangarei
- *home based support services:* community-based services that deliver household management and personal care services to older people living in the community
- *respite care* providers deliver short term care to older people with high needs so their carers at home can have breaks
- *day services* are community-based services which support people with age-related needs to remain in their own home, and/or provide support for their carers.

Specialist palliative care providers provide specialist assessment, a multidisciplinary team including medical, nursing and social work health professionals, and coordination of care for people who have been diagnosed with a life-limiting condition. An 8-bed inpatient respite facility is available in Whangarei while community-based services operate in other areas.

Mental health community-based supported accommodation for people with enduring mental illness who are stable most of the time.

i, j, k A host of community and voluntary organisations funded from outside Vote:Health and are too numerous to list here.

l Hospitals in Auckland, primarily Auckland Hospital itself, which provide more specialised (tertiary) services for Northlanders, mainly in cancer and cardiac care. Because of low patient volumes, these are too expensive for Northland DHB to provide. NDHB is charged for these services through the Inter District Flows mechanism.

m Highly specialised units in major urban centres that provide paediatric pathology, paediatric metabolic services, paediatric cardiology and paediatric cardiac surgery.

1.6.2 Funding and planning

More than 99% of Northland DHB's funding goes on service provision (see Graphic 9), but the DHB also has a small funding and planning team.

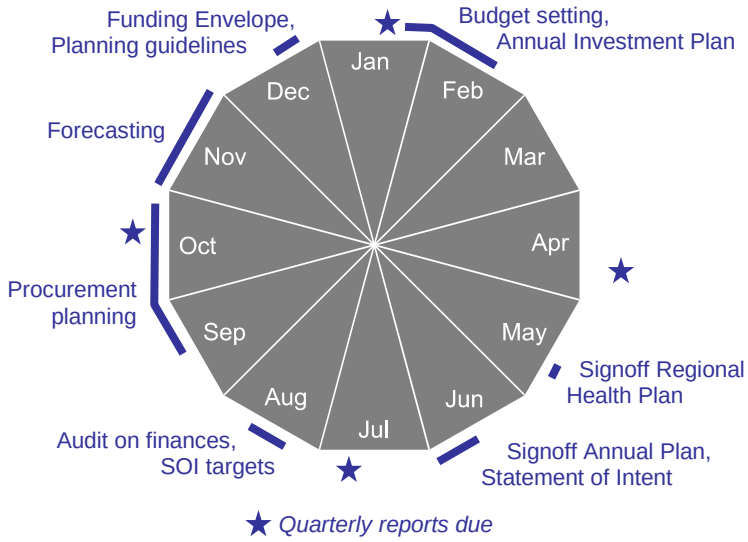
The *funding function* involves working with Northland's NGOs (Graphic 11), for whose performance Northland DHB is responsible. Funder staff build relationships with them, negotiate contracts, ensure they are paid appropriately and monitor their progress.

The *planning function* addresses the way health services are organised and delivered to better meet the needs of the population. Needs are assessed at a population-wide level, and action plans developed with involvement from workers across the health sector to suggest how improvements can be made. An important part of the planning role is prioritisation, which involves assessing how well the current distribution of resources meets needs and overseeing a prioritisation tool for assessing existing services and new proposals.

The Funder helps Northland DHB monitor its performance. It coordinates quarterly reports to the Ministry of Health (3.2 Health Targets, 9 Monitoring framework performance measures) and develops additional internal tools to monitor progress on the Annual Plan. The Funder produces the Annual Plan and contributes to the Northern Region Health Plan together with the three Auckland DHBs.

Key elements of the funding and planning cycle are depicted in Graphic 13.

Graphic 13 Key elements of the funding and planning cycle



2 Strategic direction

2.1 DHB vision

Northland DHB's vision is to create a healthier Northland. To work towards this we aim to improve health outcomes for all Northlanders, and to improve equity between Maori and non-Maori in Northland and between Northlanders and other New Zealanders. This is in line with the requirements of the Public Health and Disability Act 2001 quoted in section 1.1, particularly objectives (a) and (e).

2011/12 is a transition year in which Northland DHB's strategic direction will broaden from being locally developed to one that embraces the strategic direction that drives the Northern Region Health Plan (NRHP). The vision of the NRHP is to add value to the health and lives of the 1.6 million New Zealanders in the region. The plan's rallying standard is the Triple Aim, simultaneously addressing population health, delivering quality of patient experience and considering cost and productivity (further detail is in 3.6 Regional collaboration).

2.2 Maori health and reducing inequalities

NDHB is committed to reducing inequalities and improving Maori health and wellbeing. We want to maximise opportunities for Whanau Ora and contribute to whanau achieving optimal success. We acknowledge our statutory responsibility and obligations to Maori through developing working relationships based on the principles of partnership, protection and participation derived from the Treaty of Waitangi, and to support the implementation by iwi of the Whanau Ora initiative.

Accordingly throughout this document we have identified specific actions and targets linked to reducing inequalities. The plan has two companion documents. *Te Tai Tokerau Maori Health Strategic Plan 2008-2013* was developed jointly by PHOs, Maori NGOs and the DHB and seeks to address the building blocks of hauora regarding health, economic prosperity, education, research and development and the environment. The *Northland DHB Maori Health Annual Plan 2011/12* is based on an MoH template which focuses on national priorities and indicators to enable measurement of Northland's progress on improving Maori health and reducing inequalities, and to benchmark Northland against other DHBs.

Finally, we acknowledge the Iwi of Te Tai Tokerau (Te Aupōuri, Ngāti Kahu, Ngāti Kurī, Ngāpuhi, Te Roroa, Ngāpuhi ki Whāingaroa-Ngāti Kahu ki Whāingaroa, Te Rarawa, Ngāi Takoto, Ngāti Wai, Ngāti Whātua, and Te Uri o Hau) . We confirm that NDHB will work collaboratively with Iwi to not only effect our responsibility under the Treaty of Waitangi but also to implement Whanau Ora for Whanau success.

2.3 Strategic alignment

Graphic 14 shows how NDHB's strategic outcomes are consistent with the Government's priorities and the Northern Region Health Plan's high-level direction. While the language is different in each case, the intention is broadly the same.

Graphic 14 Alignment of national, regional and local strategies

Minister of Health's expectations[3]	Northern Regional Health Plan[4]			Northland DHB's Statement of Forecast Service Performance[5]	Output Class			
	Strategic goals	Objectives	High level measures		Prevention	Early Detection & Mngt.	Intensive Asses.& Treatment	Rehab & Support
Improving service and reducing waiting times (Health Targets and other expectations)	*Triple aim 1:* Population health; adding to and increasing the productive life of people in the Northern Region. *Priority goal 2:* Life and years *Key interventions:* Diabetes Cardiovascular Cancer Child health Radiology Elective surgery Emergency care Health of older people	1.1 Minimise impacts from diabetes	1.12 Improvement in diabetes and cardiovascular services [HT]	Outcome: Optimum quality of life for people with long term conditions Impact: Amelioration of disease symptoms and/or delay in their onset		✓	✓	
		1.1 Minimise impacts from cardiovascular disease	1.12 Improvement in diabetes and cardiovascular services [HT]			✓	✓	
		1.3 Minimise impacts from cancer, improve quality of cancer care	2.33 Shorter waits for cancer treatment; maintain 4 week radiotherapy [HT]			✓	✓	
			Increased breast and cervical screening rates	Outcomes: Prevention of illness and disease; Optimum quality of life for people with long term conditions		✓		
		1.4 Healthier safer children	1.42 Improved immunisation rates [HT]	Outcome: Prevention of illness and disease Impact: Lower incidence of communicable disease	✓			
		2.3 Appropriate health and disability services can be accessed in a timely manner when needed	2.32 Elective surgical services will be increased in line with elective service Health Target [HT]	Outcomes: Reversal of acute conditions; Optimum quality of life for people with long term conditions Impact: If cancer is curable, increased likelihood of survival; if incurable, reduced severity of symptoms			✓	
		Decrease the number of people smoking	1.33 Better help for smokers to quit [HT]	Outcome: Prevention of illness and disease Impact: Lower prevalence of smoking-related conditions		✓	✓	
		2.3 Appropriate health and disability services can be accessed in a timely manner when needed	2.3.1 95% of patients will be admitted, discharged or transferred from emergency departments within 6 hours [HT]	Outcome: Better, sooner, more convenient services. Impact: More timely ED assessment, referral and treatment			✓	

[3] Described further in section 3.1.
[4] Described further in section 3.7.
[5] Described further in section 4.

Minister of Health's expectations[3]	Northern Regional Health Plan[4]			Northland DHB's Statement of Forecast Service Performance[5]	Output Class			
	Strategic goals	Objectives	High level measures		Prevention	Early Detection & Mngt.	Intensive Asses.& Treatment	Rehab & Support
		Reduce health inequalities	Reduction in 'did not attend' rates for outpatient appointments	Outcome: Better, sooner, more convenient services.			✓	
		Reduce health inequalities	Increased breastfeeding rates	Outcome: Healthy population Impact: Reduced likelihood of acquiring long term conditions in later life	✓			
		1.4 Healthier safer children	1.42 Improved immunisation rates [HT] Infants exclusively and fully breastfed. Five-year-olds caries-free. Average number of DMF teeth Year 8s.	Outcomes: Healthy population; Prevention of illness and disease Impacts: Reduced likelihood of acquiring long term conditions in later life; Lower incidence of communicable disease; Healthier teeth and gums.	✓	✓		
Services closer to home		2.3 Appropriate health and disability services can be accessed in a timely manner when needed	Reduced waiting times for diagnostics Increased volume of minor skin surgery performed in primary care	Outcome: Better, sooner, more convenient services.		✓	✓	
		Reduce health inequalities 2.3 Appropriate health and disability services can be accessed in a timely manner when needed	Increased service range provided through Whanau Ora Reduced avoidable emergency department presentations and hospital admissions	High level outcome: Improved equity		✓	✓	
		2.3 Appropriate health and disability services can be accessed in a timely manner when needed	Increased service range provided through integrated family health centres Reduced avoidable emergency department presentations and hospital admissions	Outcome: Better, sooner, more convenient services.		✓	✓	
Safe and efficient services for older people		1.2 Improve outcomes for older people, ensure alignment of capacity and demand	1.24 Reduce ASH rates for older people 1.25 Decrease avoidable admissions from residential care to EDs 1.26 Increase percentage of	Outcome: Independence for those with impairments or disability support needs. Impact: Rising % of home based support services provided to older people who have higher support needs.		✓	✓	✓

Minister of Health's expectations[3]	Northern Regional Health Plan[4]			Northland DHB's Statement of Forecast Service Performance[5]	Output Class			
	Strategic goals	Objectives	High level measures		Prevention	Early Detection & Mngt.	Intensive Asses.& Treatment	Rehab & Support
			complex older patients who have had a medication review					
Strengthened clinical leadership Support for the Health Quality & Safety Commission	*Triple aim 2:* Patient experience; aiming for zero patient harm and performance improvement *Priority goal 1*: First do no harm *Key interventions:* Clinical partnerships and networks Patient safety The informed patient Advanced care planning	2.1 Improve safety and quality of health care across the whole sector 2.2 Informed patient choice to ensure patients get appropriate care that best suits their context	Decrease adverse events Decrease patient complaints Improve patient satisfaction Decrease readmission rates	High level outcome: Confidence and trust in the health system Outcome: Better, sooner, more convenient services Impacts: More satisfied patients; Fewer adverse clinical events		✓	✓	✓
Regional Collaboration Support for Health Benefits Ltd Living within our means	*Triple aim 3:* cost & productivity; the region's health resources are efficiently and sustainably managed to meet present and future health needs *Regional Priorities:* healthAlliance NZ establishment Regional Information Systems Plan Regional Asset Planning Northern Region Health Plan	3.1 Regional resources are used effectively and services delivered efficiently with minimal wastage	Break-even position achieved for 2011/12 healthAlliance NZ savings achieved Improved clinician satisfaction with access to clinical information Business transformation savings achieved	High level outcome: Living within our means	✓	✓	✓	✓

2.4 Key outcomes

To achieve these outcomes, NDHB, working in conjunction with our Northern Region colleagues, aims to achieve the following impacts.

Healthy population	Supporting people who are already healthy to stay healthy, and those who have undesirable lifestyle habits to remedy them before they create health problems.
Prevention of illness and disease	Employing screening services and health checks to pick up on conditions as early as possible, hopefully before they cause health problems.
Reversal of acute conditions	Some conditions, depending on their type and severity, can be treated and reversed or even cured.
Optimum quality of life for those with long term conditions	Once long term conditions are acquired, they can only be managed, so health checks, clinical support and appropriate lifestyles are essential to prevent or delay the condition worsening.
Independence for those with impairments or disability support needs	People with physical, sensory, neurological, psychiatric or intellectual impairments have a right to a full life, but they face barriers created by a society that does not take appropriate account of their needs.
Better, sooner, more convenient services	Everyone is entitled to good quality, safe services that are accessible and appropriate.

2.5 Key measures of performance

To monitor our performance on these impacts, NDHB uses the following measures. The impacts listed in the tables are a summarised version of fuller explanations described in 4.1.2 Impacts, outputs and progress.

Health Targets (3.2 Health Targets)

Priority	Indicator	Medium-term impact
Smoking	Smokers offered advice and help to quit	Providing brief advice to smokers has been shown to increase their chance of making a quit attempt. More quit attempts will lead to a reduction in both smoking rates and smoking-related diseases.
Immunis-ations	Two-year-olds fully immunised	Improved immunisation coverage leads directly to reduced rates of vaccine preventable (communicable) disease. It also encourages more children to visit their primary care provider regularly.
Emergency care	Maximum 6 hour wait in ED	For patients, shorter waiting times in ED mean more privacy and dignity, and better clinical outcomes (as reduced mortality, shorter lengths of stay for those admitted into hospital as inpatients).
Elective operations	Extra elective operations; maximum 6 month wait	Elective surgery increases people's functioning because it remedies or improves disabling conditions, so more and earlier access to operations will improve health and wellbeing.
Cancer	Maximum 6 week wait for radiology treatment	Cancer accounts for a significant proportion of death and disability. Earlier access to treatment improves the chances of survival.
Diabetes & CVD	Diabetes annual free checks Management of blood sugar in people with diabetes Assessment of cardiovascular risk	CVD and diabetes account for a significant proportion of death and disability. If more people receive checks earlier and the conditions they have are managed appropriately and consistently, improved health and independence will result.

Impact measures in the SFSP (4 Statement of Forecast Service Performance)

Priority	Indicator	Medium-term impact
Smoking	Proportion of smokers in Year 10 students, total population and pregnant women	Because smoking has such a profound effect on the rate of illness and death and exacerbates a whole range of diseases, its prevalence in the population is a crucial indicator of our overall state of health.
Child health	Infants exclusively and fully breastfed at 6 weeks.	Higher rates of breastfeeding in infancy correlate with a lower chance later in life of developing health problems, including long term conditions.
Oral health	Five-year-olds who are caries-free. Average number of decayed, missing or filled teeth in Year 8 students.	Oral health directly affects the state of health of the mouth, and the effects of tooth and gum disease can be lifelong. Significant rates of disease can also limit what children can eat, affect personal self-image and confidence, and create pain and discomfort.
Child protection	Referrals to CYFS of children suspected of being abused.	Every child has the right to live in a safe, nurturing environment free from abuse and neglect.
Cancer	Breast cancer and cervical cancer screening rates.	Screening in the community to identify cancers as early as possible improves the chances of prevention or, if the condition already exists, recovery.
Mental health	Referrals from GPs to Primary Mental Health Coordinators.	Mild to moderate disorders affect 20% of the population at any one time and 90% over a lifetime.
	Proportion of people with enduring mental illness 20-64 who are seen over a year.	Severe mental disorders and addictions require support and treatment by the specialised clinical workforce employed by NDHB. Mild to moderate disorders can be dealt with largely by primary care services, with support from specialised clinical services if conditions become unstable.
Quality	Measures of the quality and safety of services (patient satisfaction rates, complaints, infections, hand hygiene)	Quality systems enhance the nature of care experienced by patients. They also reduce risks, cut down errors, smooth flows between services, improve staff morale and minimise resource wastage, so they are an important contributor to productivity and efficiency.
Health of older people	Rising proportion of home based support services hours provided to older people with higher support needs.	Home based support services are coming under growing pressure because there is an increasing number of older people receiving them (currently approximately 12% of Northland's over 65 population). This growth will be sustainable only if we allocate resources to those most in need. Certification of aged residential care facilities is carried out to make sure they are adhering to health and disability sector standards. The better they do this, the longer the period of certification they receive. Respite care increases planned access to 'time out' services for older people being cared for in the community. This improves the health and wellbeing of informal carers and enables older people to stay at home longer, thus delaying entry to long-term residential care.

2.6 Key risks and opportunities

Graphic 15 takes a broad scan of the environment within which Northland DHB operates and identifies key factors which increase risks and/or provide opportunities for the organisation. Further details about our operating capability are in 5 Stewardship.

Graphic 15 Key risks and opportunities for Northland DHB

Factor	Risk / opportunity	NDHB response
Funding levels	About 96% of Northland DHB's total revenue comes from the Ministry of Health. A DHB's share of Vote:Health is determined by its population size, weighted for factors that	While the extra 0.5% of Vote:Health may not sound much, it equates to about $60m of annual income. Northland DHB is acutely aware of using this resource wisely to help meet the needs of our population.

Factor	Risk / opportunity	NDHB response
	increase the need for health services (gender, age, ethnicity, rurality, deprivation). The application of this Population Based Funding Formula (PBFF) sees NDHB's allocation rise from a raw share of 3.7% of Vote:Health to a PBFF-weighted allocation of 4.2%.	Key factors are managing within budget, managing demand-driven contracts, regional relationships, the quality of information systems, the rigorousness of our prioritisation tool, new models of care, and attracting and retaining the right staff. All of these are addressed elsewhere in this table.
Increases in demand for services	Demand for health services is outstripping population growth (1.4 Health profile, Graphic 7). Allied with increasingly expensive technologies, this poses significant challenges to meet demands and stay within budget. RHP 3.1 - 3.6, 3.11-3.63	Reduce costs and improve productivity of services, including working regionally with the Auckland DHBs under the third of the Triple Aims. Pursue approaches to improve the health of the population and reduce inequalities, such as reducing the prevalence of smoking. Improve models of care to streamline patient flows and improve outcomes. Gather better data so we can improve effectiveness and efficiency of services and improve patient outcomes.
High-need population	As described earlier in 1.3 Population profile, the Northland population has one of the highest needs for services because it is one of the country's most deprived and has an older age profile. RHP Strategic Challenges	Collaboration with government and local body agencies, such as through the Northland Intersectoral Forum, to address the social and economic factors underlying deprivation. Identify high-need populations and target services (a process helped by the new prioritisation tool described below). For high-need groups, continue to develop relationships with service providers, both Maori and mainstream, and negotiate requirements in their contracts. Analyse funding patterns, productivity and cost-benefits. For long term conditions, negotiate

Factor	Risk / opportunity	NDHB response
		and introduce new models of care.
Managing within budget	All DHBs are required to stay within budget, and the consequences for not doing so can be profound. This is especially challenging in the current funding environment because there are no real increases in funding for new services.	NDHB's system of financial management and monitoring of financial performance (5.1.1 Management processes and financial control). Northland DHB has a proud history of remaining in the black. RHP Triple Aim, Cost and productivity
Demand-driven contracts	The majority of the Funder's expenditure (see Graphic 9) is demand-based, paid for on a per-item basis (each drug prescribed on a pharmacy prescription, or each lab test undertaken, etc). Volumes are driven by demand, so the Funder has limited control of them. We also have limited influence over the price per item because that is often determined nationally. There is no 'cap' on this spending.	Budgets for each new year are calculated based on historical expenditure and any known likely future impacts, though NDHB is still exposed to any unknown or unpredictable fluctuations. Continue to: monitor expenditure. maintain effective working relationships with providers engage in regional and national activity. RHP Triple Aim, Cost and productivity
Inter-District Flows (IDFs)	About one-seventh of all NDHB expenditure goes on IDFs, money we pay to other DHBs, mainly Auckland, for specialised (tertiary) services provided to Northlanders that are not available here. This is a major risk to the DHB, mainly because: referral is based on clinical need and therefore difficult to predict and control for inpatient services (about 60% of total IDFs), each patient treated is paid for at a nationally-agreed price, and	Maximise the number of patients treated in Northland by: maintaining and increasing the skill levels of NDHB's clinical staff ensuring ready access to more specialised advice from tertiary providers developing regional clinical protocols to specify when conditions should be referred (see regionalisation row in this table). Another option is to increase the range and complexity of services provided by NDHB. However setting up new services is expensive and

Factor	Risk / opportunity	NDHB response
	demand for these services has been growing much faster than growth in NDHB's population and funding.	complicated, and specialised staff can be difficult to attract (see employment issues section of this table).
Regionalis-ation	When it comes to tertiary services provided regionally (see IDFs above), Northland has traditionally experienced difficulties in making our case heard. Partly that was because we comprise less than a tenth of the Northern Region's urban population, but also because the needs of our scattered, rural population differ from those of the mainly urbanised population of greater Auckland.	Northern Region relationships have been strengthened over the years so that now there is commitment by regional services to achieve equitable access and health gain for everyone who resides in the Northern Region. Regional engagement is a two-way street. It also requires Northland providers, led by senior clinicians, to think more flexibly and up their game, in order to reconfigure and streamline services, information and patient flows to achieve maximum benefits.
New prioritisa-tion tool	NDHB needs to be assured that all decisions we make regarding services we provide and contract for will improve the health of our population and reduce inequalities in health status. RHP 3.5, 3.51	NDHB's newly developed prioritisation tool takes a rigorous, quantified approach to assessing the effectiveness of services. It will be used for all decisions that involve allocation or reallocation of funding (including potential disinvestment) under the direct accountability of the DHB. This includes: decisions regarding Northland DHB provider services and NGO contracts; any service changes proposed by NDHB; new projects or initiatives; solicited and unsolicited funding proposals. RHP 3.5, 3.51
Information systems and data	The right sort of information is vital for defining needs, devising new service arrangements and monitoring performance. Key contributing factors are the type of data that systems are set up to generate and how well	Continue to lobby for sound national decisions to be made as soon as possible. Continue to support plans for a system that makes information available at any point, service, provider or geographical location in the health sector, as long as

Factor	Risk / opportunity	NDHB response
	different providers' systems 'talk' to each other. Significant investment is needed to remedy this. Major gains are difficult to achieve until national decisions are made by the National Health Board's IT Board on the structure and type of info systems. Even once decisions have been made, it will be several years before benefits are fully realised.	safeguards over access are built in. Continue to achieve maximum possible gain from current systems, especially by improving how they exchange data. RHP 3.6, 3.61-3.63
New models of care	Introducing new ways of organising services to ensure they are better, sooner and more convenient could be interpreted as upheaval and a potential threat by some in the health sector. The potential for more flexible workforce practices is constrained by national structural barriers such as employment agreements and employment law. RHP 3.1, 3.4, 3.12, 3.21, 3.42, 3.43, 3.44	Initiatives to break down 'silos' and establish new ways of working. Current focus is the establishment of the Tai Tokerau Alliance of Health (3.3 Services closer to home). Service structures, workforce practices, contracts, info flows and methods of practice can be changed to smooth the patient journey, improve information flows, strengthen monitoring capabilities, enhance clinical leadership, use resources more productively and improve health outcomes. Consideration of new models of care should precede capacity planning, thus potentially reducing demand for capital funding. Continue involvement in and submissions to national processes that influence work practices.
Employ-ment issues	Around 70 percent of NDHB's provider expenses are staff-related, so any changes to nationally or regionally negotiated employment	One advantage Northland has over other similar sized DHBs is our appealing physical environment and warm climate, which enhance our 'pulling power'.

Factor	Risk / opportunity	NDHB response
	contracts have significant impacts on our costs. Northland DHB, as a relatively small player in the national health sector, often struggles to attract and retain appropriate staff, especially in certain clinical specialist roles. RHP 1.28	Continued and innovative attention to efficiencies, strict budget monitoring practices and close controls over workforce-related costs such as annual leave and use of locums. Continue to explore innovative "grow our own" solutions to workforce issues (such as Pukawakawa[6], scholarships in oral health and Maori health).

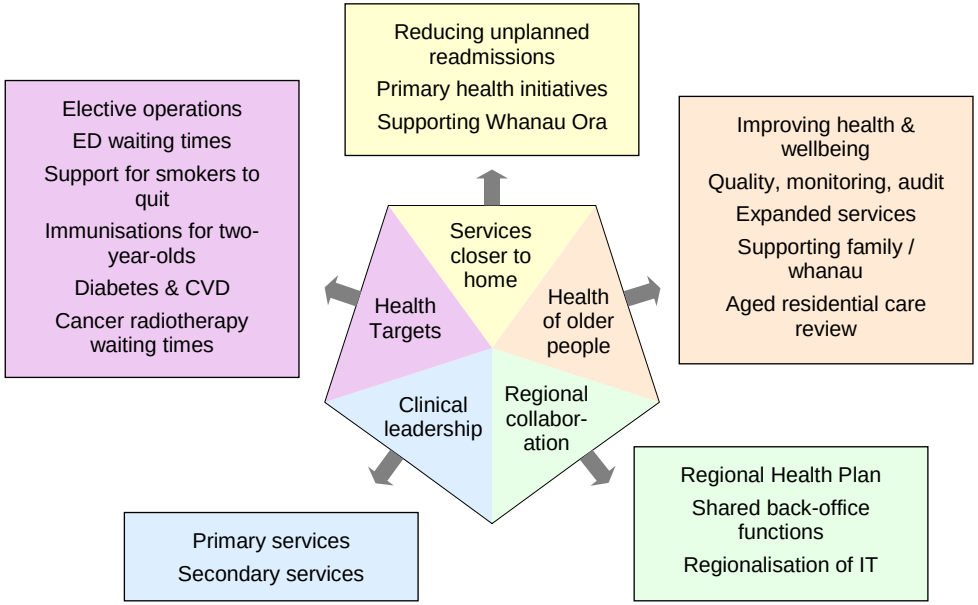
[6] An arrangement under which a group of fifth year medical students from Auckland Medical School work in Northland as part of their training.

3 Delivering on priorities and targets

3.1 Ministerial priorities

Each year during the early stages of each planning round, the Minister sends out his Letter of Expectations which describes his key priorities for the coming year. Priorities for 2011/12 are:

Graphic 16 Minister of Health's priorities from his Letter of Expectations for 2011/12



3.2 Health Targets

Health Targets are a set of national performance measures specifically designed to improve the performance of health services. Each of the Health Targets reflects a priority health area for the government. They are reviewed annually by the Minister of Health to ensure they align with government priorities.

The six Health Targets are:

- HT1 Shorter stays in emergency departments (section 3.2.1)
- HT2 Improved access to elective surgery (3.2.2)
- HT3 Shorter waits for cancer treatment (3.2.3)
- HT4 Increased immunisation (3.2.4)
- HT5 Better help for smokers to quit (3.2.5)
- HT6 Better diabetes and cardiovascular services (3.2.6)

3.2.1 HT1 Shorter stays in emergency departments

RHP 2.3, 2.31

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
Reversal of acute conditions Better, sooner, more convenient services Confidence and trust in the health system	95 percent of patients will be admitted, discharged, or transferred from an Emergency Department (ED) within six hours.	95%	Increasing utilisation of the Short Stay Observation Unit within ED. Lansom tube system to streamline lab specimen transfer. Increased medical registrar cover and social worker resource in ED. Improvements to the bed management process to streamline admissions to wards from ED. NDHB's new Acute Care Reform Programme (Appendix 3: Acute Care Reform Programme) will include a range of strategies and projects with positive impacts on meeting the ED target: • applying lean methodologies to ensure radiology and laboratory processes are efficient and effective • discharge planning • handover • safe care after hours. The Care Capacity Demand Management programme[7] will ensure greater accuracy in identifying NDHB's functional operating points in relation to markers of quality patient care, quality of the work environment and the best use of resources. Continue planning for new ED and Admission Planning Unit (APU) and develop temporary APU within inpatient	Decreased ED overcrowding and length of stay. Improved care of acutely ill patients. Improved staff satisfaction. Reduced average length of stay. More flexible workforce and more efficient utilisation of staff as measured by TrendCare.	Increased patient satisfaction. Decreased patient complaints. Improved patient safety.	*National outcomes:* NZers living longer, healthier and more independent lives People receive better health and disability services. Minister's priority of improving hospital productivity.

[7] The CCDM programme will assist the DHB to develop and refine a Core Data Set that will enable greater accuracy in predicting demand, measuring actual demand in real time and capturing the incidence of variance resulting from demand capacity mismatch.

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
			ward. Devise strategies in district hospitals to reduce demand on Whangarei Hospital. Reduce presentations by older people (3.6 Health of older people): • from falls by those in aged residential care • for end-of-life care.			

3.2.2 HT2 Improved access to elective surgery

RHP 2.3, 2.32

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
Reversal of acute conditions Better, sooner, more convenient services	The [national] volume of elective surgery will be increased by an average 4,000 discharges per year (compared with the previous average increase of 1400 per year).	Operations: Base 4,734 Addit'l 1,464 Total 6,198 Cost-weighted discharges: Base 5,874 Addit'l 2,140 Total 8,014	Improved management and efficiency of acute inpatient service delivery through streamlining of patient pathways, thus increasing capacity to achieve the small increase in the elective surgery target and help manage acute demand. Undertake theatre capacity options analysis and implement the best option to increase theatre capacity. Implement The Productive Operating Theatre (TPOT) initiative to be funded by Electives Productivity funding.	Better use of existing resources and funding to meet increases in demand of both acute and elective inpatient services. Increased theatre productivity.	Improved patient experience and improved waiting times. More discharges and costweights delivered to the Northland population.	*National outcomes:* NZers living longer, healthier and more independent lives People receive better health and disability services. Minister of Health's priority of improving hospital productivity. The health and disability system and services are trusted and can be used with confidence.

For elective patients, NDHB is committed to a six month timeframe from GP referral to first specialist assessment, and to a six month timeframe from commitment to treat to treatment. To ensure that this is achieved the DHB is outsourcing work to the private sector in the last quarter of 2010/11 to reduce the size of the waiting lists (and targeting those waiting the longest) before the start of 2011/12. NDHB will also be focusing attention during 2011/12 on the following:

- theatre capacity options (including extended operating and outsourcing)
- recruitment drive for Senior Medical Officers to fill existing vacancies
- the assessment of innovative multidisciplinary, coordinated admission to discharge planning models with particular attention placed on surgical services.

3.2.3 HT3 Shorter waits for cancer treatment

RHP 1.3, 1.31-1.35, 2.33, 3.2, 3.21

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
Northern Cancer Network Regional Goals & Priorities						
Optimum quality of life for those with long term conditions Better, sooner, more convenient services	Everyone needing radiation treatment (excluding category D) will have this within 4 weeks.	Maori 100% Pacific 100% Other 100% Total 100%	The percentage of patients in category A, B and C waiting less than 4 weeks between the first specialist assessment (FSA) and start of the radiation oncology treatment (excludes category D patients).	Movement to a radiation therapy intervention rate which reflects appropriate clinical practice.	All cancer patients receive the same level of access to cancer treatment. Addressing inequalities for Maori and Pacific peoples.	Alignment with the agreed Regional Radiation Therapy Strategic Plan. *National outcomes* NZers living longer, healthier and more independent lives Minister of Health's priority of improving hospital productivity. The health and disability system and services are trusted and can be used with confidence..
	Implement medical oncology prioritisation criteria.	Percentage of all cancer patients who need a specialist assessment will have this within 4 weeks from date of referral. Percentage of all patients who are referred for chemotherapy will commence treatment within 4 weeks from the decision to treat.	Identify opportunities for service improvement in the management of access to medical oncology services.	Improved data collection (including ethnicity) to monitor and evaluate barriers, gaps and opportunities for improvement. Set targets. Standardised medical oncology procedures and processes throughout the Northern Region.	All patients receive the same level of access to cancer assessment and treatment services within the national prioritisation criteria. Inequalities for Maori and Pacific peoples are addressed.	Consistency of medical oncology prioritisation processes nationally and regionally.
	Regional indicators.	60% of all Northland primary lung cancer patients are discussed at Thoracic	Early diagnosis and treatment of lung cancer to increase survival rates (to be derived	Improved data capture, collection and reporting mechanism for Northland	Improved access to diagnosis and treatment of lung cancer.	

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
		Multidisciplinary meeting (TMDM) within 28 days of referral. 50% of Northland patients who have surgery as first treatment receive this within 14 days of TMDM. 50% of Northland patients who have FSA radiation oncology for whom radiotherapy is their first treatment receive this within 14 days of TMDM. 50% of Northland patients who have FSA medical oncology and whose first treatment is chemotherapy receive this within 14 days of TMDM.	from RHP cancer workstream). Continue regional lung tumour stream activity facilitated by the Northern Cancer Network. Identify areas where service improvement is needed in the lung cancer care pathway.	Satellite Cancer Service. Improved capability to monitor and evaluate Northland's performance and identify areas for service improvement. Increase peer support for Northland clinicians through increased participation at TMDM.	Improved access to specialist expertise and treatment. Inequalities for Maori and Pacific peoples addressed.	
	Median time from the date patient is placed on the waitlist for colonoscopy to date of colonoscopy procedure, by priority category 1-4[8].	To be derived from RHP cancer workstream.	Implement the Northern Region prioritisation criteria for colonoscopy.	Identify areas where service improvement is needed in the bowel cancer care pathway.	Earlier diagnosis and management of pre-malignant bowel conditions. Improved access to treatment for Northland colorectal cancer patients.	Northern Region Prioritisation Criteria for Colonoscopy.
	Improve early diagnosis and management of bowel cancer.	Significant reductions in the incidence of bowel cancer and the number of people who die from	Develop a bowel cancer screening programme to improve early diagnosis and interventions.	Northland Cancer Control Steering Group and Northland cancer clinicians are kept informed of the progress of the Waitemata	Increased profile of bowel cancer screening and of the national guidelines for screening for suspected	Northern Cancer Network research initiative.

[8] Priority categories vary between DHBs and regions and will limit comparison. This will be clarified by the National Bowel Tumour Stream Group when the priority categories have been developed.

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
	Achieve milestones, identify in contract with MoH.	the disease.		DHB project and its evaluation.	cancer in primary care.	
	Specialist palliative care services to demonstrate how they provide or plan to introduce 24/7 telephone advice to generalist providers in the hospital and community. Reporting mechanism for number and % of people who die with a care pathway in place at the end of life in hospital, hospice, home and residential care. Documentation of strategic approach to education and education delivery. Clear pathway for accessing grief and loss support available to all health care providers.	Specific measures to be set upon the establishment of baseline data.	Establish a regional mechanism to strengthen the capacity of palliative care providers which will enable continued development of palliative care services, including MoH priorities, for 2011/12. Address funding and implementation of 24/7 specialist palliative telephone advice to all health care providers. Implement an end-of-life care pathway within all settings where people may die. A strategic/ prioritised approach to provision of palliative care education for health care providers and others as appropriate. Grief and loss support for those with complex needs.	Improved peer support for generalists by specialists.	Timely and equitable access to funded palliative care services across all care settings. All patients within the region benefit from coordinated palliative care services provided in a number of care settings as per MoH Priorities for Cancer 2011/12.	Cancer Control New Zealand Strategy.
Northland DHB – Northland Cancer Control District Goals						
Optimum	Increase scope of		Appoint a Cancer Care	Improved peer support for	Improved access to	Northland Cancer

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
quality of life for those with long term conditions Better, sooner, more convenient services	practice for Cancer Care Coordinator (Lung) from 0.5 FTE to 0.8 FTE. Increase the scope of the Cancer Care Coordinator (Colorectal) position from 0.5 FTE to 1.0 FTE.		Coordinator (Colorectal). Agree memorandum of understanding with Regional Oncology Operations and recruit.	Northland clinicians. Improved clinical leadership and management of the Northland cancer satellite service.	appropriate clinical care for cancer patients. Reduced risk to patient safety and care.	Control Strategic Action Plan 2006-2011.
		Improve referral rate of cancer patients to the Multi-disciplinary Meeting. Adopt the regional performance targets and set Northland-specific targets.	Implement the Northern regional goals. Long Term Conditions Clinical Governance: Adopt regional performance targets and develop Northland-specific targets Improve representation on the Regional Oncology Operations Group. Lung cancer: Implement regional goals for lung cancer Remap Northland clinical pathways for all cancer streams. Bowel cancer: Implement regional goals for bowel cancer.	Improved capability to monitor the performance of the patient journey. More timely referral of patients to the most appropriate clinical pathway and early access to the Cancer Nurse Specialist and Cancer Care Coordinator. Additional peer support and review gained from participation at multidisciplinary meetings. Improved decision making capability. Improved access to data to facilitate performance monitoring and evaluation and clinical audit. Reduced clinical risk.	Improved capability to monitor impacts on patients' care. All Northland cancer patients receive the same level of access to screening, assessment and diagnostic services. Improved access to social services (transport and accommodation assistance, education, emotional support etc).	Northern Cancer Network Lung Tumour Stream Project Northern Region Regional Plan for Oncology Services. Northland DHB District Annual Plan 2010/11.
	Implementation of agreed regional notification protocols for changes to performance		Align Northland targets with regional targets where appropriate. Set Northland-specific targets for notification protocols where	Improve notification to GPs of cancer patient hospital events from secondary settings. Early identification of patient	Improved notice by GPs of patients' cancer treatment and care plans.	Northern Cancer Network Lung Tumour Stream Project Northern Regional Plan for Oncology

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
	targets and clinical protocols.		appropriate.	cases to GPs to acknowledge changes in patients' status of disease progression. Improved consistency in the referral and notification process for cancer patients. Improved collaborative working relationship between GPs and specialists. More patient-centred focus. Continuous improvement in quality patient care.		Services. Northern Region Regional Plan for Oncology Services.

3.2.4 HT4 Increased immunisation

RHP 1.4, 1.41

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
Prevention of illness and disease	90 percent of two year olds are fully immunised by July 2011; and 95 percent by July 2012.	Maori 95% Pacific 95% Other 95% Total 95%	Implementation of NDHB Immunisation Strategy in the following key areas: Immunisation (as a key component and indicator of child health services) is recognised and supported as a top priority by NDHB. The Immunisation Steering Group (which includes NDHB"s CEO) will provide strong leadership and governance direction to the child health workstream. Processes to be implemented that collectively support early enrolment with PHOs and well child programmes. Processes will involve key providers (including midwives, Plunket, PHOs, Tamariki Ora, Maori Women's Welfare League) and be inclusive of IT solutions. Ensure all PHO and NIR data and feedback is timely and of high standard to support best quality performance at a practice level. Improve, refine and monitor discharge and referral process of newborns to well child providers from maternity, LMCs and paediatricians. Develop and distribute of accessible, quality information for service users and providers including for GPs' CME. Continue programme to support the development of quality systems within primary care including pre-calls, recalls, data management, through to	A more unified and improved health and disability system. Better health and disability services. Health and disability system and services are trusted and can be used with confidence. This measure will also support delivery of the Minister of Health's priorities of strengthening the health workforce and speeding up the implementation of the Primary Health Care Strategy.	Reduced rates of vaccine preventable disease and consequently better health and independence for children, and longer and healthier lives. The changes required to reach the target immunisation coverage levels will lead to better health services for children, because more children will be enrolled with and visit their primary care provider on a regular basis. Delivery against this measure supports the health and disability system outcome of 'New Zealanders living longer, healthier and more independent lives' and the primary intermediate outcome of 'Good health and independence are protected and promoted'.	*National outcomes:* NZers living longer, healthier and more independent lives. Good health and independence are protected and promoted'. Northern Region DHBs continue to meet regularly, together with representatives from MoH, to ensure systems are developed that align with national goals and ensure cross-boundary provision of services. All regional DHBs participate in regular national teleconfer-ences. Northland DHB is represented at national immunisation conference.

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
			provision of practical support and education at GP practice level. Ensure outreach services are universally available throughout Northland. Analyse quintile 5 areas to identify gaps in service and make recommendations to Steering Group to lessen any identified inequalities in provision of this service. Continue current work to facilitate immunisation as "core business" within NDHB hospital services such as outpatients, wards, Child Health Centre and ED. Include access to NIR in these areas and also education of staff to enable provision of immunisations as appropriate. Consider development of targeted social marketing that supports key immunisation messages to 'normalise' it if coverage does not continue to improve. Support immunisation schedule changes as they occur with education resources, NIR support and immunisation coordinator support.			

3.2.5 HT5 Better help for smokers to quit

RHP 1.18

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
Healthy population Reversal of acute conditions Optimum quality of life for those with long term conditions	95 percent of hospitalised smokers will be provided with advice and help to quit by July 2012. 90 percent of enrolled patients who smoke and are seen in general practice, will be provided with advice and help to quit by July 2012.	Hospitalised smokers: Maori 95% Pacific 95% Other 95% Total 95% Smokers in primary care: Maori 90% Pacific 90% Other 90% Total 90%	Hospital: Senior clinicians and management updated monthly on ABC progress. Service ABC progress charts displayed on quality boards. Smokefree champions will continue to be monitored to ensure that training programme are effective in improving confidence and consistency around their role, particularly when facilitating ABC education for other staff. Targeted guidance and support for the ED team, so that ABC becomes standard practice. Planning will continue for the Mental Health Inpatient Unit to become completely smokefree by late 2011. Takawaenga provide ABC for Maori patients with a particular focus on ED. Support for all staff will continue with	Reduction in smoking related complications. Decreased preventable hospitalisations, especially respiratory illness, ischaemic heart disease, smoking-related cancers. Decreased GP consultations for smoking-related illnesses. Increase in documentation of smoking status and ABC in Primary Care.	Increased quit attempts. Reduction in smoking rate across all ethnicities. Reduction in disparity between Maori and European.	National target and regular liaison with National Steering Group. National outcomes: NZers living longer, healthier and more independent lives. Good health and independence are protected and promoted. A more unified and improved health and disability system. People receive better health and disability services.

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
	80 percent of current smokers enrolled in a PHO will be provided with advice and help to quit by July 2011; and 90 percent by July 2012.	Maori 90% Pacific 90% Other 90% Total 90%	free nicotine replacement therapy and ensuring more widespread compliance with the Smokefree Policy. This will be augmented by specific training for the DHB security team in early 2011. All DHB staff who smoke will continue to be encouraged and supported to ultimately be successful in quitting smoking. New signage to better inform staff, patients and visitors of the Smokefree Policy. Appointment of Smokefree Educator with major role in mental health. Primary care: Support GPs in implementing the NDHB-funded Engima-designed database to record and monitor smoking status in primary care. Continue to fund 2,000 quit attempts in primary care in Northland. NDHB's recently updated Tupeka Kore Plan will support the integration and coordination of smoking cessation services and programmes across the wider primary care and public heath sector, targeting Maori, pregnant women and youth.			

3.2.6 HT6 Better diabetes and cardiovascular services

RHP 1.1, 1.11-1.17, 1.19

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
Diabetes Northland DHB						
Optimum quality of life for those with long term conditions	Proportion of people with diabetes who have attended their free annual diabetes check.	Total 80% Maori 80% Other 80%	Implement the Regional Diabetes Implementation Plan.	Greater intersectoral participation in management of patient care. Improved reporting on specialist interventions to GPs. Strengthened cross-service provision, with reduced boundaries between services to achieve continuity of service rather than distinct primary and secondary services. Clinical input into LTC strategic planning.	More equitable and accessible diabetes services, reflected in improved diabetes Health Target performance. Improved management of diabetes reflected in improved diabetes Health Target performance. Fewer hospital visits for people with diabetes as a result of improved care. Early detection and management of the complications of diabetes	Regional structure developed as part of regional plan to support diabetes across the Northern region. National outcomes: NZers living longer, healthier and more independent lives good health and independence are protected and promoted people receive better health and disability services Minister's priority of speeding up the implementation of the Primary Health Care Strategy.
	Proportion of people who have satisfactory or better diabetes management (defined as having an HbA1c of equal to or less than 8%) at the time of their free annual diabetes check	Total 80% Maori 80% Other 80%				
	Improved linkage between primary and secondary care.	Increase the number of referrals to diabetes specialist services by 2% by 30/6/2012.	Improve the clinical and care management of the diabetes patients while in the secondary setting.	Improved clinical and care management of diabetes patients while in the secondary setting. Improved linkage between primary and secondary care and recognition of concern for patient; disease progression and	Improved, timely access to specialist care services. Improved and more meaningful interventions with appropriate specialist input. Improved monitoring of patient condition by all health professionals.	NRHP Diabetes Subgroup goals 2011/12. Northern Regional Cardiology Service Plan 2011/12.

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
				management intensity.		
Diabetes Regional Health Plan Subgroup *(subject to approval of the Regional Health Plan; see also "Diabetes Northland DHB" above)*						
Optimum quality of life for those with long term conditions	Support Clinical Leadership	By Aug 2011.	LDT mandated to implement Regional Diabetes Implementation Plan within the NDHBs LTC framework . Cross-sector clinical representation on LDT. Clinical membership of the Regional Diabetes Clinical network.	Improved clinical leadership to provide greater peer support and guidance. Clinical input into LTC strategic planning.	Improved access to specialist expertise. Improved quality of care and patient safety	Regional Health Plan Diabetes Subgroup goals 2011/12 and national guidelines for assessment and management of CVD.
		Establish and evaluate a pilot mentoring system for the healthcare team (linked with CVD) by Jul 2012.	Establish pilot mentoring teams by Dec 2011.	Peer support and guidance for GPs and health professionals involved in care and disease management.	Improved decision making capacity and options for the patient.	Regional Health Plan diabetes Sub-group goals 2011/12& National guidelines assessment and management of CVD. National Diabetes Nursing Knowledge and skills Framework.
	Improve management of patients between primary and secondary on diabetic patients and those at risk of diabetes.	Develop a Register of patients who have diabetes and those who are at high risk of developing diabetes by Dec 2011.	Build on existing information, develop proposals for a register to be managed and updated regionally.	Improvement in quantifying demand, service provision, forecasting costs of service provision, and work force supply.	Information able to be accessed throughout the Northern Region.	Regional Health Plan Diabetes Subgroup goals 2011/12 and national guidelines for assessment and management of CVD.
	Develop outcomes-based KPI framework.	Proportion of diabetes patients with microalburminuria/ proten-inuria on ACE/ ARB: (a) >80% for all enrolled patients for	Develop detailed KPI targets by Oct 2011, subject to approval of the Regional Health Plan. Develop reporting structure for framework by Oct 2011.	Improved data collection, monitoring and evaluation of performance of patients' health and wellbeing. Evidence-led changes to practice and data collection.	Improved patient safety and management of disease using evidence-based best practice.	NRHP Diabetes Subgroup goals 2011/12 and national guidelines for assessment and management of CVD.
			Target: 90% of GP practices using population health analysis tools (linked with CVD).	Improved information to better manage patients' care. Standardised expectations	A platform from which patient education, engagement, and self management can be	National Diabetes Nursing knowledge and Skills Framework.

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
		diabetes (b) >80% for all enrolled high needs patients. <10% of enrolled patients with diabetes have HBA1C >10. Start reporting and sharing information available by Dec 2011.		for all health professionals involved in diabetes management. Standardised approach and clarity in the interpretation of targets. Improved levels of computer literacy and data capture and collection processes for use by individual practices and services. Improve planning processes for patient follow-up..	launched. Patient able to see information to increase knowledge of the disease and determine how the body is responding to treatment and whether therapeutic goals are being achieved. Basis for discussing lifestyle choices.	
	Develop quality improvement cycles.	Regional clinical pathway developed by Oct 2011.	Document the clinical pathway for diabetes as a navigation tool. (National QIP Guidelines and CVD Guidelines).	Standardisation of the clinical pathways. Clearly articulated best practice approach for GPs to follow. Reduction in interpretation errors of disease management guidelines. Improved primary-secondary interface.	Improved structured care. Increase knowledge of diabetes, treatment options. Improved decision making capacity.	Regional Health Plan Diabetes Subgroup goals 2011/12 and national guidelines for assessment and management of CVD. National diabetes Nursing knowledge and skills Framework.
	Improve prevention strategies using a multi-sector approach (Whanau Ora)	Evaluation complete by July 2012.	Assess the sustainability of current prevention programmes. Assess capacity and evaluate effectiveness by Mar 2012. Provide ongoing advocacy through the network.	Providing valuable information to GPs and enable them to reach out to the population at risk and with precursor risk factors. Moving towards anticipatory care methodologies.	Normalising regular checkups as part of maintaining health and wellbeing. Increasing patients' awareness of lifestyle choices and impact as contributing factors.	Regional Health Plan Diabetes Subgroup goals 2011/12 and national guidelines assessment and management of CVD. National Diabetes Nursing Knowledge and skills Framework
	Improving health literacy, use of information and communication	10 trainers by June 2011. 40 patients by	Northland PHOs implement the Stanford Chronic Disease Self - Management Programme (Whakamana Hauora) self-management training	Reduced demand on services through improved self-management of conditions.	People with chronic conditions will live healthier and more fulfilling lives.	RHP Diabetes Subgroup. Northern Regional Cardiology Service

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
	with patients	Aug 2011.	programme during 2011/12.			Plan.
	Grow workforce to meet demand	Oct 2011	Scope requirements for roles of nurses, specialists, primary care and community consistent with regional clinical pathway.	Alleviation of demand pressure on existing workforce. Better utilisation of skilled nursing workforce, care put back into service models. Improve quality and care standards among generalists.	Improved access to services. Improve quality of care and patient safety. Improve the perception of communities of the health sector.	Regional Health Plan Diabetes Subgroup goals 2011/12 and national guidelines assessment and management of CVD. National Diabetes Nursing Knowledge and skills Framework
		Dec 2011	Prepare business case for workforce roles as identified.			
	Assess capacity requirements for retinal screening and treatment	80% of enrolled patients with diabetes have screening check within two years	Scope, design, process and resource requirements for screening and treatment by Mar for the tuture.	Positive impact on diabetes management programmes.	Improved access to preventive care services. Improved quality of life and life expectancy, particularly amongst Maori and Pacific peoples.	NRHP Diabetes Subgroup goals 2011/12 and national guidelines for assessment and management of CVD. National Diabetes Nursing Knowledge and Skills Framework.
		Dec 2011	Pilot programme into understanding reasons for DNA in Northland with results reported into the Network. Undertake data match between retinal screening database and primary care information systems.			
	Daily case review inpatients to check for diabetes.	Jul 2012	Assess feasibility for secondary care to roll out this system	Improved linkage between secondary and primary. Increased communication between secondary and primary. Improved peer support for primary.	Improved flow of patient information and therefore hospital clinicians more informed about patients' conditions and can access key patient information. Reduced duplication of effort and time wastage.	NRHP Diabetes Subgroup goals 2011/12 and national guidelines for assessment and management of CVD. National Diabetes Nursing Knowledge and Skills Framework
		Dec 2011	Through Network, recommendations to be made as to how to better use and make information available.			
CVD Northland DHB						
Optimum	Proportion of the	Maori 90%	Recruit and appoint cardiologist by 30	Increased peer support and	Improved care and	Northern Regional

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
quality of life for those with long term conditions	eligible adult population[9] who have had their CVD risk assessed in the last five years	Other 90% Total 90%	June 2012. Agree Memorandum of Understanding with the Regional Cardiology Service Plan. Recruit and appoint.	review for clinicians. Improved governance and management of CVD-specific services. Reduced clinical risk.	management of CVD. Improved timely access to specialist CVD services.	Cardiology Service Plan (CVD measurements).
	Improve access to specialist CVD services.	Recruit and appoint cardiologist by July 2012.	Agree memorandum of understanding with the Regional Cardiology Service Plan. Recruit and appoint cardiologist.	Increased peer support and review for clinicians. Improved governance and management of CVD specific services. Reduced clinical risk.	Improved care and management of CVD. Improved timely access to specialist services. Improved patient safety.	Regional Health Plan – CVD goals 2011/12. Northern Regional Cardiology Service Plan 2011/12.
	Improving and maintaining seamless management of CVD patients	Develop and implement regional performance targets by July 2012.	Investigate ways to better identify and collected data of all known CVD upon referral, ED presentation and/or inpatient ward admission. Participate in the region-wide stocktake. Provide input into the regional service improvement plan. Develop Northland-specific targets that align with the Regional Health Plan's Regional Cardiology Service Plan. Develop the reporting structure and timeframe to commence reporting. Identify work force issues. Set Northland specific targets and link with the Long Term Conditions Clinical Governance Group and LTC Framework..	Improved clinical and care management of CVD patients while in the secondary setting.	Improved timely access to specialist care services.	Regional Health Plan – CVD goals 2011/12. Northern Regional Cardiology Service Plan 2011/12.
CVD Regional Health Plan *(subject to approval of the Regional Health Plan)*						
Optimum quality of	Clinical Network Leadership	Aug 2011.	Recruit Primary Care representatives to the Network.	Increased peer support. Increased support for clinical	Improved management of patient conditions.	Regional Health Plan – CVD goals 2011/12.

[9] Maori, Pacific & Indian subcontinent men 35-79 years of age; Maori, Pacific & Indian subcontinent women 45-79 years of age; NZ European & other men 45-79 years of age; NZ European & other women 55-79 years of age.

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
life for those with long term conditions			Appoint Project Manager (with QI Expertise). Identify and ring fence analytical expertise.	leadership.	Improved access to specialist expertise.	Northern Regional Cardiology Service Plan 2011/12.
	Develop a Register of Patients with CVD or at risk of CVD	Dec 2011.	Build upon existing data and information, develop register to be managed and updated regionally.	Clinicians able to quantify accurately the level of demand and provide information to Northland DHB.	Progress made towards meeting the shared information expectation of patients across the continuum.	Regional Health Plan – CVD goals 2011/12. Northern Regional Cardiology Service Plan 2011/12.
	Develop outcomes-based KPI framework for network.	Oct 2011. Nov 2011	Develop detailed KPI framework and targets based on the regional CVD strategy. Develop reporting structure for frameworks by Oct 2011. Start reporting & sharing information available by Nov 2011.	Improved standardisation and consistency in performance for clinicians. Improved systems consistency for workforce development and exchange across DHBs.	Improvement in the consistency and application of care management in practice.	NRHPCVD goals 2011/12. Northern Regional Cardiology Service Plan 2011/12. National guidelines for the assessment and management of CVD. Weight management guidelines.
	Develop quality improvement cycles using multidisciplinary team approach.	Dec 2011.	Complete pathway as a navigation tool. Develop audit feedback cycle.	Greater assurance of workmanship and performance. Improved system of checks and balances to better support health professionals.	Improved patient safety and quality of service.	NRHP CVD goals 2011/12. Northern Regional Cardiology Service Plan 2011/12.
	Prevention of cardiac disease in the community.		Scope feasibility of expanding prevention and risk plans presented to patients at time of consult. Revisit feasibility of green prescriptions. Revisit feasibility of traffic light system for nutrition in schools.	Literacy Aotearoa advised that it takes 40 exposures before a new term is adopted by an individual. Greater use of simple and consistent messages by all health professionals with increased linkage to community based advisory services. Continue to build health	Increased opportunities to develop professional relationships of trust. Greater opportunities to adopt new skills, build health language and improve interactions with health professionals. Community service link facilitates self management focus on nutrition, weight	NRHP CVD goals 2011/12. Northern Regional Cardiology Service Plan 2011/12. National guidelines for the assessment and management of CVD. Weight management guidelines

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
				literacy for patients/clients and thereby improve interactions with health professionals.	management and exercise as vehicles to well being. Simplify the messages and make the care more meaningful – “less is more”	
	Improving care plans for patients.	Number of patients.	Number of adult patients who have their management plans presented to then at time of consultation. Standardise approach in using Heart Forecast tool or similar.	Improve relationships with patients. Tool will assist parties to set the expectation and roles of both to the plan and outline actions and timeframes for actions. Forms a basis of review to see how each party is carry out their responsibilities of the plan. Reset and replan. Creates opportunities for learning by the clinician. Patient as teacher.	Improved awareness of condition and impact of life choices on health. Improved self management capabilities and skill base and health language. Improved personal relationship with clinicians. Improved health literacy and medicine compliance.	NRHP CVD goals 2011/12. Northern Regional Cardiology Service Plan 2011/12. National guidelines for the assessment and management of CVD. CVD weight management guidelines
	Improve rate of CVD risk for all ethnic groups. Improve management of high risk CVD patients for all ethnicities.	July 2012 Dec 2011	Agree strategies and eligible population to improve assessment rates (Maori and Pacific focus). Agree strategies and targets to improve management of high risk patients in primary care. 80% of high risk patients who are on statins.	Increased clarity and consistency of the application of national guidelines. Northland’s voice included in the development of the strategies and targets.	Reduced inequalities. Improve perception of public of health professionals. Patient will see and feel genuine concern to improve their health and manage their conditions and/ orcomorbidities.	NRHP CVD goals 2011/12. Northern Regional Cardiology Service Plan 2011/12. National guidelines for the assessment and management of CVD. CVD weight management guidelines
	Actively support existing smoking cessation programmes and teams implementing		Improved uptake by high-risk CVD patients of smoking cessation programmes and appropriate management in place. 95% of hospital smokers given smoking cessation advice.	Increased opportunities to develop communication and negotiation skills among health professionals. Improved opportunity to promote treatment options	Reduction in environmental factors affecting health. Improved awareness of the impact of smoking on the health of patents, their family, children and	Regional Health Plan CVD, cancer and diabetes goals 2011/12. Northern Regional Cardiology Service

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
	programmes		90% of smokers attending primary care will be given smoking cessation advice.	and alternatives to better support patients' cessation journeys. Increased opportunities to learn about patients/ clients and their challenges, attempts and successes. More opportunities to promote hope amongst patients/ clients.	grandchildren. Treatment choices enable and empower patients to participate in decision making process and access appropriate support along their journey of cessation.	Plan 2011/12.
	Grow workforce to meet demand.		Scope requirement for workforce roles at the rate of two additional nurse specialists to be trained per DHB per year (initially). Work with Health Workforce NZ to identify funding for training and expansion (linking to diabetes).	Improved opportunities for Northland clinicians to further develop clinical leadership and champions. Improved quality standards resulting from a more informed workforce.	Improved patient safety and quality of care.	Regional Health Plan CVD goals 2011/12. Northern Regional Cardiology Service Plan 2011/12. National guidelines for the assessment and management of CVD. CVD weight management guidelines
	Cardiac rehabilitation: stocktake of all cardiac rehabilitation programmes and understand variances in care.	Aug 2011. Mar 2012.	Complete sector wide stocktake. Review and agree regional model of care by. Models must be patient and community specific.	Northland health professionals able to participate in the activity and reflect Northland's unique differences which are shaped by the geographical and economic conditions and challenges.	Northland's peculiarities and cultural uniqueness taken into account and reflected in the models.	Regional Health Plan CVD goals 2011/12. Northern Regional Cardiology Service Plan 2011/12. National guidelines for the assessment and management of CVD.
	Door to catheter laboratory (72 hour target).	Jul 2012.	70% performance target for all DHBs. Identified reduction in average length of stay.	Improved awareness of the goals and targets. Improved strategy development and commitment to continuous improvement methodologies.	Reduction in waiting time for treatment.	Regional Health Plan CVD goals 2011/12. Northern Regional Cardiology Service Plan 2011/12.
	Primary acute CPI	Jul 2012.	80% <120 minutes from door to balloon	Northland included in the mix	Improvement in service	Regional Health Plan

Outcome	Indicator	Target(s)	Actions to achieve target	Expected gains		Regional, national linkages
				For health services	For patients/ clients	
			time for Auckland DHBs. Optimise ST-segment elevation myocardial infarction (STEMI) strategy for NDHB. Review referral and clinic processes and implement.	of improvements. Improvement in service quality and delivery.	delivery in the community setting.	CVD Goals 2011/12. Northern Regional Cardiology Service Plan 2011/12.
	Outpatient services	Dec 2011	Time to FSA from GP referral to cardiologist for chest pain: 80% patients with suspected likelihood of cardiac event within 6 weeks. Wait time for outpatient coronary angiogram 3 months. Percentage of exercise tolerance testing performed at time of FSA to be defined.	Clarity in expectations, greater awareness of targets provides platform for system and process improvements for clinical pathways. Will require alignment of data systems and communication plan to implement.	Reduction in wait time. Increased access to diagnostic assessment, specialist care and treatment.	Regional Health Plan CVD goals 2011/12. Northern Regional Cardiology Service Plan 2011/12.
	Cardiac surgery		Set targets for cardiac surgery wait times. Set targets for intervention rate for cardiac surgery.	Targets will be reflective of the limitations facing Northland DHB. Provide a platform for systems and process improvements. Improve access to specialist care and treatment.	Reduction in wait times for surgery. Improved quality of life. Increased access to treatments.	Regional Health Plan CVD goals 2011/12. Northern Regional Cardiology Service Plan 2011/12.

3.3 Regional Health Plan

3.3.1 The RHP process

The Northern Regional Health Plan (NRHP) sets out the strategic and operational context for health services in the Northern Region. It is a companion document to Northland DHB's Annual Plan in that it addresses the same national priorities (see 2.2 Strategic alignment) and the planned actions in both documents are consistent (reflected in the cross referencing to the RHP throughout the AP).

NDHB is committed to the NRHP's strategic goals and objectives, and to working jointly with our Auckland colleagues to make the plan a reality, particularly the planned deliverables for year one.

3.3.2 NDHB involvement

NDHB has been an active partner in the assembly of the plan at all levels including the strategic intervention logic framework, the six major workstreams and other regional groups that have contributed to the RHP process such as information systems development. There has been involvement by Northland DHB's Chief Executive, General Managers, clinical leaders and other staff at levels ranging from the strategic to detailed planning on priority issues. Northland DHB has formed a close working relationship with the three Auckland-based DHBs and Northern DHB Support Agency staff who have worked on the plan. We have been committed to the RHP's strategic goals and objectives, and to working jointly with our Auckland colleagues to make the plan a reality.

Implementation plans for the six workstreams (diabetes, cardiovascular disease, cancer, health of older people, first do no harm, informed patient) are being developed. They describe the involvement and delineate the roles of all parties to the regional workstreams, including NDHB and the Northland NGOs.

3.3.3 The RHP's overarching framework

The Regional Health Plan is based on the Triple Aim's strategic goals of:

Population health	*Patient experience*	*Cost/ productivity*
Lift health outcomes of the Northern Region population	Better services	Ensure capacity to meet demand while living within our means
	First do no harm	
Life and years – longer, healthier, more independent lives	Informed choice	
	Performance improvement	
Reduce health inequalities		

The RHP has taken these high-level principles and distilled them into a focus on six workstreams:

First do no harm:	Patient safety and quality improvement
Life and years:	Diabetes
	Cardiovascular disease
	Cancer
	Health of older people
Informed patient choice	Advance care planning

The full version of the Regional Health Plan's overarching framework is included in Appendix 2.

3.3.4 Links between RHP and Annual Plan

Each of the six workstreams has been developed into a plan which describes specific actions to be achieved in year 1, years 2 to 5 and beyond. The planned actions for year 1 are cross-referenced to the numbered items in the overarching framework. These numbers are also cross-referenced to actions throughout sections 3 and 4 of the Annual Plan.

3.4 Services closer to home

RHP 2.3, 3.21, 3.44

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
Prevention of acute illness and disease Reversal of acute conditions Optimum quality of life for those with long term conditions Better, sooner, more convenient services	Implementation plan developed and agreed by July 2012.	Prepare for transition to BSMC environment by agreeing with Ministry of Health an implementation plan with critical pathway and timeframes that enables Northland DHB and primary care enter into BSMC environment. This plan will show how the DHB and/or allied organisations to deliver the Government's priority intention for a more personalised primary health care system that provides services closer to home, makes New Zealanders healthier and reduces pressures on hospitals.	Improved integration of services between primary and secondary care. Improved targeting of secondary care resources. Clinically led development of new models of care. Wider population health response through alliance contracting.	Better, sooner, more convenient services closer to people's homes. Services designed to reflect continuum of care.	Ministers Letter of Expectations.
	Formation of a functioning Te Tai Tokerau Alliance for Health (TTTAH) with cross-sector clinical leadership from DHB, PHO, NGOs.	Develop a project plan and identify priority areas for the newly formed Te Tai Tokerau Alliance for Health (TTTAH), including its Alliance Leadership Team (ALT). Align long term conditions clinical governance structure with the ALT. Commit senior DHB personnel and appropriate clinicians to this service redesign process.			
	Cash reserives identified. Plans developed.	Develop effective working partnerships with PHOs to ensure appropriate levels of stewardship. Develop plans for the use of significant PHO Cash Reserves in 2011/12 and ensures appropriate ongoing use of PHO funding by date tbc in line with the planned changes in the Operating Policy Framework.			
	Evidence of monitoring.	Continue to monitor and develop baseline data for performance levels and monitor PHO performance against the PHO Performance Programme and work with PHOs to ensure appropriate performance	Improved targeting of primary care resources.	Better, sooner, more convenient services closer to people's homes. Improved health status.	Minister's Letter of Expectations

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
		levels.			
	Monitoring of number of cases transferred back to GPs.	Transfer to credentialled GPs 120 to 200 cases of skin lesions and skin cancers assessed by hospital consutants as appropriate for referral.	Reduction in numbers of patients waiting for treatment.	Sooner, more convenient minor surgery.	Minister's Letter of Expectations
	Improve clinical pathway and data collection methods to quantify and qualify the status of people living with long term conditions (respiratory focus) by June 2012.	Develop baseline data for respiratory related conditions by Aug 2011. Develop the work programme and project plan for respiratory-related conditions by Dec 2011. Establish the respiratory-related conditions workstream by Dec 2011. Identify and develop the district-wide clinical pathway metholodogies for respiratory conditions by June 2012. Explore the feasibility of telehealth options to better support rural patients with respiratory related conditions by June 2012. Set Northland performance measurements for respiratory conditons by June 2012. Develop draft clinical governance structure for respiratory related conditions by June 2012.	Early recognition and identification by clinicians of the complexity of patients' needs. Improved referral pathway and access to specialist support and input into patients' care. Improved notification capability to GP on patient admissions. Improved mechanisms for increased monitoring, evaluation and reporting.	Improved identification and referral processes to and from acute services for people living with long term conditions. Improved access to specialist services from acute services for patients living with long term conditions.	
	Referrals from generalist to Specialist Palliative Care Liaison Team to increase by 20% from BoI and Kaitaia hospitals. RHP 2.2, 2.21 - 2.23	Northland Regional Specialist Palliative Care service to recruit specialist palliative care capacity at Bay of Islands Hospital and Kaitaia Hospital to provide clinical assessment and ongoing follow-up care to clients with a life-limiting illness who would benefit from early palliative care intervention.	Specialist palliative care capacity development throughout Northland in secondary services. Capability development through training provided by specialists to generalists. Coordinated community and secondary palliative care service.	Better, sooner, more convenient services for people closer to people's homes. Confidence and trust in the health system.	Draft Specialist Palliative Care Service Specification (Cancer Control).
	Options developed.	Develop telehealth options in district hospitals for outpatient appointments at Whangarei Hospital.	Higher attendance at appointments.	Reduced need for trips to Whangarei.	NRHP improving the patient experience.

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
	Operational by Aug 2011 Operational by Oct 2011. Over 6 months during 2011/12 By June 2012	Set up outpatient telehealth room in Kaitaia. Set up paediatric telehealth clinics. Trial GP presence for referred paediatric patients. Introduction of at least 2 other specialities providing clinics.			

3.5 Clinical leadership

RHP 3.41 and implied in nearly all the other items

3.5.1 Clinical leadership in the primary sector

Clinical leadership in the primary sector is addressed within the Alliancing plans described in 3.4.

3.5.2 Clinical leadership in the NDHB Provider

Clinical networks and effective partnerships between managers and clinicians at governance level have been and will continue to be a key focus.

Partnership models that include clinical leadership operate at senior executive level, and clinicians are an integral part of the decision-making process that drives key projects within the organisation. Clinical decisions at the closest point of contact are encouraged and clinical governance mechanisms exist at various levels of the organisation, supporting better outcomes for patients.

Clinical leaders are accountable and responsible for continuously improving the quality of their services and safeguarding high standards of care.

The organisation will work to develop and identify current and future leaders. Clinical leadership forums established at NDHB over the past year for medical, nursing and allied health leaders will continue to develop their roles and will support professional development of leadership and management skills for their members.

To support the ongoing development and implementation of the regional health plan, clinical leaders from Northland, including both primary and secondary services, will participate in regional clinical networks and regional working parties and committees.

Services for older people

As part of new model of care planning to meet need, workforce capacity and capability has been identified. Specifically the workforce required to support ongoing needs assessment, intensive community rehabilitation and Gerontology Nurse Specialist (GNS) roles have been identified. The GNS has been deployed to work with 10 ARRC facilities to provide education and support for RNs.

Unregulated workforce

In March 2011 NDHB, in partnership with Te Tai Tokerau PHO, met with 23 ARRC, HBSS and DSS provider representatives to scope the workforce climate, and identify emerging issues for the unregulated workforce. There is an emphasis on increasing the number of staff attaining level 3 certification, inclusive of restorative training. During July to October 2011, a joint workforce development plan for the unregulated workforce will be developed and phased initiatives identified.

Palliative care

Additional funding has been allocated to increase the hours of the Regional Palliative Care Nurse Educator/ Advisory role in the Mid and Far North by September 2011. This is a key role working with generalist providers, including ARRC, to implement regional palliative care clinical guidelines and support RN competency in advanced clinical skills to meet palliative care demand.

3.5.3 Clinical leadership regionally

Clinical leadership has been a strong feature of the development of the Regional Health Plan (3.7 Regional planning). The RHP's Triple Aims of population health, patient experience and cost/ productivity have all required active clinical input. The RHP states that achieving them implies:

- health professionals leading the planning process
- trust and respect among health professionals supporting inter-disciplinary and inter-organisation collaboration
- multidisciplinary patient focussed teams with alignment of expertise, capabilities, availability, desired outcomes
- strong clinical governance and clear accountabilities to deliver quality healthcare
- development of leadership capability to ensure effective utilisation of scarce resources.

The RHP's three Priority Goals (first do no harm, life and years, and informed patients) have been informed by numerous workstreams, all of which have

strong clinical leadership and involvement. Clinicians will design and lead the campaigns which will form the focus of future activity for many of the workstream areas.

Input from clinicians has assisted in formulating the Regional Information Strategy, a tool that is vital to achieving improvements in service quality and patient flows. As the RHP says, "A key clinical driver in the plan is to improve the continuity of care for patients in our region across primary, secondary and tertiary care, which relies on consistent and reliable access to core clinical documents and facts for all clinicians involved in a patient's care".

In the future, the RHP promises that "clinical leaders will be given stronger mandates to shape and deliver services in partnership with management".

Accountability for delivering on the RHP will naturally rest with chief executives and chief medical officers/ advisors, but accountable to them is a Regional Clinical Governance Group which will have "oversight of the direction and implementation of the three strategic goals, as well as service planning and relevant business planning". Clinical Networks will be accountable for "implementation of the networks' priorities and tracking and realising the benefits realised out of each initiative".

Development of the Northern Region Health Plan has involved clinicians from across the region, including from NDHB (3.3.2 NDHB involvement). This pan-regional clinical involvement will continue in the future.

3.6 Health of older people

RHP 1.2, 1.21 – 1.27, 2.21, 2.22

3.6.1 Improving health and wellbeing

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
Independence for those with impairments or disability support needs. Living within our means.	Rising percentage of home based support services provided to older people who have personal care needs.	Reallocate funding to clients with personal care needs who require more complex care.	Delayed entry into ARRC. Reduce demand on low level HBSS.	Improved ability to age in place.	Regional Health Plan.. OAG report on home based support services. Minister's LoE.
Independence for those with impairments or disability support needs.	Uptake of falls reduction programmes by ARRC providers.	Implement a falls reduction programme in ARRC.	Reduced presentations for acute injury.	Reduced harm from falls.	Regional Health Plan. Minister's LoE.

3.6.2 Improving quality, monitoring and audit

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
Better terminal care planning into ARRC.	Increased number of residents with AOPs. Number of ARRC facilities using structured terminal care plans.	Education programme for selected ARRC providers supported by the Gerontology Nurse Specialist (3.5.2 Clinical leadership in the NDHB Provider).	Reduction in presentations for end-of-life care in ED.	Improved end to life.	Regional Health Plan.
Ability to monitor, benchmark and	Number of Contact Assessments and	Implement InterRai as part of the national rollout and continue to build NDHB InterRAI	Ability to benchmark nationally.	Improved access to timely services appropriate to	National InterRAI roll-out.

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
improve service quality.	MDSHC Assessments.[10]	capability through progressive staff training as part of the national rollout.	A standardised quality assessment and review process.	needs.	Minister's LoE.
Quality services from contracted NGOs. Confidence and trust in the health system.	Number of substantiated complaints. Number of moderate and high risk areas identified in routine and issues-based audits. Number of Health and Disability Commission complaints that result in a finding of breach of the code. Potentially avoidable hospitalisations (PAH) and potentially avoidable mortality (PAM). Number of ED presentations from ARRC facilities.	Apply MoH Integrated Audit Process Toolkit. Follow up and monitor providers' progress in carrying out corrective action requirements arising from routine and issues-based audits. In cases of identified poor quality of services that present risk to the health and safety of residents, NDHB will apply options that are available within the Age Related Residential Care Services Agreement. Continue to provide clinical management and Gerontology Nurse Specialist support to ARRC facilities. Apply the findings of the Office of the Auditor General's Report into Home Based Support Services.	Compliance with contracts and Health and Disability Service Standards. Reduced duplication in auditing and monitoring of certified facilities. Reduced compliance costs for providers. Reduced ED presentations from ARRC facilities and reduced avoidable hospital admissions. Fewer adverse clinical events resulting from poor quality care.	Lower potentially avoidable hospitalisations and/or mortality. Reduced ED presentations and avoidable hospital admissions. Patients and family satisfied with their care.	National ARRC Service Agreement. Minister's LoE. National Health and Disability Services Standards. NZ Health and Disability Safety Act (2001). Code of Health and Disability Services Consumer Code of Rights (1996). OAG report on home based support services. Northern Region ARRC Integrated Audit coordination and activity.

3.6.3 New and expanded services

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
Optimum quality of life for those with long term conditions	Completed annual audit of pathway.	Develop and implement pathway for older people with cognitive impairment or behavioural disorders.	Improved management and coordination of services and resources.	Access to appropriate level of care.	Regional Plan Mental Health.

[10] InterRAI Contact Assessment supports the initial intake process for agencies providing home care or palliative care and records essential information to assess whether further in-depth assessment is required. MDS HC is the minimum dataset for home care assessment.

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
(dementia).					
Independence for those with impairments or disability support needs. Living within our means.	Percentage drop in referral rate to long term HBSS.	Implement a three-month enablement programme[11] and evaluate.	Reduce demand for long term HBSS. Reduced resources per capita.	Better quality of life and health outcomes.	Regional Health Plan. HOP workstream. Minister's LoE.
Improved independence and interdependence for Maori with disabilities.	Progress against agreed project milestones.	Develop a Whanau Ora framework and service delivery model that can be applied to the funding and provision of Health of Older People services.	An integrated approach to assessment and delivery of services for Maori with disabilities.	Strengthening of whanau capabilities. Access to culturally appropriate services.	Government's Whanau Ora initiative.

3.6.4 Supporting family/ whanau

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
Independence for those with impairments or disability support needs.	Increase in referrals to SCOPE services.	Continue to align the work of the community based primary care navigators who enable primary and social interventions for at-risk older people. Continue to colocate services with MSD Community Hubs.	Avoiding entry into HBSS as a default provider. Delayed entry into ARRC.	Equitable access to SCOPE services. Maintenance of citizenship and independence.	BSMC initiative.
	Increase in the number of dedicated beds.	NDHB develops and implements a respite care plan that fully utilises available funding to improve the health and wellbeing of carers. Increase the current respite bed days from the current 3,600 (2010/11 projected) to 4,183.	Delayed entry into ARRC.	Improved access to respite care in Whangarei. Ability to remain living in their chosen place (Ageing in Place). Minimise the impact on informal carers by providing regular scheduled breaks.	Minister's LoE.

[11] A short-term programme no longer than 12 weeks which is applied following discharge from hospital and upon referral for home based support services. It involves a multidisciplinary team assessment seeking reversibility or recovery, therefore reducing the need for long term support.

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
	Completion of an evaluation.	Review effectiveness of current respite care and carer support allocation.	Cost effective allocation of carer support and respite care. Carer support funding used within national guidelines, with approved exceptions.	Improved access to a range of supports. Equitable access to support services.	Minister's LoE. Value for money initiative.
	Completion of the review. Provision of services.	Review the current available day care services in Whangarei for people with dementia and their carers with a view to increasing capacity to meet assessed need.	Possible delayed entry to ARRC services.	People stay at home longer.	Minister's LoE.

3.6.5 Supporting the aged residential care review

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
Consistent planning to meet national directives	To be determined by national processes.	Active participation in National and Regional HOP work programme and annual ARRC contract review (A21).	Alignment of national, regional and district plans and HOP activity.	Accessible, sustainable services for older people closer to their homes. Positive Ageing in Place strategies.	Minister's LoE. National HOP work programme.

3.7 Information Services

RHP 3.6, 3.61 – 3.63

Context

The Northern Region Information Systems Implementation Plan (NRISIP) outlines the programme of work required to achieve the objectives of the National IT Plan 2010 and the Regional Information Strategy 2010 -2020 for the next 3 to 5 years. Due to challenges around resourcing, complexity and governance the programme may need to be spread over a longer timeframe.

As agreed by the regional CMOs, the main clinical driver is to improve the continuity of care for patients in our region across the continuum of services through providing consistent and reliable access to core clinical documents and facts for all clinicians involved in a patient's care. This is fundamental to the Northern Region's ability to deliver on the whole-of-system approach to health service delivery which is being embedded throughout the Northern Region Health Plan.

A significant technical driver is the need to ensure that basic aspects of IS development and functioning are both resilient and comparable across the four DHBs. This will provide a platform from which all can continue to develop regional information systems in a coordinated fashion. A key business driver is the need to replace Northland's legacy systems, as identified in the Readiness Assessment produced by the National IT Board. It will likely be necessary to delay progress on some projects in some, if not all, DHBs during the period of catch-up required to establish a more uniform regional platform.

Two key processes will require active, strong leadership by senior management:

The development of regionally agreed and consistent business and clinical processes, which the regional technical information systems will underpin and enable.

The reprioritisation required within each DHB to match IS developments to available resources and to ensure that the order in which projects are undertaken takes account of crucial interdependencies and the need for regional consistency.

The Minister's Letter of Expectations requires regional plans which focus on a small number of high priorities and regionalisation of IT platforms and IT support. The 16 February 2011 letter to DHB CEOs from the Chair of the DHB Information Group and from the Director of the National Health IT Board states that each DHB will need to significantly reduce the number of local health IT projects and focus on regional clinical projects. Furthermore, replacing legacy applications must be a priority so that each region has a common and standard regional IT platform. In this context the CIOs and CMOs have identified a shortlist of key foundation projects in the table below which need to be planned, funded and implemented regionally.

Other priorities

Regional project teams will be established over the next few months to plan these programmes of work and project the necessary funding for the coming years. These programmes of work should be the key focus for regional investment and activity and should be "protected" in local DHB capital and operational expenditure prioritisation processes.

Some investment will also be possible and required in other regional projects that underpin the delivery of key clinical priorities in the short to medium term. Other regional priorities that have been identified include:

- e-referrals Phase 2
- e-discharges implemented to national standards
- e-medicines including e medicines reconciliation, community and hospital e-prescribing
- Shared Care Plan Phase 2
- e-rostering
- establishment of NRSSO including network integration, single sign-on and single service desk
- shared financial management systems
- IS support for Better Sooner More Convenient business case workstreams.

While the region will progress many other IT-enabled business and clinical projects such as e-referrals, shared care plan and e-business, these five initiatives are prioritised in the Annual Plan because they represent the priority foundations for single regional patient systems which will underpin shared care, as AP priorities they will have a focus they will not get elsewhere, and they are consistent with and supportive of the national health IT plan.

The expectation is that the size and complexity of initiatives one and two is such that the most that can be achieved in 2011/12 is agreement on the common processes. Therefore the IT project will begin preparation in 2012/13, with implementation likely in 2013/14.

We will undertake these initiatives / activities and actions	We expect these actions will support improved performance in the following ways	To deliver	Measured by	In support of system outcomes	General Manager responsible
1 Work with DHB business owners to define common regional processes, data structures, work flows and reporting that will enable the subsequent implementation of a single regional secondary care patient administration system (PAS).	Common, standard and rationalised patient administration work practices across the region.	Improved data quality (consistency of identification, event data and patient flows).	(These measures assume that a regional programme is established by July 2011 with a governance group and scope defined). By 30 Sep 11, DHB services engaged, iSoft engaged, stocktake current processes and differences, agreed future state and roadmap. By 31 March 12, agreed Patient Administration process alignment changes; capex bid submitted; agreement on preferred regional PAS supplier. By 30 June 12, High Level Project Plan and Business Case for regional roll-out of preferred PAS.	Better continuity of care. Lower cost, greater efficiency.	COO to be developed.
2 Work with DHB clinical owners to define common regional clinical processes, data structures, work flows and reporting that will enable the subsequent implementation of a single regional secondary care clinical work station (CWS).	Easy access for secondary clinicians to relevant patient clinical information which will improve quality and safety of patient care. It will also enable clinicians to work regionally	Shared information for shared patients.	(These measures assume that a regional programme is established by July 11 with a governance group and scope defined). By 30 Sep 11, DHB services engaged, Orion engaged, stocktake current processes and differences, agreed future state and roadmap. By 31 March 12, agreed clinical workstation process and configuration alignment changes; capex bid submitted. By 30 June12, high level project plan and business case for roll-out of regional CWS.	Improved patient care.	CMO to be developed.
3 Further develop the TestSafe regional clinical data repository, in particular by adding Northland DHB and improving primary care access to TestSafe (CDR) by improved ease of use and	Multiple care providers in community, primary and secondary are able to access relevant patient clinical information for shared patients.	Further support of the CWS and shared care.	By 30 June 2012, Northland DHB clinicians will have access to TestSafe. By 30 June 2012, Northland community and hospital lab results	Improved patient care.	CMO to be developed.

We will undertake these initiatives / activities and actions	We expect these actions will support improved performance in the following ways	To deliver	Measured by	In support of system outcomes	General Manager responsible
improved value of shared information.			will be available in TestSafe. >80% of discharge summaries and >80% of Meddocs outpatient letters and notes will be available in TestSafe by 30 June 2012 The number of primary clinicians (GPs, practice nurses, community pharmacists) actively using TestSafe increased from the current 350 to >700 by 30 June 2012		
4 Develop the business case for DHB prioritisation to bring the region's core IT infrastructure to the required levels of resilience, redundancy and performance to meet DHB service level expectations	Improved IT systems performance. Improving ease of use.	Robust IT systems with the required capacity.	By 31 March 12, business case submitted to 2012/13 budgeting and planning process.	Greater efficiency of IT users.	Funder to be developed.
5 Improve collection, quality, availability and sharing of population health data across DHBs and PHOs.	Create a single source of truth for regional population health information potentially supported by a shared population health intelligence team.	Better informed and consistent health planning decisions and regional resource prioritisation.	By 30 Sep 2011, 'Phase 1' regional minimum population health dataset (cardiovascular and diabetes) agreed. By 30 March 2012, high level business case and implementation plan to collect minimum regional population data set completed.	Improved health outcomes.	Funder to be developed.

3.8 NDHB's local priorities

3.8.1 Maori health

RHP Strategic Challenge

For Northland DHB, improving Maori health and reducing inequalities continue to be driving forces. NDHB has a policy of allocating at least 25% of any new demographic funding to Maori health.

The *Maori Health Plan 2011/12* is a companion document to the Annual Plan[12]. At its core is a set of performance measures for the health sector that address key needs among Maori at national, regional and local levels. These are based on the Health Targets and other quarterly indicators as well as additional indicators NDHB has added to reflect local needs (oral health, respiratory conditions, sudden infant deaths, rheumatic fever).

The foundation for the Maori Health Plan is the *Te Tai Tokerau Maori Health Strategic Plan 2008-2013*, developed jointly by Maori providers, PHOs and NDHB. It sets out a framework for improving Maori health that requires coordinated action by all public sector and territorial authority agencies in order to address not just health issues but economic prosperity, education and the environment.

As well as the Maori-specific approaches described above, Maori health and reducing inequalities are addressed throughout the Annual Plan. Section 3, which addresses NDHB's approaches to national priorities, is focused on Maori in its issues, actions, targets and approaches to monitoring. Section 4, our Statement of Forecast Service Performance (the core of the Statement of Intent), places reducing inequalities as one of our high level outcomes and targets for Maori are included in the indicators wherever possible.

Northland DHB's internal and external monitoring systems are being strengthened so that all indicators contain explicit mention of both Maori and non-Maori (at present, even among national indicators, separate reporting for Maori is not always required).

[12] Available at http://www.northlanddhb.org.nz/publications/

3.8.2 Respiratory diseases

During 2010, Northland DHB conducted a needs assessment which showed that respiratory diseases presented to health services at a rate similar to diabetes, cardiovascular disease and cancer. This led to them being added to the portfolio of long term conditions.

Since then progress has deliberately been slower because attention has been placed on developing a sound overall clinical governance structure for long term conditions, a prerequisite for making the fundamental changes necessary in the planning, delivery and monitoring of services. One of these changes will be the development of services centred around a patient rather than a disease, essential because people typically have multiple long term conditions (comorbidities) and the way services are delivered to address one such condition tends to work for another.

One of the priorities for the newly formed clinical governance structure is to review NDHB's continuum of care for people with respiratory conditions. We anticipate that the lessons learned from the development of clinical processes and monitoring systems for cancer, the most advanced workstream of the long term conditions, will have application to respiratory diseases, diabetes and cardiovascular disease.

3.8.3 Child and youth health

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
Progressive reduction in admission rates for rheumatic fever in children, especially Maori.	Annual decline in rate of child hospital admissions for rheumatic fever by ethnicity. Reduced acute rheumatic fever notifications.	Increase health literacy among parents. Increase awareness of the condition and how to manage sore throats among GPs.	Reduced hospitalisations for rheumatic fever. Reduced demand on health services. Eventual eradication of rheumatic fever in the Northland population.	Healthier children. Reduced inequalities for Maori. Improved mortality and morbidity for the Northland population especially Maori.	Not yet a NRHP priority.
Progressive reduction in SUDI rates in Northland.	Reduce SIDS notifications.	Continue to raise risks associated with SIDS through Well Child/Tamariki Ora providers and smoking cessation providers.	Reduced mortality from SUDI.	Reduced inequality for Maori. Improved life expectancy for babies.	Not yet a NRHP priority.
Reduction in the number of young women who smoke during pregnancy, especially Maori.	Increase the percentage of pregnant women accessing smoking cessation programmes through primary and secondary care services, especially Maori.	Increase smoking cessation support for lead maternity carers. Develop cessation support programme for Maori women using NRT during and after pregnancy.	Decline in the number of low birthweight babies born in Te Tai Tokerau. Decline in the number of premature births, especially among Maori. Reduced demand on SCBU. Improved child mortality rates.	Healthier babies born, especially to young Maori mothers.	Not yet a NRHP priority.
Improved wellness and health throughout life.	Improved uptake of eating 5+ fruit and vegetables per day. Improved access to physical activity. Reduction in number of children and youth in the overweight and obese categories.	HEHA, Fruit in Schools programme, health promotion nutritional messages that are age-appropriate and use appropriate forms of media. Projects to target children and youth who are most at risk (high deprivation areas, low decile schools, personal history of asthma, family history of diabetes and CVD). Improved relationships with Sport Northland, local council bodies and iwi services about access to sports, kapa haka and facilities for physical activities. Monitoring of children and youth in primary	Reduced burden on CVD and diabetes services. Reduction in ASH rates.	Improved health and nutrition for children and youth, particularly Maori.	Not yet a NRHP priority.

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
		care to identify early those children who are obese. Appropriately investigate and refer these children.			
Reduction in rates of alcohol and marijuana use in youth.	Percentage of youth smoking marijuana currently is higher than cigarettes in Northland; target is to reverse this pattern. Binge drinking and drinking-while-driving rates are reduced.	Clear health promotion messages to reverse public opinion that marijuana is healthier than cigarettes. Improved regional access to drug and alcohol counseling services for youth. Local primary care providers equipped to identify drug and alcohol risk in their local community and to appropriately manage youth, or if required, refer them to support services. Local community projects about alcohol harm reduction, eg rugby referees talking about alcohol post sporting events, and the "Is it worth it" project.	Reduced demand on adult drug and alcohol services. Reduced trauma and ED presentations around alcohol-related harm. Reduction in diagnoses of COPD and future health demand on services.	Improved knowledge about drug and alcohol effects by youth. Improved access to cessation support services.	Not yet a NRHP priority.
Improved oral health in children and youth.	Quarterly performance measures (PP10, PP11, PP12, PP13 in 9 Other performance measures) for preschoolers, primary school students and adolescents.	Well child providers encourage enrolment with Community Oral Health Services. Improved youth access to free dental services throughout Northland.	Services are well coordinated to improve access to oral health care.	Children have healthier mouths. Children learn good oral health practices at an early age.	Not yet a NRHP priority.
More stable and empowered youth.	Number of referrals from Child and Adolescent Mental Health Services (CAMHS) to an Incredible Years Programme.	Increase proportion of referrals to CAMHS with a strong behavioural component. CAMHS will actively promote the Incredible Years Programme to referrers (schools, GPs etc). Northland DHB will provide support to providers who offer the Incredible Years Programme.	Mental health services are better able to offer a range of therapeutic interventions that do not require psychopharmacology. CAMHS services in Northland can give more focus to psychopathology unrelated to behavioural issues except where behavioural programmes, including Incredible Years	More stable and empowered whanau/ families. Young people retained in school system longer. Increased self esteem among young persons. Whanau/ families better able to self-manage.	MoH expectations being met regarding Incredible Years programme.

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
			has been ineffective.		
Whanau/ families are more empowered to better manage the impacts of mental illness within a Whanau Ora context.	Develop a programme of support for the children of parents with mental illness (COPMI) by June 2012. Establish baseline data in 2011, including number of children identified from Adult Mental Health Services by ethnicity.	Audit the number of children whose parents are currently under Adult Mental Health Services including kaupapa Maori services. Determine quality indicators for 2012/13 Annual Plan.	Mental health services are able to offer an enhanced holistic model of care and support.	Improved access to mental health services. Whanau /families are more empowered to better manage the impacts of mental illness within a Whanau Ora context.	Not yet a NRHP priority.
Healthier young adults.	Annual decline in the number of young people diagnosed with sexually transmitted infections. Increase in number of referrals to community sexual health services. Increase in the number of youth accessing school based health services.	Improve access to sexual health education in schools with accurate information being offered. Improved rates of condom use among youth in 2012 to protect from STIs. Improve access to contraception and contraceptive advice in the community, for example through local pharmacies and school based health services. Ensure services that deal with sexual health are youth friendly.	Reduced demand on clinical services. Improved ability of sexual health services to address sexual infections in our youth population. Fewer presentations to ED with STIs.	Reduction in the number of young people who have experienced sexually transmitted infections. Improved fertility.	Not yet a NRHP priority.
All children are protected against preventable conditions, especially infectious diseases, gastroenteritis, skin and respiratory infections.	Decreasing Ambulatory Sensitive Hospitalisations (ASH) rates.	Support more education based comprehensive care programmes in primary care. Develop more comprehensive, multidisciplinary, team based, collaborative and patient-centric programmes in primary care. Improve access to primary health care for youth through school based clinics.	Reduction in demand for services. Less pressure on ED and inpatient services. Less pressure on Child Health Outpatient services.	Whanau/ families are more empowered to self manage and take more responsibility for their own health and wellbeing.	RHP RHP 1.4, 1.41

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
		Immunisation (3.2.4 HT4 Increased immunisation).			
Improve detection and increase referrals to CYFS and/or police for family violence and sexual abuse.	Numbers of children and youth who present to ED with non-accidental injury. Number of referrals from Ward 2, SCBU, Child Health Centre, ED and Maternity Services to CYFS. Number of youth observing and being subject to violence to reduce between the Youth'07 and planned Youth'12 health surveys. Number of children and youth experiencing sexual abuse to decline.	NDHB assessment and intervention processes are aligned to *NZ Family Violence Intervention Guidelines: Child and Partner Abuse*. Increase referrals to CYFS of children and youth suspected of being abused (see also 4.4 Output Class: Intensive Assessment and Treatment). Improved awareness in primary care of screening for violence and the process of referrals to CYFS. A multidisciplinary approach combining health promotion about sexual abuse into schools, monitoring of sexual abuse cases and how many lay formal complaints. Promotion of how rural communities can work better with DSAC and police services in Northland.	Earlier identification of at risk children and youth through appropriate screening. Earlier treatment and reduced demand on adult counseling and mental health services.	Safer, healthier children and youth.	Not yet a NRHP priority
Families of children and young people with disabilities are more informed and are able to access information and support.	100% of families receive timely and early support. 100% of families receive effective information. All interagency and liaison agreements are in place and working.	Ensure and strengthen Intersectoral collaboration. Develop disability toolkits for dissemination of information. Early identification of babies and young children with disabilities to ensure early response through recognised referral pathways. Recognise that families may require assistance to care for their child or young person through timely support and/or information. Review the recommendations from *The Health of Children and Young People with Chronic Conditions and Disabilities in*	Services are well coordinated to improve disability support to families. Upskilled staff and improved knowledge base for workforce.	Families receive streamlined responses when and as they are needed. Families are supported to maintain resilience and sustain strong family units.	Not yet a NRHP priority

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
		Northland[13]. Strengthen multidisciplinary approach combining NASC, NGO and NDHB teams to promote responsive family support. Continue to expand working relationships within health and disability sectors by expanding on levels of communication through cooperation and formal collaborative agreements. Shared responsibility within decision making.			
100% of young people with disabilities who transition from paediatric to adult health care receive continuity of health care.	Increased access to and continuation of managed and focused health care. Develop a pathway and working model for young people that identifies when and how to shift them from family-centered services to building their capacity to manage their own lives and needs.	Working model is defined through collaborative communication at service delivery level. Systems are designed to ensure that all young people are followed up. Disability services are cognisant of the impacts and effects of high health and disability needs. Review the recommendations from *The Health of Children and Young People with Chronic Conditions and Disabilities in Northland*.[14] Review current and future individuals and families where self-determination is a goal.	Consistent practice and policy to meet needs of health practitioners. Fluidity of service delivery in all areas.	Consistent practice and policy to meet needs of families. Families and young people can identify and have clearer support which assists their forward thinking about adult life. Young people will have better ability to control and self-manage their own lives. The basic needs of individuals are considered in a holistic approach and practice principles.	Not yet a NRHP priority

[13] Waikato DHB Youth Transition Standards of Care, quoted in Paediatric Society Report 2010 *Health of Children and Young People with Chronic Conditions and Disabilities in Northland*.
[14] Ibid.

3.8.4 Mental health

Early Detection and Management Output Class

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
Prevent the development of long term/ enduring mental health and alcohol and drug issues for children and youth. Early detection and treatment of first time psychosis for clients under 30 years. Improved quality of life for clients and their families/ whanau. Better, sooner, more convenient services for clients experiencing mild to moderate mental illness and/or alcohol and other drug issues.	Number of contacts by community mental health and addictions services provided by NDHB and NGOs for children and youth (0-19 years). Number of contacts for first time presentation of psychosis to community mental health services for people under 30 years. Number of contacts of youth presenting with Justice service being referred for assessment and treatment of alcohol and other drug issues. Number of referrals by Child and Adolescent Mental Health Services to parenting programmes for child and youth service users. Number of clients assessed and managed by GPs and PHOs for mental health disorders, namely depression.	Provide community based assessment and treatment services for children and youth (to include school settings). Screening, assessment and treatment provided in community setting (including schools). Provide Early Intervention Services (specialised assessment and treatment) for clients with first time presentation with psychosis. Reduce alcohol and other drugs issues experienced by youth as drivers of crime. Increase confidence in the role of parents in the management of their children and youth to contribute to positive health outcomes. Increase access of Maori youth to mental health services in the Mid North through the addition of 2 FTE child and adolescent Maori practitioners. Stepped care approach to management of depression (pilot project between NDHB and GPs in Kaitaia). GPs screen all older people (65+) with chronic diseases and disorders for depression, and then manage this disorder within primary sector. GPs screen for AOD issues within the adult population of their practice and making appropriate service referrals.	Reduced proportion of people with enduring mental illness and/or addictions. Fewer clients experiencing acute episodes.	Improved quality of life for both clients and their families/ whanau. Improved skills. Clients achieve greater stability in their condition.	Linkages with Justice Service and Ministry of Social Development to screen, assess and provide interventions for youth who present through the Justice service (Kaikohe, Pilot).

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
	Number of clients (older people) screened and managed for depression who also experience chronic disease or disorders. Number of clients screened for AOD issues by GPs and PHOs.				

Intensive Assessment and Treatment Output Class

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
Better, sooner, more convenient services for clients experiencing mild to moderate mental illness and/or alcohol and other drug issues. Enhanced integration of care across the sector. Services reflect the needs of clients within their chosen community. Enhanced service access for Maori and reduced disparities for those accessing MHA services. Clients who are	Number of clients assessed and managed by GPs and PHOs for mental health disorders, namely depression. Number of clients (older people) screened and managed for depression who also experience chronic disease or disorders. Number of clients screened for AOD issues by GPs and PHOs. Percentage of clients who access services that identify their ethnicity as Maori. Reduce the average	Stepped care approach to management of depression (a pilot project between NDHB and GPs in Kaitaia). GPs screen all older people (65+) with chronic diseases and disorders for depression, and then managing this disorder within primary sector. GPs screen for AOD issues within the adult population of their practice and making appropriate service referrals. Pilot integrated health care with the clients of Te Roopu Whitiora (Kaupapa Maori Mental Health Service) and who are registered with Te Aroha Noa Medical Centre. Pilot to address physical health and comorbidity needs and develop transfer protocols of people from specialist services to primary care where appropriate. A model of care will be finalised for child and youth, with a particular focus on clinical pathways for those who need acute care.	Stability in the management of the disability, disorder or condition. Reduced demand for acute services. Model of care is closer and more convenient to clients. Enhanced integration of care across the sector.	Model of care is closer and more convenient to clients. Reduced number of suicides in older people who have unidentified depression as one of the causal factors. Reduced waiting time for receiving AOD services. Clients discharged from the service in a timely manner.	E-therapy programme being launched and would be supportive of management of clients with depression in the primary sector.

registered with alcohol and other drug services have been seen within 3 months.	length of stay to 22 days in Mental Health Inpatient Unit. Length of time between intake into AOD services and beginning of assessment is less than 3 months.	Align alcohol and other drug (addiction) service intake, triage and duty role functions to reduce waiting list and ensure that clients are discharged from services in a timely manner.			

Rehabilitation and Support Output Class

Outcome	Measures	Actions to achieve target	Expected gains		Regional, national linkages
			For health services	For patients/ clients	
Independence for those living with the experience of mental illness and/or coexisting problems (addiction). Optimum quality of life for people with long term mental illness and/or addiction conditions. Services provided reflect the needs of clients within their chosen community. Services are aligned with the principles of better, sooner, more convenient and are delivery in the most cost effective means possible.	Average length of stay within NGO residential rehabilitation services. Average length of stay within NDHB subacute services. Percentage of clients who are transferred to acute mental health service facility. Reduce the rate of people who re-enter the service within 90 days from 10% to 3%.	Review investment in residential rehabilitation services. Develop processes to case-review clients who are admitted from subacute services or residential rehabilitation services to reduce acute admissions. Review discharge criteria and re-entry processes to ensure that discharges from community services are appropriate and timely. Establish a clear pathway for timely re-entry into the service as needed.	Improved cost efficiencies and utilisation of resources.	Recovery of people facilitated so they attain their full potential within their communities.	Participation in the National KPI (Benchmarking Forums) project with the identification of at least one project to enhance performance of service.

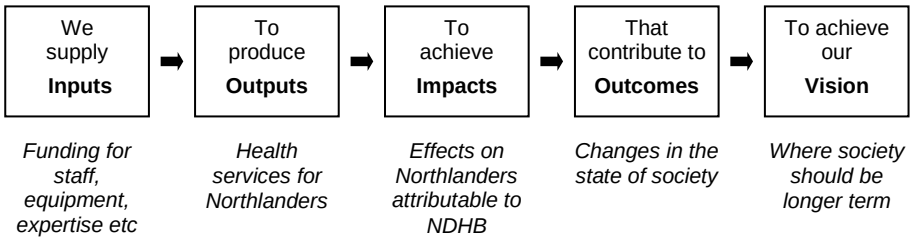
4 Statement of Forecast Service Performance

4.1 Intervention logic

4.1.1 Vision and High Level Outcomes

The core elements of Northland DHB's intervention logic are explained in Graphic 17.

Graphic 17 Northland DHB intervention logic



The highest levels are explained further in Graphic 18. To work towards our vision of creating a healthier Northland we will improve health status, improve equity, live within our means and build confidence and trust in the health system. These high level outcomes are consistent with the government's desire for the health sector to nurture citizens to live longer, healthier and more independent lives. As described in 2.2 Strategic outcomes, they are also consistent with national direction from the Minister of Health and National Health Board, and with the Northern Region Health Plan.

The services Northland DHB funds and provides collectively contribute towards our high level outcomes.

Improved health status

Encouraging healthier lifestyles, reducing risk factors such as smoking and weight gain, and promoting adoption of breastfeeding (services to achieve these are part of the Prevention Output Class, described further in the next section).

Primary care services that pick up on risk factors and identify symptoms of long term conditions such as diabetes, cardiovascular disease, addiction and depression as early as possible so they can be managed effectively (the Early Detection and Management Output Class). Also services that provide for early detection of depression and addictions.

Lifestyle control by people with long term conditions and active clinical management by health services is essential to minimise the effects of symptoms and delay disease progression as long as possible (achieved by both primary care services under the Early Detection and Management Output Class and hospital services under the Intensive Assessment and Treatment Output Class).

Managing the demands created by the increasing numbers of older people. This can be achieved by encouraging "aging in place" in the community and providing appropriate community supports for those with minor to moderate impairments and disabilities. If these work well, they will reduce and/or delay demands on residential care facilities (Intensive Assessment and Treatment Output Class; Rehabilitation and Support Output Class).

Improved equity

Reducing the gap in health status between Maori and non-Maori is a theme that runs through all the above activities. Generally, Maori experience higher rates of poor health, risky lifestyle behaviours, lower coverage by screening services, poorer access to primary care and hospital services, and they enter hospital services at a younger age. Reliable and comprehensive data by ethnicity from all services, providers and contracts is essential to monitor progress and improve service delivery. Improving cultural responsiveness is also necessary for services delivered to Maori.

Living within our means

DHBs that don't remain within budget face potential intervention from the Ministry of Health, so at a global level keeping the books balanced helps us retain control of our destiny. It is also a way of contributing to the government's aim of more effective and efficient public services.

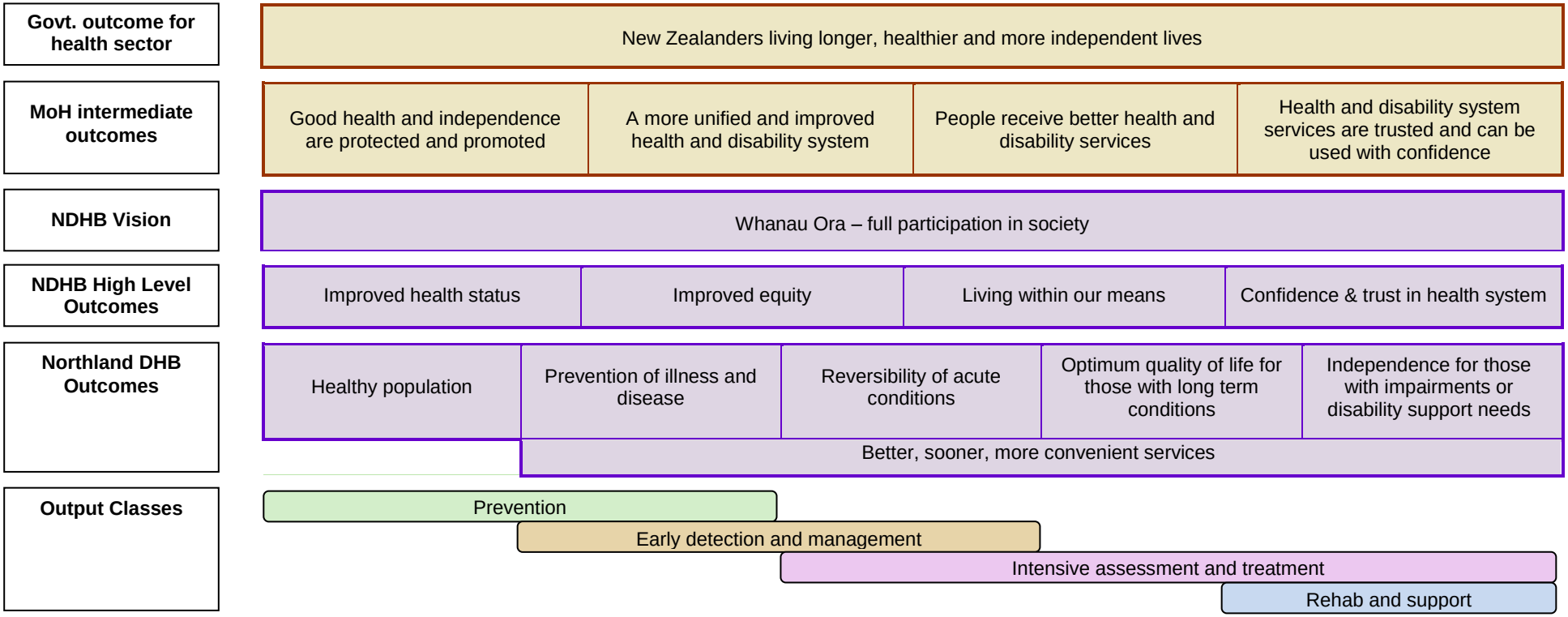
Living within our means is made easier if our population grows healthier and health services operate more effectively. We must also make continual improvements to productivity, enabling more services to be provided from the

health dollar. This is even more vital in the current constrained economic environment which will see no real increases in funding for the foreseeable future, while demands from an expanding, aging and high needs population continue to grow.

Confidence and trust in the health system

Services should be available to people when and where they need them, and be trustworthy and of high quality; these are important contributors to the governmental aim of better, sooner and more convenient services. People also need complete and accurate information so that as service users they can make informed choices and their needs are managed better. Services, especially in hospitals, must be designed to minimise harmful consequences and side effects; "first do no harm" is one of the three highest priorities of the Northern Regional Health Plan. Effective clinical leadership is an essential contributor to this (3.5 Clinical leadership).

Graphic 18 Northland DHB's Intervention Logic with links to national priorities



4.1.2 Impacts, outputs and progress

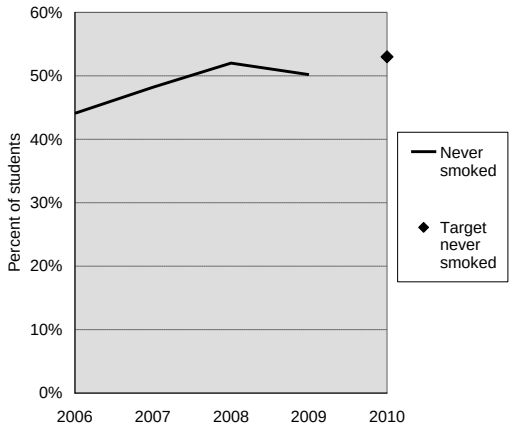
Having explained NDHB's intervention logic in relation to our High Level Outcomes in section 4.1.1, this section addresses Impacts and Outputs, the next steps down in the intervention logic hierarchy. Specifically, it describes why we have chosen this particular set of impacts, and how outputs – the services Northland DHB funds and provides – contribute to them. It also depicts trends over recent times to indicate the progress NDHB has been making.

It should also be possible to describe Northland DHB's progress by benchmarking against other DHBs, but, other than Health Targets and the Key Performance Indicator Framework for NZ Mental Health and Addiction Services, such data is not routinely available. Northland DHB is a member of the Health Roundtable in which member DHBs share information on performance and quality, but so far the tie-up between this data and the measures in the SOI is limited[15].

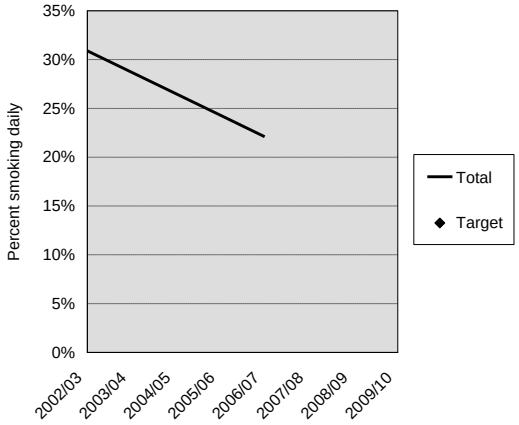
Impact	Impact measures	Rationale	Contribution made by Outputs
Tobacco: Lower prevalence of smoking-related conditions RHP 1.18	Proportion of the Northland population who smoke daily. Proportion of Year 10 students who have never smoked. Proportion of smokers in primary care given advice and help to quit. Proportion of smokers admitted to hospital given advice and help to quit.	Smoking is one of the most significant 'lifestyle factors' behind long term conditions. Smoking disproportionately affects Maori and other deprived populations. Smoking during pregnancy accounts for an estimated 20% of all pre-term births and 35% of low birthweight babies. Smoking rates are the focus of one of the six national Health Targets. Providing brief advice to smokers has been shown to increase the chance of smokers making a quit attempt. Brief advice works by triggering a quit attempt rather than by increasing the chances of success of a quit attempt. The chances of this quit attempt being successful are increased if nicotine replacement therapy or cessation support is also provided. By encouraging and supporting more smokers to make quit attempts there will be an increase in successful quit attempts, leading to a reduction in smoking rates and a reduction in the risk of the individuals contracting smoking-related diseases. This will promote and protect good health and independence.	Services to reduce tobacco smoking focus on three key areas to reduce harm: • encouraging young people to never start (youth smoking rates continue to decline in Northland) • supporting adults who want to stop (research has shown persistence to be the key, because it takes an average of 14 attempts to give up before smokers are successful) • supporting pregnant women who smoke because of the harm smoking does to the fetus.

[15] This refers to services in general, but mental health services do benchmark under the *Key performance indicator framework for New Zealand Mental Health and Addiction Services*.

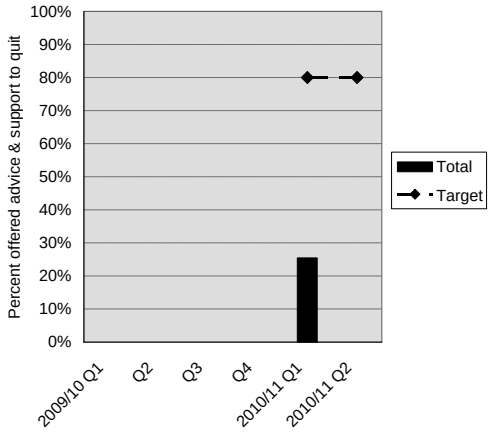
Northland Year 10 students who have never smoked[17]



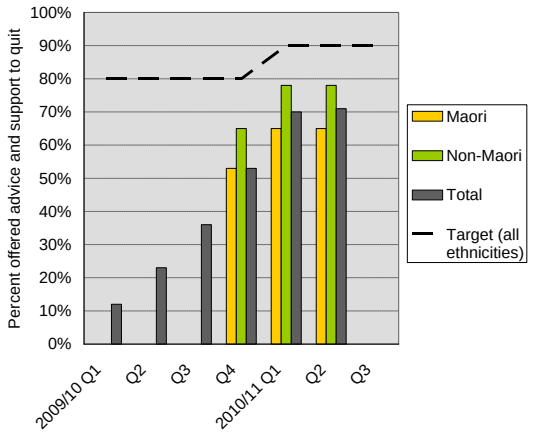
Northland population who smoke daily[16]



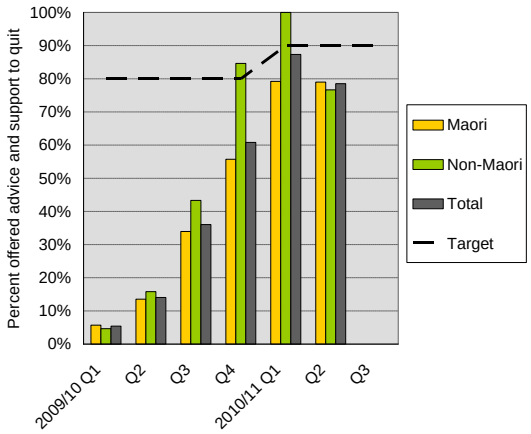
Smokers in primary care offered advice and support to quit[18]



Smokers in hospital offered advice and support to quit[19]



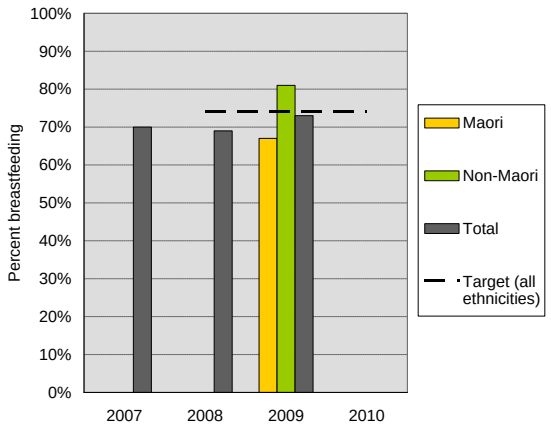
Smokers in maternity services offered advice and support to quit



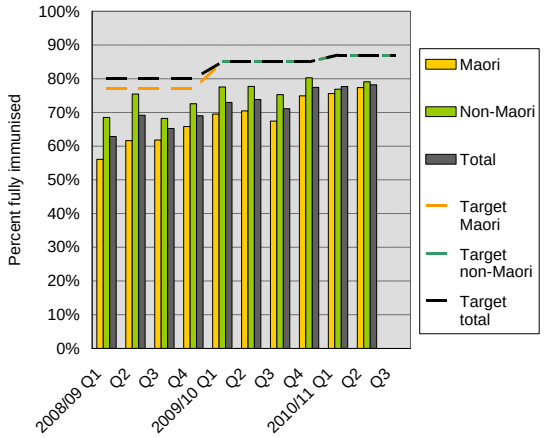
[16] Daily smokers is used rather than total smokers because the data source, the NZ Health Survey, did not report total smokers in 2002/03. Survey has been repeated in 2009/10, but data has not yet been released.
[17] 2010 results have not yet been released. NDHB target was introduced only in 2010/11.
[18] Reporting began only in 2010/11 Q1.
[19] Not reported by ethnicity until 2009/10 Q4.

Impact	Impact measures	Rationale	Contribution made by Outputs
Healthy children: Reduced likelihood of acquiring long term conditions later in life Lower incidence of communicable disease Healthier teeth and gums Safer children		Investing in the health of upcoming generations is an investment in the future health of Northlanders. A higher percentage of the child population is Maori, so improving child health will have a significant effect on improving the health of Maori.	NDHB has a Project Manager for child and youth health, who continues to support and develop responses to improve child health that are cross-sectoral (within health) and intersectoral (with agencies outside health).
	Mothers who fully and exclusively breastfeed at 6 weeks.	Higher rates of breastfeeding in infancy correlate with a lower chance later in life of developing health problems, including long term conditions. Breastfeeding rates are lower among Maori.	Mothers are provided with education and support to encourage them to breastfeed whether they are supported by an NDHB midwife (hospital births) or an independent midwife (home and hospital births).
	% of two-year-olds who are fully immunised. RHP 1.4, 1.41	Improved immunisation coverage leads directly to reduced rates of vaccine preventable (communicable) disease, and consequently better health and independence for children. This equates to longer and healthier lives. The changes required to reach the target immunisation coverage levels will lead to better health services for children, because more children will be enrolled with and visiting their primary care provider on a regular basis. Immunisations (one of the six national Health Targets) are one of the most cost-effective ways of improving health.	NDHB works with primary care providers (mostly GPs) to continue to improve the rate and timeliness of full immunisation for two-year-olds.
	Referrals to CYFS of children suspected of being abused.	Every child has the right to live in a safe, nurturing environment free from abuse and neglect.	The Family Violence Service works to increase rates of identification and reporting throughout all NDHB's services.
	Five-year-olds who are caries-free. Average number of decayed, missing or filled teeth in Year 8 students.	Oral health directly affects the state of health of the mouth, and the effects of tooth and gum disease can be lifelong. Significant rates of disease can also limit what children can eat, affect personal self-image and confidence, and create pain and discomfort. Northland has consistently had among the worst oral health statistics for children for many years.	A major restructure and expansion of NDHB's oral health services is well on its way, accompanied by increased and improved treatment facilities and staffing numbers, and significant improvements in service performance. This may mean however that oral health statistics will show a worsening in the short term as 'arrears" (previously unreached, higher need children) receive services, and better equipment detects more clinical problems than before. Northland remains unfluoridated after a brief foray into reticulated fluoridation in two Far North communities was abandoned in 2009. Northland will always struggle to reach the oral health status of DHBs with fluoridated water supplies.

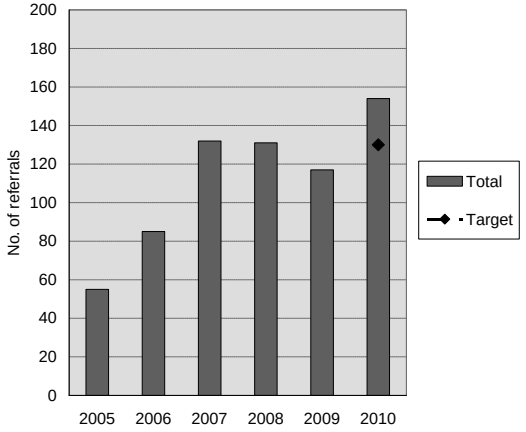
Mothers who breastfeed fully and exclusively at 6 weeks[21]



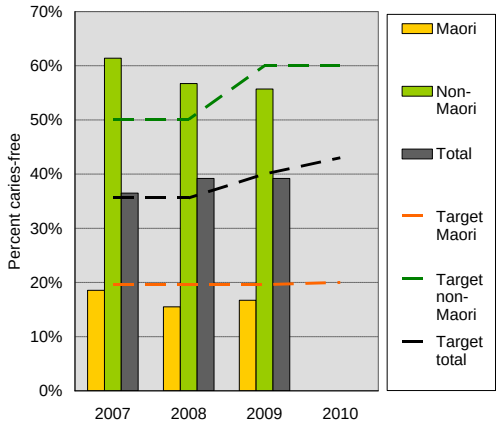
Children fully immunised by their second birthday[20]



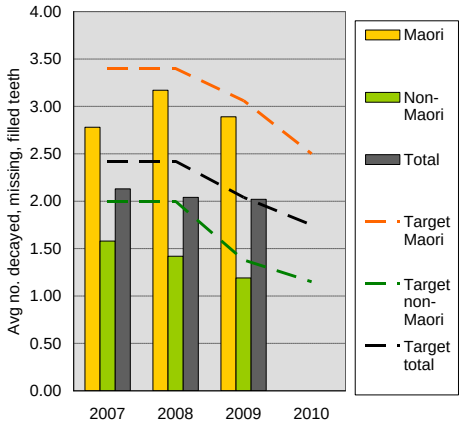
Number of referrals to CYFS by NDHB



Percent of 5-year-olds who are caries-free[22]



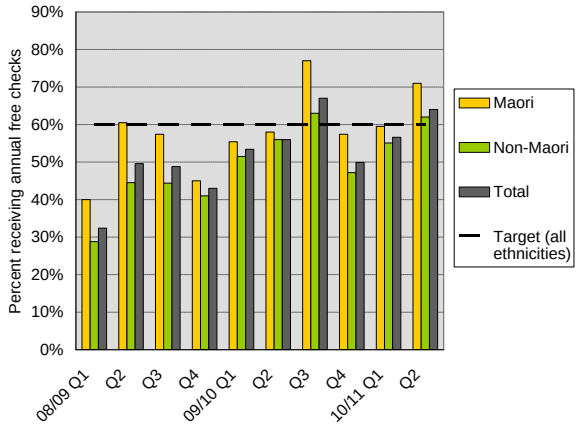
Average no. of DMF teeth in Year 8 students[23]



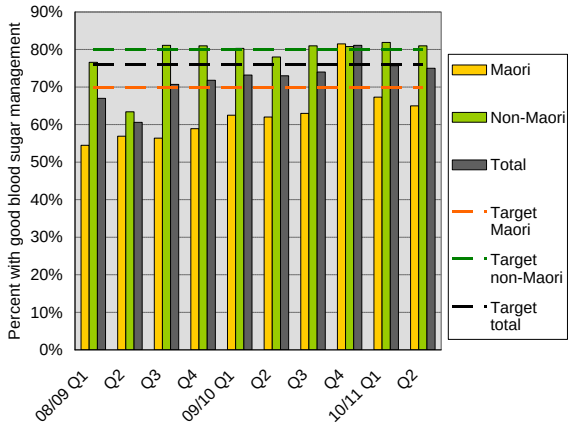
[20] Collected for the first time in 2009/10 Q1. Not reported by ethnicity until 2009/10 Q4.
[21] Indicator in 2007 was measured at 5 weeks. Reports by ethnicity not required before 2008/09.
[22] Data for 2010 will be reported in the Q3 reports (due in late April).
[23] Data for 2010 will be reported in the Q3 reports (due in late April).

Impact	Impact measures	Rationale	Contribution made by Outputs
Long term conditions: Amelioration of disease symptoms and/or delay in their onset	*Diabetes and CVD* Of those estimated to have diabetes, % who have had annual free checks. Of people with diabetes receiving annual free checks, % with good blood sugar management. Of people in eligible populations, those who have had a CVD risk assessment in the last 5 years. RHP 1.1, 1.11-1.17, 1.19	Cancer, CVD and diabetes account for about three-quarters of deaths and are major causes of illness and restricted functioning. They are "long term conditions" (LTCs), because once diagnosed, people have them for the rest of their lives. Prevalence of LTCs increases with age, so action now is imperative in the face of the aging population. Screening for diabetes and cardiovascular disease (CVD) is one of the six national Health Targets. If more people receive checks earlier and the conditions they have are managed appropriately and consistently, improved health and independence will result. This will speed up the implementation of the Primary Health Care Strategy, be consistent with the ministerial aim of better, sooner, more convenient services, and contribute to the governmental goal of New Zealanders living longer, healthier and more independent lives.	NDHB has a Programme Manager for LTCs, who is working with providers across the health sector to improve the detection and management of conditions. A three-pronged set of strategies is necessary: • preventing LTCs (see above under tobacco and breastfeeding) • screening to pick up conditions as early as possible (annual free checks for diabetes, risk assessments for cardiovascular disease, screening for breast and cervical cancer) • effectively managing conditions once they have developed through an active partnership between clinicians and patients.
	People diagnosed with cancer who receive radiation treatment within 4 weeks. People diagnosed with cancer who receive chemotherapy within 6 weeks. Breast cancer screening in eligible populations. Cervical cancer screening in eligible populations. RHP 1.3, 1.31-1.35, 2.33, 3.2, 3.21	Cancer, CVD and diabetes account for about three-quarters of deaths and are major causes of illness and restricted functioning. They are "long term conditions" (LTCs) because once diagnosed, people have them for the rest of their lives. Prevalence of LTCs increases with age, so action now is imperative in the face of the aging population. Waiting times for cancer radiation therapy is of the six national Health Targets, and there is a similar performance requirement concerning waiting times for chemotherapy.	For cancer, some of the biggest gains are to be made by ensuring early access to treatment to improve the chances of recovery or to alleviate symptoms. More timely access to radiation therapy and chemotherapy encourages public confidence and trust in the health system. It also addresses the Ministerial priority of improved hospital productivity by ensuring resources are used effectively and efficiently. It also contributes to the governmental goal of New Zealanders living longer, healthier and more independent lives. Screening in the community to identify cancers as early as possible improves the chances of prevention or, if the condition already exists, recovery. The only two formal screening programmes that exist in New Zealand are for breast and cervical cancer.

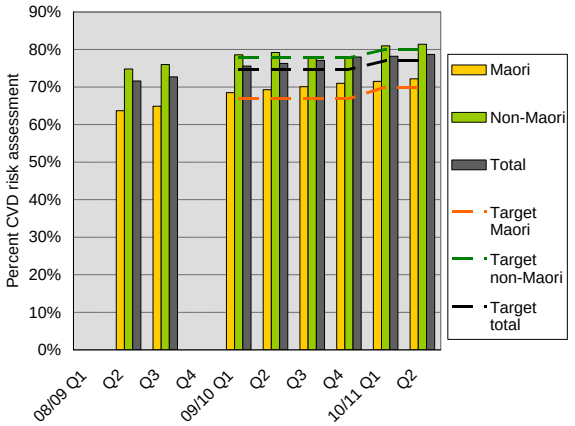
People estimated to have diabetes who have had annual free checks (AFCs)



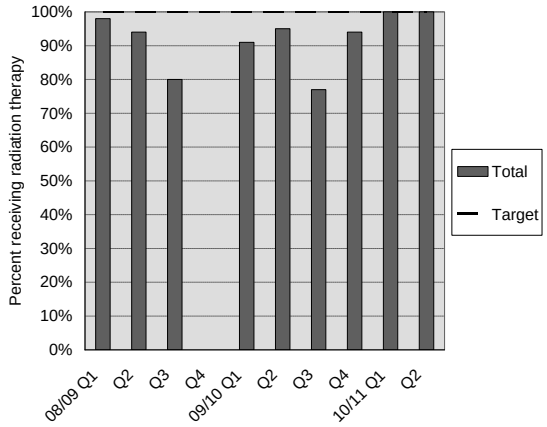
People with diabetes who have had AFCs who have good blood sugar management



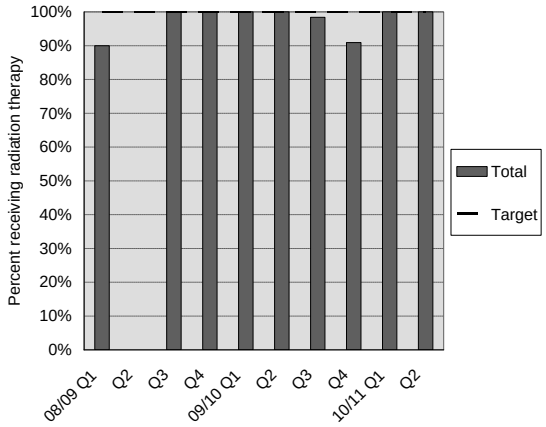
People in eligible populations[24] who have had a CVD risk assessment in the last 5 years



People diagnosed with cancer who receive radiation treatment within a specified period[25]

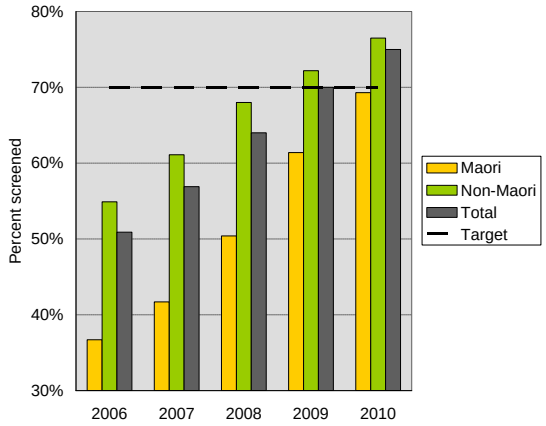


People diagnosed with cancer who receive chemotherapy within 6 weeks

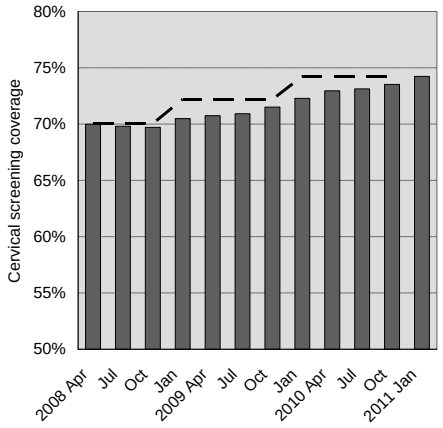


[24] Maori, Pacific, Indian: males aged 35-79, females aged 45-79. European & other: males aged 45-79, females aged 55-79.
[25] Six weeks until November 2010, four weeks from December 2010 onwards.

Breast cancer screening in eligible populations

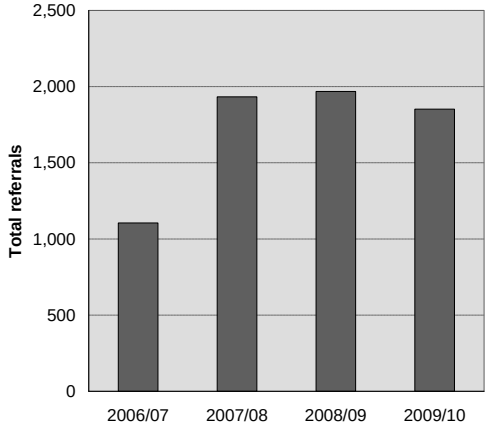


Cervical cancer screening in eligible populations

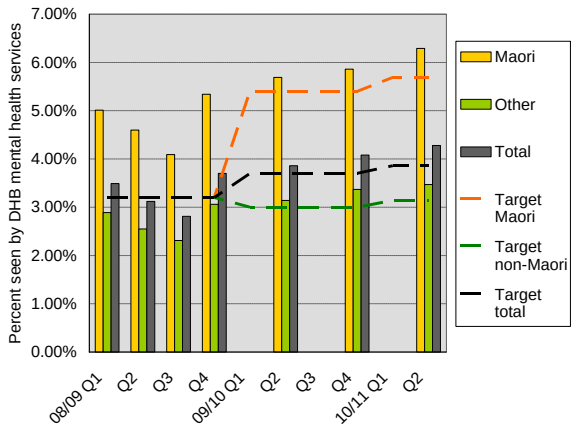


Impact	Impact measures	Rationale	Contribution made by Outputs
Mental disorders: Improved quality of life for both clients and their families Acute episodes are minimised, clients achieve greater stability in their condition	Number of referrals from GPs to Primary Mental Health Initiative Coordinators. Proportion of people with enduring mental illness aged 20-64 who are seen over a year.	Mental health has been a priority for the health sector since the Blueprint[26] was published in 1998. Severe disorders permanently affect 3% of the population. Mild to moderate disorders affect 20% of the population at any one time and 90% over a lifetime.	Severe mental disorders and addictions require support and treatment by the specialised clinical workforce employed by NDHB. Mild to moderate disorders can be dealt with largely by primary care services, with support from specialised clinical services if conditions become unstable. NDHB has implemented the Primary Mental Health Initiative since 2005, and continues to enhance the roles of specialised staff and support the primary care sector.

Number of referrals from GPs to Primary Mental Health Initiative Coordinators



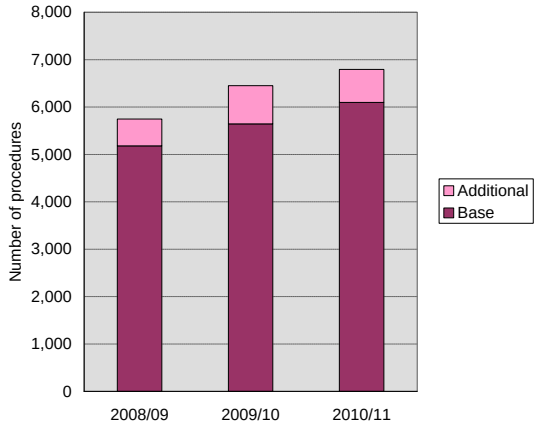
Proportion of people with enduring mental illness aged 20-64 who are seen over a year



[26] Mental Health Blueprint, the 1998 document that laid out proposed levels of services for the 3% of the population affected by severe mental disorders. Since then, funding and service provision have been gradually working towards achieving these levels.

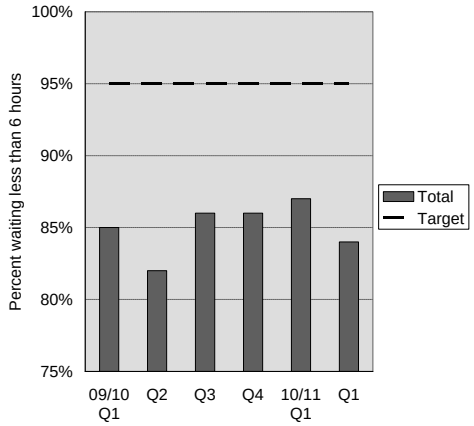
Impact	Impact measures	Rationale	Contribution made by Outputs
Elective surgery: Fewer debilitating conditions Delayed onset of long term conditions	Increased number of elective service discharges. RHP 2.3, 2.32	Elective services are an important part of the health care system for the treatment, diagnosis and management of health problems. Increasing elective surgery by an average of 4,000 discharges nationally each year will result in better access to health and disability services for New Zealanders. Timely access to elective services is considered a measure of the effectiveness of the health system. Increasing delivery will improve access and reduce waiting times will increase public confidence that the health system will meet their needs. One of the six national Health Targets. An important contributor to the Government's "better, sooner, more convenient" policy. Elective surgery is an effective way of increasing people's functioning because it remedies or improves disabling conditions.	Elective operations provided by NDHB's hospitals, about 80% of which are provided at Whangarei Hospital (and most of the rest at tertiary service providers in Auckland). Between 2008/09 and 2010/11, when the Northland population increased by about 1.5%, the number of elective operations under the Health Target increased by 18%. Hospital services traditionally give the greatest priority to those with the most acute and urgent needs, so NDHB has been making a concerted effort to consciously direct resources towards elective surgery.

Number of additional elective procedures provided



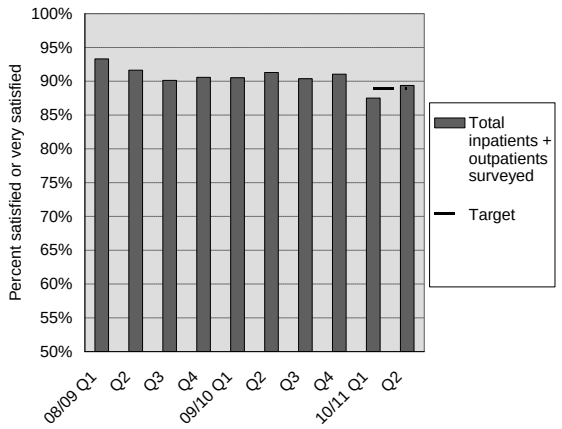
Impact	Impact measures	Rationale	Contribution made by Outputs
ED waiting times: More timely assessment, referral and treatment	Patients with an ED length of stay (time from presentation to admission, discharge or transfer) of less than 6 hours. RHP 2.3, 2.31	The purpose of emergency departments (EDs) is to provide urgent care, so by definition timeliness is important. Long times spent in waiting and receiving treatment in EDs are linked to overcrowding of ED, compromised standards of privacy and dignity for patients, and poorer clinical outcomes (such as increased mortality and longer lengths of stay for people who are transferred into hospital as inpatients). Reducing ED length of stay will improve the public's confidence in being able to access services when they need to, increasing their level of trust in health services, as well as improving the outcomes from those services. It also addresses the ministerial priority of improved hospital productivity by ensuring resources are used effectively and efficiently. One of the six national Health Targets.	Emergency services provided by EDs at Whangarei Hospital, NDHB's most specialised ED, as well as satellite services at the other three hospitals in Kaitaia, Kawakawa and Dargaville.

Patients with an ED length of stay of less than 6 hours

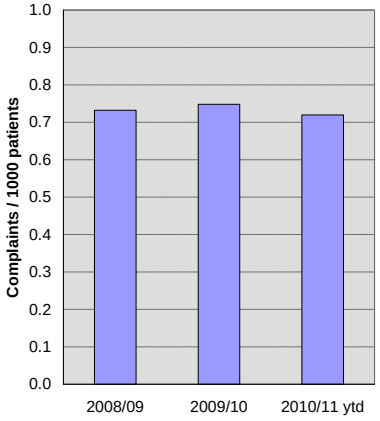


Impact	Impact measures	Rationale	Contribution made by Outputs
Quality and safety: More satisfied patients/ clients Fewer adverse clinical events	% of inpatients and outpatients surveyed who are 'satisfied' or 'very satisfied' with their treatment. Number of complaints to NDHB per patient contact. Complaints to NDHB closed within 20 working days. HDC complaints that result in a finding of breach of the Code. Surgical site infections. Hand hygiene compliance.	Quality systems enhance the nature of care experienced by patients. They also reduce risks, cut down errors, smooth flows between services, improve staff morale and minimise resource wastage, so they are an important contributor to productivity and efficiency. RHP 2.1, 2.11 – 2.16	Space does not permit a full explanation here; Northland DHB's quality systems and the contribution they make are explained in more detail in 5.1.4 Quality and safety.

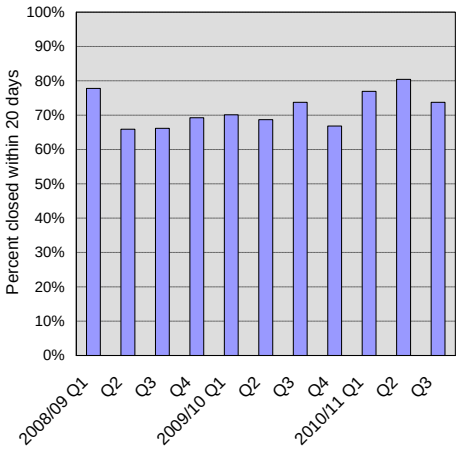
% of patients surveyed who are 'satisfied' or 'very satisfied'[27]



Number of complaints to NDHB per patient contact

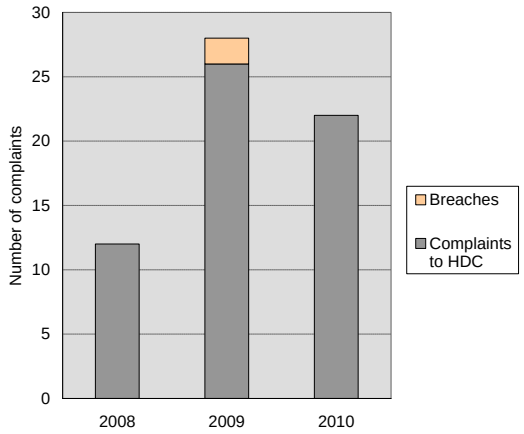


Complaints to NDHB closed within 20 working days

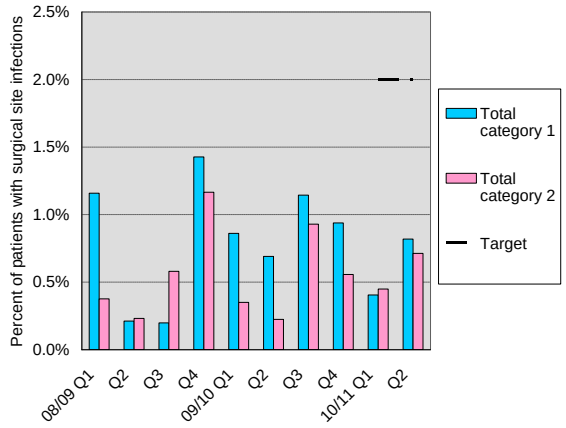


[27] Target was introduced only in 2010/11.

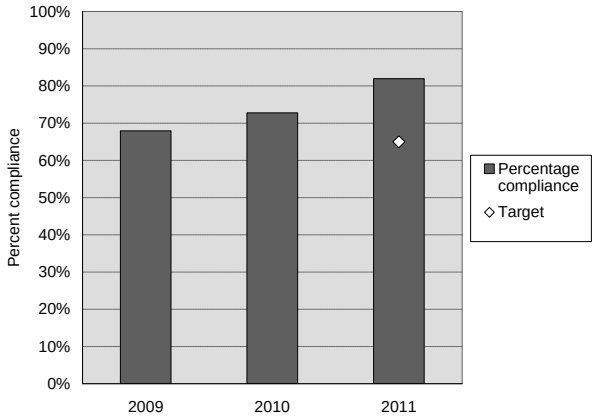
HDC complaints that result in a finding of breach of the Code[30]



Surgical site infections[28]



Hand hygiene compliance[29]



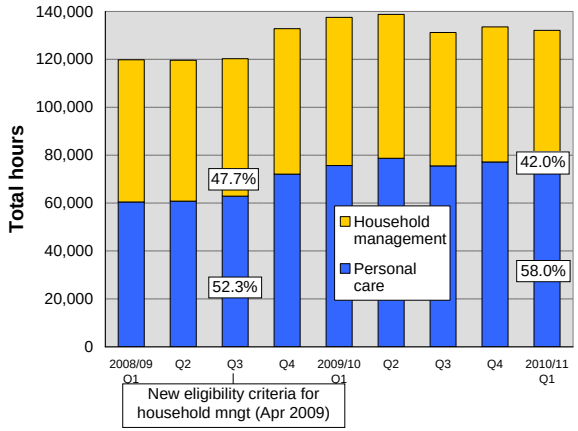
[28] Target was introduced only in 2010/11. Category 1 is "clean" surgery, typically elective surgery on a non-contaminated, non traumatic and non-inflamed site. Category 2 is "clean or contaminated" surgery in which there is a higher risk of acquiring infection because of the nature of the operation site (especially when it concerns the respiratory, gastro-intestinal or genito-urinary systems).

[29] Target did not exist until 2010/11.

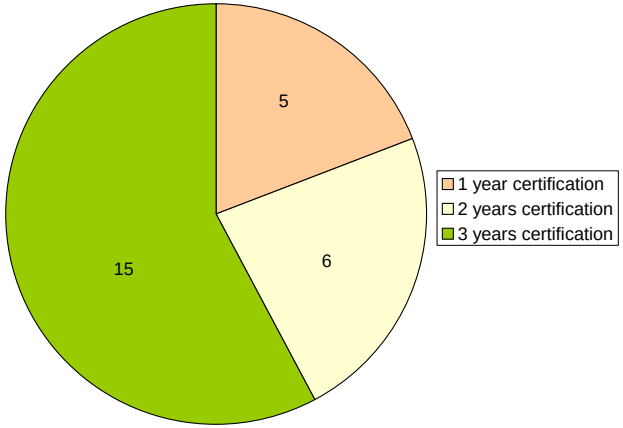
[30] *Still awaiting HDC decisions for 2 cases from 2009 and 8 cases from 2010. These complaints are only those received by the CEO of NDHB. They do not include instances where HDC has contacted services or individuals directly, because NDHB is not advised of these. The numbers graphed do not include complaints about other organisations or those for which we have been asked to supply information only.*

Impact	Impact measures	Rationale	Contribution made by Outputs
Services for older people Older people requiring support or care receive services appropriate to their needs	Rising % of home based support services provided to older people who have higher support needs. Decreased % of high- and medium-risk corrective actions arising from certification. Number of respite care bed days utilised. RHP 1.2, 1.21 – 1.27	The increasing number of older people, along with their higher level of acuity, is placing increasing pressure on home based support and residential care budgets. Home based support services are coming under growing pressure because there is an increasing number of older people receiving them (currently approximately 12% of Northland's over 65 population). This growth will be sustainable only if we allocate resources to those most in need. The period of certification for aged residential care providers reflects their risk level because recertification audits occur more frequently where issues have been identified for attention. DHB aged care contract and MoH certification audit processes have been conducted through a single audit only since August 2010. DHBs concentrate on working with providers on corrective action plans to address any matters identified though the audits, monitoring progress against the agreed corrective action plans, and managing risks that may arise. In January 2010 the Government committed funding targeted at dedicated residential respite beds for older people, which NDHB invested into four dedicated beds in the Far North. Monitoring to date has identified that the increase in actual bed day occupancy was less than expected. Reasons for this include the Far North's lower population numbers, and high turnover of clients on the managed respite programme. NDHB will review our respite care plan to show how we intend to fully utilise the funding and will provide specific target volumes. The current distribution of dedicated beds will be reviewed to reflect population need.	To improve the quality and consistency of needs assessments Northland DHB's Needs Assessment and Service Coordination service will implement the InterRAI Minimum Data Set Home Care (MDS-HC) and Contact Assessment (CA). Certification reduces the potential risk to residents arising from a provider's partial or non compliance with the Health and Disability Services Standards. Respite care increases planned access to 'time out' services for older people being cared for in the community. This improves the health and wellbeing of informal carers and enables older people to stay at home longer, thus delaying entry to long-term residential care.

Number and distribution of home based support services hours[31]



Percentage of ARRC facilities by length of certification arising from the integrated audit process[32]



Utilisation of respite care bed days

No historical data is available because the appropriate level of respite care beds for Northland is still under negotiation.

[31] A change in needs assessment processes in April 2009 should have meant an increasing amount of HBSS are being allocated to older people with higher needs. Current data systems however do not identification of the number of hours allocated by level of need. Two proxy measures are possible to demonstrate that the change is occurring: (a) there should be an increased proportion of hours allocated to personal care needs rather than home maintenance; (b) people with low numbers of home maintenance hours should form a smaller proportion of total hours.

[32] A database on this function was set up only in mid 2010, so only baseline data is available, not historical. Length of certfication is a reflection of how well the facility performed in the audits – the greater the degree of compliance with audit criteria, the longer the certification period.

4.1.3 Output Classes

Nationwide, DHBs structure all their services into four Output Classes, each of which has several Suboutput Classes. Graphic 18 at the start of section 4 indicates how these groups of services relate to different levels of health need. Graphic 12 in section 2 provides a more detailed description of types of service by Output Class and type of provider.

Prevention Output Class

Includes:

- health promotion to prevent illness
- statutorily mandated health protection services to protect the public from toxic environmental risk and communicable diseases
- population health protection services (immunisation, screening etc)
- well child services.

Preventive services are publicly funded services that address health in the whole population or identifiable sub-populations. They are distinct from treatment services (the other three Output Classes) which address health and disability dysfunction.

Preventive services affect individual behaviours by addressing population-wide physical, social and political environments that influence health and wellbeing.

Early Detection and Management Output Class

Includes:

- primary health care
- oral health
- primary community care programmes
- pharmacy services
- community referred testing and diagnostics (laboratory services)
- primary mental health services.

Early detection and management services are delivered by a range of health and allied health professionals in various private, not-for-profit and government service settings. They include general practice, community and Maori health services, pharmaceutical services, child and adolescent oral health services and primary mental health services.

These services are typically more generalist, usually available from multiple health providers and from a number of different locations within a DHB's district.

Intensive Assessment and Treatment Output Class

Includes:

- ambulatory services (including outpatient, district nursing and day services) across the range of secondary preventive, diagnostic, therapeutic, and rehabilitative services
- inpatient services (both acute and elective) including diagnostic, therapeutic and rehabilitative services
- emergency department services including triage, diagnostic and therapeutic services
- secondary mental health services
- secondary maternity services
- assessment treatment and rehabilitation.

Intensive assessment and treatment services are publicly funded, and delivered by a range of secondary, tertiary and quaternary providers (defined in Graphic 12). The bulk of them are located on or based at hospital sites and use specialist clinical expertise and equipment.

Rehabilitation and Support Output Class

Includes:

- needs assessment and service coordination (NASC)
- palliative care
- rehabilitation
- age related residential care beds
- home based support
- respite care
- day services
- life long disability services.

Rehabilitation and support services are delivered following a 'needs assessment' process and coordination input by NASC services.

4.1.4 Coverage of Sub-Output Classes

NDHB believes that the set of measures in sections 4.2 to 4.5 offer a fair representation of the breadth of services we fund and provide. They encompass all the Ministerial priorities and local priorities (section 3) and the major health issues of the Northern Region Health Plan. Since last year, we have added measures on hospital services for diabetes, and two extra measures relating to older people regarding certification and respite care.

We have deliberately not tried to cover all 23 of the Sub-Output Classes. While together they represent the totality of funded and provided services, some merit more attention because they cover a more significant proportion of our services and resources, and they are affected more by current health needs and priorities (particularly long term conditions). We were also conscious of the need to keep the number of indicators to a manageable level.

4.1.5 Appropriateness of impact measures

Impact measures describe effects on the people we serve (patients, clients, populations in the community) while output measures describe the type and amount of service provided. For some impact measures we have been forced to use output measures as proxies, because current data systems do not provide proper impact data.

Three examples will help to illustrate the point.

The impact of elective operations should be that patient functioning is improved. While this is assessed by surgeons during follow-up outpatient appointments, no hard data is collected, nor is there a tool to formally measure functioning.

For immunisations, the impact measure should be the occurrence of communicable diseases in the community, but there is currently no comprehensive and accurate data on this. It would require an information system coordinated across all health services and providers (still some time away), but even that would not capture people who become ill and recover at home without ever making contact with a health service.

For cancer treatments, a certain amount of time must elapse before clinicians can be reasonably certain the cancer will not recur. Five-year survival rates are typically used, and the proportion of people expected to survive varies according to the type of cancer. Obviously such 'proper' impact measures are inappropriate for a plan with a one (or at most three) year horizon.

This issue will be common to all DHBs, and solutions mostly lie in national or regional developments. Part of the solution may lie in including in the SFSP global impact measures for NDHB's services such as 30 day mortality rates and unplanned readmissions.

In this year's SFSP NDHB has 31 a total of impact measures, of which 19 describe quantity, 7 quality and 5 timeliness. NDHB will work on improving the balance between the three categories next year.

4.1.6 Output measures

Since last year's SOI, NDHB has added data on outputs wherever possible. Because some of the impact data is actually measuring outputs, it should suffice to cover the output data requirement, and it hasn't been repeated in the outputs column. In such cases the output measure column has been annotated with "(= IM)".

4.1.7 Planned improvements to SFSP measures

Currently our SFSP contains impact measures specific to each priority area, but NDHB recognises the need to include broader measures of the impacts of our hospital services. Measures such as unplanned readmissions and 30-day mortality for inpatients would neatly capture the overall impact of hospital services, as well as boost the number of quality measures in the SFSP.

Although life expectancy is one of our high level outcome measures, we have struggled to acquire data from external sources that is up to date and describes Northland's sub-populations. NDHB is currently working on a way of remedying this deficiency.

4.2 Output Class: Prevention

OUTPUTS				IMPACTS							OUTCOMES
We will undertake these activities	**And ensure these outputs are delivered**	**Belonging to Suboutput Class**	**Output measures**	**To lead to these impacts**	**Impact measures**						**To achieve this outcome**
					Description	**Categories**	**Baseline**	**Target**			
								2011/12	**2012/13**	**2013/14**	
Increase number of schools participating in Action on Smoking and Health Year 10 survey Target schools with high Maori enrolments Implement smokefree school project plan and pilot smokefree schools toolkit Implement Brief Intervention (EBI) training and Quit support Regulatory enforcement on tobacco sales to minors	Health promotion programmes in schools through Smokefree/ Auahi Kore	Health promotion and education	Number of health promotion programmes in schools. Total students advised during school clinics, 2010 CY 754.	*Tobacco:* lower prevalence of smoking-related conditions. RHP 1.18	Proportion of Year 10 students who have never smoked.	Total population	50.2% (2009 ASH Y10 survey)	51%	52%	53%	Healthy population
Identify populations with lower rates of breastfeeding Support midwives to encourage breastfeeding	Midwifery services by independent practitioners and hospital midwives Support by lactation consultants.	Health promotion and education	Support provided to mothers to breastfeed. Hospital annual births 2,151 2010 CY. Lactation Consultant patient contacts 1,467 Oct 2010-April 2011 (2,515 annual extrapolation).	*Healthy children:* reduced likelihood of acquiring long term conditions later in life.	Mothers who breastfeed fully and exclusively at 6 weeks.	Maori Non-Maori Total	67% 81% 73% (2009 CY)	68% 81% 74%	70% 81% 75%	71% 82% 76%	Healthy population
Coordinate the activities of immunisation	Primary care services performing immunisations.	Immunis-ations	Number of completed series of immunisations by the	*Healthy children:* lower incidence of communicable	% of two-year-olds who are fully immunised.	Maori Non-Maori Total	77% 79% 78%	95% 95% 95%	95% 95% 95%	95% 95% 95%	Healthy population

OUTPUTS				IMPACTS						OUTCOMES
We will undertake these activities	**And ensure these outputs are delivered**	**Belonging to Suboutput Class**	**Output measures**	**To lead to these impacts**	**Impact measures**					**To achieve this outcome**
					Description	**Categories**	**Baseline**	**Target**		
								2011/12	**2012/13**	**2013/14**	
providers through the Immunisation Steering Group Actively support providers via the Regional NIR[33] Coordinator			second birthday. 5,840 children immunised before their 2nd birthday, 2010 CY	disease.[34] RHP 1.4, 1.41			(2010/11 Q2)				
Cancer groups and pathways –	Cancer risk assessments in primary care. Screening for breast and cervical cancers.	Community referred testing and diagnostics	Breast cancer screening in eligible populations. Northland women screened, average 2008/09 and 2009/10: ages 45-69 10,109, ages 50-69 7,766[35]	*Cancer:* if curable, increased likelihood of survival; if incurable, reduced severity of symptoms. RHP 1.3, 1.31-1.35, 2.33, 3.2, 3.21	Breast cancer screening in eligible populations.[36]	Maori Non-Maori Total	67.5% 70.5% 70.4% (2008/09-2009/10)	70%	70%	70%	Prevention of illness and disease Optimum quality of life for those with long term conditions
			Cervical cancer screening in eligible populations (= IM).		Cervical cancer screening in eligible populations.	Total	74% (women smeared Oct 2007-Sep 2010)[37]	75%	76%	77%	

[33] National Immunisation Register.
[34] A better impact measure would be the incidence of communicable disease in the population, but this data is not readily available.
[35] An unusually high number of screens was done in 2009/10, so two years have been averaged to provide a more representative number. Two age groups are reported because screens are performed on 45-69 year olds, but MoH requires reports only on 50-69 year olds.
[36] The targets apply over two years, since that is the frequency with which women in the target age group should be screened. The achievement for targets may be variable yearly but meet the 2 year target of 70% set by the National Screening Unit.
[37] Data covers three years because this is the recommended frequency for cervical cancer screening.

4.3 Output Class: Early Detection and Management

OUTPUTS				IMPACTS							OUTCOMES
We will undertake these activities	**And ensure these outputs are delivered**	**Belonging to Suboutput Class**	**Output measures**	**To lead to these impacts**	**Impact measures**						**To achieve this outcome**
					Description	**Categories**	**Baseline**	**Target**			
								2011/12	**2012/13**	**2013/14**	
Implement the Tupeka Kore (Smokefree) Plan ↑ funding for smoking cessation programmes, including Advice, Brief intervention, Cessation (ABC). Support Quit Card providers	Advice and help offered to smokers in primary care to quit.	Primary health care	Percentage of smokers in primary care offered advice and help to quit (= IM). Quit Card[38] providers: 466 registered as at March 2011.	*Tobacco:* lower prevalence of smoking-related conditions. RHP 1.18	Proportion of the Northland population who smoke daily.	Maori Non-Maori Total	47.8 18.7 22.1 (2006/07 NZ Health Survey)	46.5% 18.5% 21.5%	46% 18% 21%	45.5% 17.5% 20.5%	Prevention of illness and disease
					Proportion of smokers in primary care provided with advice and help to quit.[39]	Total population	[40]25% (PHO performance programme Sep 2010/)	90%	95%	95%	
Expand oral health services throughout Northland using the "hub and spoke" model of service delivery Target services to areas and populations with high needs Provide health promotion services to encourage good oral health	Oral health assessment and treatment.	Oral health	5,460 preschool and 17,903 primary school children enrolled in DHB-funded oral health services.	*Healthy children:* healthier teeth and gums.	Five-year-olds who are caries-free.	Maori Non-Maori Total	17% 56% 39%	21% 61% 44%	21% 61% 44%	21% 61% 44%	Prevention of illness and disease
					Average number of decayed, missing or filled teeth among Year 8 students.	Maori Non-Maori Total	2.89 1.19 2.02 (2009 CY)	2.50 1.15 1.80	2.50 1.15 1.802.09	2.50 1.15 1.802.09	
Oversee the Local Diabetes Team contract to plan and coordinate services	Risk assessments in primary care (annual free checks, blood tests, risk profiles).	Primary health care Community referred	Risk assessments performed (=IM).	*Diabetes and CVD:* amelioration of disease symptoms and/or delay in their	Of those estimated to have diabetes, % who have had annual free checks.	Maori Non-Maori Total	71% 61% 64% (2010/11 Q2)	80% 80% 80%	81% 81% 81%	82% 82% 82%	Optimum quality of life for those with long term

[38] Quit Cards are exchange cards for subsidised nicotine patches, gum and lozenges for people wanting to quit smoking. They are made available through the Quit Group and distributed through trained Quit Care providers. This may be health professionals or other staff who have direct contact with people who smoke.

[39] A better impact measure would be the proportion of smokers trying to quit, but this was not included when the Health Target was set up. The output measure is being used as a proxy in the interim.

[40] This has only been a requirement under the PHO Performance Programme for a few months, and then for information only. Early indications are that the figure is rising month by month and it is expected that significant progress will be made during 2011/12.

OUTPUTS				IMPACTS						OUTCOMES
We will undertake these activities	**And ensure these outputs are delivered**	**Belonging to Suboutput Class**	**Output measures**	**To lead to these impacts**	**Impact measures**					**To achieve this outcome**
					Description	**Categories**	**Baseline**	**Target**		
								2011/12	**2012/13**	**2013/14**	
Establish a Northland-wide Clinical Governance framework	Laboratory tests.	testing and diagnostics		onset. RHP 1.1, 1.11-1.17, 1.19	Of people with diabetes receiving annual free checks, % with good blood sugar management.	Maori Non-Maori Total	65% 80% 75% (2010/11 Q2)	80% 80% 80%	81% 81% 81%	81% 81% 81%	conditions
					Of people in eligible populations, those who have had a CVD risk assessment in the last 5 years.	M, P, I[41] E & other[42] Total	72% 81% 78% (2010/11 Q2)	75% 80% 79%	75% 80% 79%	75% 80% 79%	
Fund PHOs to provide services for people with mild to moderate mental disorders	Care provided in a primary care setting for people with mild to moderate disorders whose condition is stable.	Primary health care	Number of referrals from GPs to Primary Mental Health Initiative Coordinators: 2007/08 1,933 2008/09 1,968 2009/10 1,852	*Mental disorders:* improved quality of life for both clients and their families; acute episodes are minimised, clients achieve greater stability in their condition.	Number of referrals from GPs to Primary Mental Health Initiative Coordinators.[43]	Total	1,852	[44]1,852	1,852	1,852	Reversal of acute conditions

[41] Maori, Pacific, Indian: males aged 35-79, females aged 45-79.
[42] European & other: males aged 45-79, females aged 55-79.
[43] Used as a proxy impact measure in lieu of readily available data on the state of health of people with mild to moderate mental conditions who attend primary health care.
[44] No increases are planned in the number of people treated because the funding has now been capped. Emphasis will shift to: (a) improving the quality of the service through new treatment tools, closer monitoring of outcomes etc; (b) targeting services to people with higher acuity.

4.4 Output Class: Intensive Assessment and Treatment

OUTPUTS				IMPACTS						OUTCOMES
We will undertake these activities	**And ensure these outputs are delivered**	**Belonging to Suboutput Class**	**Output measures**	**To lead to these impacts**	**Impact measures**					**To achieve this outcome**
					Description	**Categories**	**Baseline**	**Target**		
								2011/12	**2012/13**	**2013/14**	
Services to support smokers in hospital Targeted smoking cessation services for pregnant women	Advice and help given to smokers in hospital to quit.	Acute services	Number of smokers in hospital who are offered advice and help to quit. 5,466 smokers admitted to NDHB hospitals 2009/10.	*Tobacco:* lower prevalence of smoking-related conditions. RHP 1.18	Proportion of the population who smoke daily.	Maori Non-Maori Total	47.8 18.7 22.1 (2006/07 NZ Health Survey)	46.8 17.7 21.1	45.8 16.7 20.1	44.8 15.7 19.1	Healthy population Prevention of illness and disease
					Percent of smokers admitted to hospital given advice and help to quit.[45]	Maori Non-Maori Total	65% 78% 71% (2010/11 Q2)	95%	95%	95%	
Provide a Child Protection Service Maintain close links with CYFS and Police	Identification of at-risk children through appropriate screening	Acute services	Referrals to CYFS of children suspected of being abused (=IM).	*Healthy children:* safer children	Referrals to CYFS of children suspected of being abused.[46]	Total population	154 (CY 2010)	170	180	190	Prevention of illness and disease
Provide emergency department, inpatient and outpatient services for people with acute needs Fund Auckland DHB for those who need tertiary care Educate people with long term conditions about staying healthy	Specialist Diabetes Service	Acute services	(= IM)	*Long term conditions:* amelioration of disease symptoms and/or delay in their onset	2% increase in the number of referrals [47]	Maori Non-Maori Total	N/a[48]	n/a	n/a	n/a	Optimum quality of life for those with long term conditions
Provide emergency	Provision of cancer	Acute	Number of radiation	*Cancer:* if curable,	People diagnosed	Maori	100%	100%	100%	100%	Optimum

[45] A better impact measure would be the proportion of smokers trying to quit, but this was not included when the Health Target was set up. The output measure is being used as a proxy in the interim.
[46] This repeats the output measure because referral to CYFS is the extent of the impact health services can have on suspected victims of abuse.
[47] The impact measure should really be the state of health of people with long term conditions who attend primary care, but this is not easily measurable. Reduced demand on hospital services, an output measure, is used as a proxy because it implies that primary care has been effective.
[48] Baseline data will be developed as part of investigation and improving the identification of long term conditions.

OUTPUTS				IMPACTS						OUTCOMES
We will undertake these activities	**And ensure these outputs are delivered**	**Belonging to Suboutput Class**	**Output measures**	**To lead to these impacts**	**Impact measures**					**To achieve this outcome**
					Description	**Categories**	**Baseline**	**Target**		
								2011/12	**2012/13**	**2013/14**	
department, inpatient and outpatient services for people with acute needs Fund Auckland DHB for those who need tertiary care Maintain and improve links with primary care and palliative care	therapies	services	therapy treatments (= IM). Number of chemotherapy treatments (= IM).	increased likelihood of survival; if incurable, reduced severity of symptoms.[49] RHP 1.3, 1.31-1.35, 2.33, 3.2, 3.21	with cancer who receive radiation treatment within 4 weeks. People diagnosed with cancer who receive chemotherapy within 4 weeks.	Non-Maori Total Maori Non-Maori Total	100% 100% (2010/11 Q2) 100% 100% 100% (2010/11 Q2)	100% 100% 100% 100% 100%	100% 100% 100% 100% 100%	100% 100% 100% 100% 100%	quality of life for those with long term conditions
Provide community mental health services Ensure people with enduring mental conditions have appropriate support in the community Provide inpatient care when people experience acute phases	Specialised clinical support by NDHB community mental health services. Admission to hospital for those whose condition is unstable.	Mental health	Number of contacts by community mental health services with people who have enduring mental illness[50]: Direct 76,646 Care coord'n 52,069 (2010/11 extrapolated from 10 months data)	*Mental disorders:* improved quality of life for both clients and their families; acute episodes are minimised, clients achieve greater stability in their condition.	Proportion of people with enduring mental illness aged 20-64 who are seen over a year.	Maori Non-Maori Total	5.69% 3.47% 4.28% (2010/11 Q2)	6.29% 3.47% 4.28%	6.29% 3.47% 4.28%	6.29% 3.47% 4.28%	Independence for those with impairments or disability support needs Optimum quality of life for those with long term conditions
Provide elective surgical services Fund Auckland DHB for those who need tertiary care	Elective surgical procedures.	Elective services	Number of additional elective procedures (no standard number because it is negotiated each year with MoH).	*Elective surgery:* fewer debilitating conditions; delayed onset of long term conditions. RHP 2.3, 2.32	Increase in the number of elective services discharges	Base Additional Total	6,098 (2010/11 forecast)	6,198	[51]6,398	6,598	Reversal of acute conditions Better, sooner, more convenient services
Provide emergency department services in all four NDHB	Assessments, treatments and referrals performed in	Acute services	Emergency department attendances:	*ED waiting times:* more timely assessment, referral	Patients with an ED length of stay (time from presentation	Total	84%	95%	95%	95%	Reversal of acute conditions

[49] A better impact measure would be: for breast cancer, cervical cancer and major cancers: new cases, survival rates and deaths. Data systems are not yet set up to generate this information promptly enough for timely monitoring, so the output measures are being used as proxies in the interim.

[50] Direct = directly with client and/or whanau; care coordination = on behalf of client, with another agency.

[51] These targets assume past patterns of increase will continue, but are estimates only because actual targets are set by MoH each year according to their methodology and assumptions.

OUTPUTS				IMPACTS						OUTCOMES
We will undertake these activities	**And ensure these outputs are delivered**	**Belonging to Suboutput Class**	**Output measures**	**To lead to these impacts**	**Impact measures**					**To achieve this outcome**
					Description	**Categories**	**Baseline**	**Target**		
								2011/12	**2012/13**	**2013/14**	
hospitals	EDs.		2009/10 40072 2010/11 40956 (10 months extrapolated)	and treatment. RHP 2.3, 2.31	to admission, discharge or transfer) of less than 6 hours.						Optimum quality of life for those with long term conditions Better, sooner, more convenient services
Operate the Quality Resource Unit	Leadership advice and monitoring by the Chief Medical Advisor and Quality Resource Unit	Acute services Elective services	Measures of quality and safety of services.	*Quality and safety:* more satisfied patients.							Confidence and trust in the health system Better, sooner, more convenient services Living within our means
			Questionnaires distributed Jul-Dec 2010 3,592, returned 1.123.[52]	**RHP 2.1, 2.11 – 2.16**	Percentage of inpatients and outpatients surveyed who are 'satisfied' or 'very satisfied' with their treatment.	Total	88.5% (average for 2010/11 Q1, Q2)	89%	90%	91%	
			Total inpts + daypts + outpts: 2008/09 147,544 2009/10 172,421		Number of complaints to NDHB per patient contact	Total population	1.2%	1.2%	1.1%	1.0%	
			As above		Complaints to NDHB closed within 20 working days	Total population	81%	82%	83%	84%	
			22 complaints to HDC 2010 CY.		HDC complaints that result in a finding of breach of the Code.	Total population	8% (CY 2009)	7%	6%	5%	
			Total operations: 2008/09 9,887 2009/10 9,379 2010/11 4,925 (6 mth)	Fewer adverse clinical events	Surgical site infections.	Total	<2%	[53]<2%	<2%	<2%	

[52] Measure was introduced to quarterly reporting in July 2010 and dropped after Dec 2010.
[53] Less than 2% is recognised as the "gold standard" for this indicator. NDHB's rate has been consistently under this for some time.

OUTPUTS				IMPACTS						OUTCOMES
We will undertake these activities	And ensure these outputs are delivered	Belonging to Suboutput Class	Output measures	To lead to these impacts	Impact measures					To achieve this outcome
					Description	Categories	Baseline	Target		
								2011/12	2012/13	2013/14
			1,854 events observed 2010 CY.		Hand hygiene compliance.	Total	60%	70%	75%	78%

4.5 Output Class: Rehabilitation and Support

OUTPUTS				IMPACTS							OUTCOMES
We will undertake these activities	**And ensure these outputs are delivered**	**Belonging to Suboutput Class**	**Output measures**	**To lead to these impacts**	**Impact measures**						**To achieve this outcome**
					Description	**Categories**	**Baseline**	**Target**			
								2011/12	**2012/13**	**2013/14**	
Fund providers of residential care and home based support services (HBSS) Reassess all recipients of HBSS over time	Home based support services provided by NGOs. Residential care provided by NGOs.	NDHB's NASC[54] service. Needs assessment and service coordination	Hours funded for home based support services: 217,026 (41.0%) home maintenance, 312,862 (59.0%) personal cares (2010/11 forecast). 500 reassessments by NDHB's NASC service of people receiving household management only who have not been assessed since April 2009.	*Support for older people:* older people requiring support or care receive services appropriate to their needs. RHP 1,2, 1.21	Rising % of home based support services provided to older people who have higher support needs.[55]	Household mngt Personal care (hours paid)	42% 58% (CY 2009/10)	41% 59%	40% 60%	39% 61%	Independence for those with impairments or disability support needs Optimum quality of life for those with long term conditions
Certification of age-related residential care (ARRC) facilities under Health and Disability Sector Standards.	Work with providers on corrective action plans resulting from audits.	Age related residential care beds.	26 ARRC facilities had certification audits conducted Oct 2010-May 2011[56].		Decreasing percentage of high and medium risk corrective actions arising from certification.	Percentage of ARRC services with 3 year certification	58%	65%	69%	73%	
Contracting of respite care beds.	Respite care services	Respite care.	Number of respite care bed days occupied 3,600 (extrapolated based on 6 months data 2010/11).		Number of respite care bed days utilised	Respite care bed days occupied	[57]4,183	4,183	4,18s	4,183	

[54] For a definition, see Graphic 12, note (e).
[55] IT systems at the moment cannot produce data on the number of HBSS hours provided according to different levels of need. In the absence of an IT system to correlate assessed level of need with number of hours of HBSS paid, we have used proxy measures of total number of hours paid for personal cares and the percentage share of total hours paid for personal cares.
[56] A database on this function was set up only in mid 2010, so only baseline data is available, not historical.
[57] Total potential bed days 2010/11 based on available funding divided by cost per bed day. Future bed days are yet to be negotiated, so the baseline is repeated in the targets as the minimum level of service to be maintained.

Graphic 19 Summary of Northland DHB's Statement of Service Performance

Vision	Creating a healthier Northland								
High Level Outcomes	Improved health status		Improved equity		Living within our means		Confidence and trust in the health system		
High Level Measures	↑ life expectancy for the Northland population		↓ mortality rate (age-standardised)		↓ infant mortality		↓ gaps between: (a) Maori and non-Maori (b) Northland and NZ		
Outcomes	Healthy population		Prevention of illness and disease		Reversal of acute conditions	Optimum quality of life for those with long term conditions	Independence for those with impairments or disability support needs	Better, sooner, more convenient services	
Impacts	**Tobacco** Lower prevalence of smoking-related conditions.	**Healthy children** Reduced likelihood of acquiring long term conditions later in life. Lower incidence of communicable disease. Healthier teeth and gums. Safer children.	**Long term conditions** Amelioration of disease symptoms and/or delay in their onset.	**Cancer** If curable, increased likelihood of survival. If incurable, reduced severity of symptoms.	**Mental disorders** Improved quality of life for both clients and their families. Acute episodes are minimised, clients achieve greater stability in their condition.	**Elective surgery** Fewer debilitating conditions. Delayed onset of long term conditions.	**ED waiting times** More timely assessment, referral and treatment.	**Quality and safety** More satisfied patients. Fewer adverse clinical events.	**Support for older people** Older people requiring support or care receive services appropriate to their needs.
Impact Measures Health Targets Main Measures	% of the population who smoke daily. % of Year 10 students who have never smoked. % of smokers in primary care given advice and help to quit. % of smokers admitted to hospital given advice and help to quit.	Mothers who breastfeed fully and exclusively at 6 weeks. % of two-year-olds who are fully immunised. Five-year-olds who are caries-free. Average number of decayed, missing or filled teeth in Year 8 students. Referrals to CYFS of children suspected of being abused.	Of those estimated to have diabetes, % who have had annual free checks. Of people with diabetes receiving annual free checks, % with good blood sugar management. Of people in eligible populations, those who have had a CVD risk assessment in the last 5 years. % increase in the number of specialist diabetes referrals.	Breast cancer screening in eligible populations. Cervical cancer screening in eligible populations. People diagnosed with cancer who receive radiation treatment within 4 weeks. People diagnosed with cancer who receive chemotherapy within 4 weeks.	Number of referrals from GPs to Primary Mental Health Initiative Coordinators. % of people with enduring mental illness aged 20-64 who are seen over a year.	Increase in the number of elective service discharges.	Patients with an ED length of stay of less than 6 hours.	% of patients surveyed who are 'satisfied' or 'very satisfied'. Number of complaints to NDHB per patient contact. Complaints to NDHB closed within 20 working days. HDC complaints that result in a finding of breach of the Code. Surgical site infections. Hand hygiene compliance.	Rising % of home based support services provided to older people who have higher support needs. Decreasing percentage of high and medium risk corrective actions arising from certification. Number of respite care bed days utilised.
Output Classes	Prevention		Early detection and management		Intensive assessment and treatment			Rehabilitation and support	
Outputs	Health promotion programmes in schools through Smokefree/ Auahi Kore. Advice and help for smokers in primary care to quit. Advice and help for smokers in hospital to quit.	Midwifery services by independent practitioners and hospital midwives. Support by lactation consultants Primary care services performing immunisations. Oral health assessment and treatment. Identification of at-risk children through appropriate screening.	Risk assessments in primary care (annual free checks, blood tests, risk profiles). Laboratory tests.	Cancer risk assessments in primary care. Screening for breast and cervical cancers. Provision of cancer therapies.	Care provided in a primary care setting for people with mild to moderate disorders whose condition is stable. Specialised clinical support by NDHB community mental health services. Admission to hospital for those whose condition is unstable.	Elective surgical procedures.	Assessments, treatments and referrals performed in EDs.	Leadership, advice and monitoring by the Chief Medical Advisor and Quality Resource Unit.	Home based support services provided by NGOs. Residential care provided by NGOs. Work with providers on corrective action plans resulting from audit. Respite care services.
Output Measures	Health promotion programmes in schools. Advice and help offered to smokers in primary care. Quit Card Providers. Advice and help offered to smokers in hospital.	Support provided to mothers to breastfeed. Completed series of immunisations performed by the second birthday. Completed oral health treatments for five-year-olds and Year 8 students. Referrals to CYFS of children suspected of being abused. AUT Family Violence Audit score.	Number of risk assessments performed on people with diabetes and/or CVD. Number of laboratory tests on people with diabetes.% increase in the number of specialist diabetes referrals.	Breast cancer screening in eligible populations. Cervical cancer screening in eligible populations. Number of radiation treatments provided. Number of chemotherapy treatments provided.	Number of referrals from GPs to Primary Mental Health Initiative Coordinators. Number of contacts by community mental health workers with people who have enduring mental illness.	Number of additional elective procedures provided.	Emergency department attendances.	Measures of the quality and safety of services.	Assessments by NDHB's NASC service. Number of certification audits. Number of respite care bed days utilised

5 Stewardship

5.1 Monitoring of performance

The performance of Northland DHB is assessed on both financial and non-financial measures.

NDHB publishes our annual forecasts of the coming year's finances in the Annual Plan and we report progress monthly to the National Health Board.

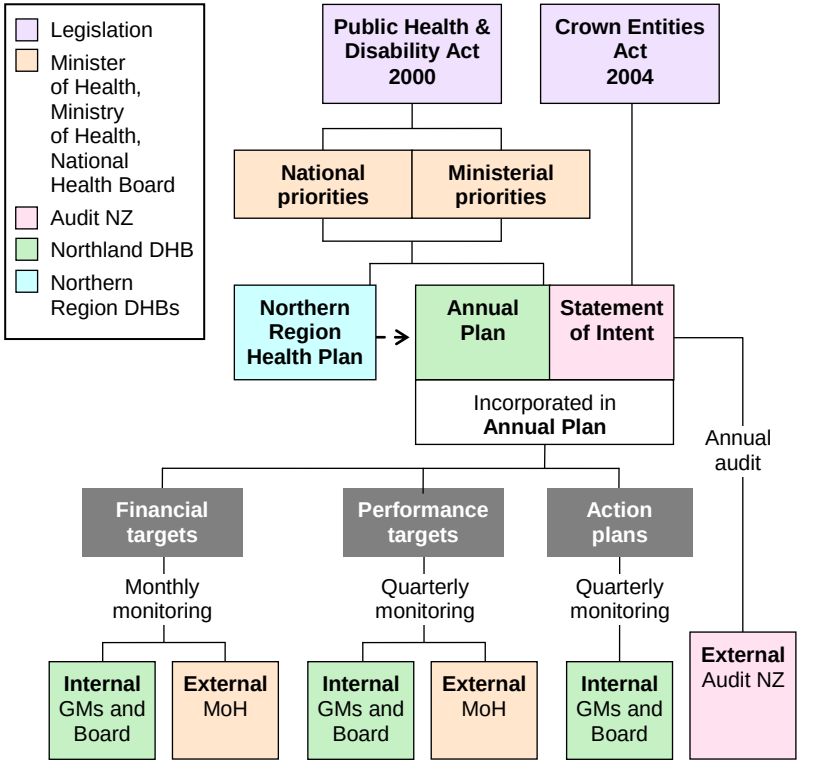
Non-financial performance (which relates to health service provision by both NGOs and NDHB's provider arm) is monitored quarterly. Health Target performance measures are covered in section 3.2, while non-Health Target performance measures are in section 9.

In a wider sense, the elected Board of governors of NDHB is open to public scrutiny. Seven of the eleven members of the Northland DHB are elected at the three-yearly local body elections and the remaining four appointed by the Minister of Health. The public are welcome to observe the meetings of the board and its statutory committees. Details of forthcoming monthly meetings are notified publicly in the local newspaper and available on our website, which also contains agendas and minutes of past meetings. Occasionally the Board or its committees have discussions from which they may decide to exclude the public; this is allowed for under the Public Health and Disability Act 200 under which DHBs operate.

As well as health sector accountabilities, Northland DHB is also accountable to the Government through the Statement of Intent (comprising modules 1, 2, 4, 5 and 8 of the Annual Plan), whose monitoring is overseen by the Office of the Auditor General. DHBs reproduce the Statement of Forecast Service Performance section of the SOI in their Annual Reports.

Monitoring processes are summarised in Graphic 20

Graphic 20 DHB planning and monitoring framework, national, regional and local



5.2 Provider arm services

5.2.1 Financial management systems

RHP 3.1, 3.3, 3.11

Northland DHB's Financial Management Systems give us the ability to set targets and monitor performance against these. Target setting occurs with advice from the Ministry of Health and includes financial budgets, numbers of employees and service delivery targets.

Performance against these targets is monitored on a monthly basis. This starts with Internal Performance Management Reporting within each service which feeds into the Executive Leadership Team. The reports are consolidated each month for the board of governance and its associated subcommittees. We also meet MoH reporting requirements on a monthly basis.

NDHB continues to seek efficiencies in the way we operate, including participating in regional and national processes (for procurement, for example). At least three-quarters of operating expenditure is on our workforce, and we continually reviewing patterns and levels of staffing to reduce costs.

The Financial Management System is, however, old and many processes are manual, especially procurement systems and processes. A significant advantage of entering into the healthAlliance Shared Service will be the implementation of the Oracle Financial System. This system will allow for a virtual paperless procurement process (from requisition to pay) and ensure that front line clinical staff can receive the necessary supplies at the right time at an optimum price with the minimum of administrative cost.

5.2.2 Information Services

RHP 3.6, 3.61 – 3.63

Information is the most important single factor upon which many of the improvements in services will be built. It is a key focus for the National Health Board and the Northern Regional Health Plan. The ultimate vision is a single patient record accessible at any point or from any provider in the health system, given appropriate safeguards on the type and level of data that can be accessed. This would enhance the efficiency of treatment services, reduce the amount of testing carried out, and help clinicians clarify their treatment intentions. (See also 3.7 Information Services.)

Information Services provides the knowledge and expertise to manage Northland DHB's existing IS assets, and to plan and execute their future development. Managing the existing IS assets involves balancing the costs of service continuity, reliability and performance against the risk of service interruption and disruption. Future development is about assessing and clarifying need (according to the DHB's organisational priorities), and planning and executing updates to the IS asset base.

We measure the capability of our Information Services by the extent to which:

- the existing services are known – both the "what", and the quality and standard of service
- performance against these service expectations can be measured, providing the platform for transparency, partnership, and continuous incremental improvement
- strategic direction is set, providing the framework upon which to make investment decisions regarding people, process, tools, technology, and information systems
- change is effectively and efficiently planned and delivered in support of advancing the organisation in the strategic direction.

Existing services are known	There is strong engagement between the Information Service and its customers throughout NDHB. There is strong understanding of the services required, and the expected standard of delivery. As the regional shared service is established in 2011/12, this Northland foundation will contribute to the development of the regional shared service delivery model.
Performance can be measured	Upgrades to the core infrastructure and associated tools, processes and work practices have provided a step change in service continuity, reliability and performance. The 2011/12 workplan includes further investment in core capability platforms and strengthening of the workflow processes to enable more effective, efficient service delivery and greater transparency of performance against service

expectations. Shared services will offer opportunities to leverage tools and skills to the benefits of NDHB's IS service consumers.

Strategic direction is set

NDHB is a partner in the Northern Regional Information Strategy (RIS10-20), with execution planning encompassed in the Northern Regional IS Implementation Plan (NRISIP) which has the endorsement of the region's four boards. The NRISIP is in step with the National Health IT board plan.

Change is planned and delivered

Information Services provides project and programme planning and management capability, which is governed by the DHB's IS Governance Group (planning) and Project Control Group (management).

Over the past three years, substantial investment in people, process and technology, strategic relationships, and strategic plans has provided a firm foundation and path for future development. Management of the existing assets could currently be described as "sound". The plans in place and the opportunities presented by the regional shared services, position us well for continued improvement and development.

5.2.3 Human Resources

RHP 1.28

NDHB recognises that the improvements we want to achieve both in our district and regionally must be delivered by the right number and type of staff. Our numerous staff training programmes help to continually improve capability and practice, and we are working with the other DHBs on the Northern Regional Training Hub. Improving the patient experience and streamlining patient flows requires new ways of thinking and working; these are being addressed by quality processes within NDHB and by clinical governance groups we are establishing.

Staffing numbers

In February 2011 Northland DHB employed 2,587 staff, representing 1,978 full-time equivalents (FTEs) (Graphic 21).

Graphic 21 Northland DHB staffing summary

Category	No. staff	FTEs	
		Number	% of total
Medical senior	145	118	10%
Medical junior	80	80	
Nursing	1,175	841	44%
Midwifery	73	41	
Allied health	549	451	23%
Non-clinical support	95	78	4%
Management & admin	470	369	19%
Total	2,587	1,978	100%

Northland DHB does not hold staffing information on the NGO providers with whom we hold contracts. Analysis of staff by number and skill mix is an important component in meeting demands on health services and improving patient care.

Monitoring, planning and negotiation

Human resources reports are generated monthly for General Managers and discussed at the Senior Management Group. They include analyses of leave (annual, sick and other), attendance at conferences and courses, Continuing Medical Education days and expenditure, staff turnover by occupational group, and measures of productivity per FTE (hours worked compared with sick leave, annual leave etc). They also include important updates regarding the status of industrial wage negotiations for local, regional and national based bargaining rounds.

Various forums exist for engagement of staff and unions. The Bipartite Action Group (BAG), attended by major CTU affiliated unions, meets quarterly for management and unions to discuss matters of common interest. This forum has been given a more formal structure as a result of agreements made with CTU unions as part of the national terms of settlement (NToS) in 2010. A Joint Consultative Committee (JCC) meeting with ASMS (Association of Salaried Medical Specialists) is also held quarterly. The Joint Action Committee (JAC) with the NZ Nursing Organisation (NZNO) established in

2008 has taken on a different form as a result of the formation of the BAG and has transitioned into the Healthy Workplace Committee. This committee has developed a work plan for 2011/12 centred with projects that enhance the working environment for nurses. The joint committee with the PSA has been operational for the last 12 months with its primary function being to ensure consistency of application of the process for career and salary progression as provided in the DHBs/PSA Allied, Public Health and Technical MECA.

The Human Resources Department runs a series of training modules for clinical and non-clinical managers to ensure their skills are updated on both practical and theoretical bases.

Northland DHB has held staff satisfaction surveys in the past, but in 2007 we adopted the Health Roundtable template that is increasingly being used by other DHBs, so benchmarking will be possible in the future. Feedback from the staff satisfaction survey in 2009 has assisted the DHB with workforce planning and healthy workplace initiatives.

Matching staff numbers and skill mixes takes place at operational and strategic levels. In nursing, for example, TrendCare is used to compare service demands on wards with the staffing mix, so that the two can be matched as closely as possible. Northland DHB also contributes information to the Health Workforce Information Programme run by DHBNZ which seeks to analyse and project current and future workforce needs.

Good Employer requirements

Northland DHB adheres to the good employer requirements in S118 of the Crown Entities Act 2004, which cover:

- good and safe working conditions
- an equal employment opportunities programme
- the impartial selection of suitably qualified persons for appointment
- recognition within the workforce of the aspirations and needs of Maori, other ethnic or minority groups, women and people with disabilities
- training and skill enhancement of employees.

Workforce development

Services identify and support potential leaders in various occupational groups to develop both technical and managerial skills, ensuring succession planning is facilitated. This is key for NDHB to attract and retain skills to provide high quality, fit-for-purpose care and services to meet both the current and future needs of the community in line with the Government's expectations

To attract and grow our workforce to meet service needs, training and development initiatives include the opportunity to participate in management, leadership and clinical programmes nationally and internationally. Staff satisfaction and retention is enhanced as training is development and aligned to organisational compliance requirements, service needs and staff's own professional development. Implementation of e-learning is enabling greater access to learning, communication, knowledge transfer and skill development, ensuring best practice is implemented.

Innovative models of care will be required to meet future needs and services are actively working with staff locally, regionally and nationally to plan for future workforce requirements both in the provider arm and primary sector.

The Care Capacity Demand Management programme (see also 3.2.1 HT1 Shorter stays in EDs) will utilise tested robust processes to assist Northland DHB to determine more accurately the base workforce requirement across services (initially nursing and midwifery) based on predicted and actual demand and comprehensive work analysis.

Another HWNZ initiative is the Advanced Trainee Scheme (ATS). The ATS is a HWNZ scholarship that assists advanced medical trainees to train or study overseas in a shortage specialty area, and guarantees them a job in New Zealand on completion of training (to which they are bonded). Northland DHB is hosting three trainees in psychiatry, orthopaedics and ENT.

Northland DHB provides retention incentives to support career pathways for dental therapists and midwives. NDHB continues to coordinate and allocate HWNZ funding for postgraduate study for nursing and midwifery and the non-regulated workforce. In addition NDHB pursues "Grow our Own" staffing initiatives by providing additional Maori scholarships for staff and a Pihirau Hauora Maori Scholarship for students who whakapapa to Te Tai Tokerau hapu and Iwi. There is also a training fund for the non-regulated Maori health and disability workforce to build their capability and capacity.

NDHB's relationships with Auckland University, Auckland University of Technology and NorthTec (Northland's polytechnic) continues to provide

future opportunities for doctors, nurses, midwives and allied health professionals to join the organisation.

Regional training hubs

During 2011 Health Workforce New Zealand (HWNZ) will be working nationally to achieve a more strategic and integrated approach to career planning. A major focus of this work will be the development of and support for the regional postgraduate training hubs. Four regional training hubs – Northern, Midland, Central and South Island – have been set up.

Regionally, Northland has participated in a series of planning meetings around the Northern Regional Training Hub, which has resulted in the development of a project plan for a "Transitional Years" project. The key objective of this project will be to produce regionally consistent standards and education for the transitional years (PGY1 and PGY2) within the four Northern DHBs. Northland DHB will have two representatives on the project team. It is envisaged that other projects, focussed on other professional groups (nursing and allied health) will be developed in future.

The regional training hubs will initially focus on the training needs of post graduate medical training and will progressively include other workforces. The project plans are expected to be in place by March and will build on existing relationships and align with regional health sector planning. HWNZ expect the hubs to be underway from mid 2011.

5.2.4 Clinical leadership

RHP 3.41 and implied in many other items

Involving clinicians in planning and management discussions and decisions is essential to improving services. NDHB's clinicians form an integral part of our management structures and processes (3.5.2 Clinical leadership in the NDHB Provider) and are intimately involved in regional planning processes (3.3.2 NDHB involvement and 3.5.3 Clinical leadership regionally). Clinical governance groups being establishing by NDHB to improve systems and quality of care involve clinicians from both NDHB and the NGO sector.

5.2.5 Quality and safety

Quality and safety are integral to the way Northland DHB works. Our emphasis on quality and safety aligns with the aims of the National Health Board's Quality and Safety Commission and with the Regional Health Plan's First Do No Harm priority.

NDHB has a Quality and Safety Framework, reviewed annually, to lay out the programme, principles, processes, structures, roles and relationships that underpin quality and safety. We also produce quarterly quality reports for the Board's Hospital Advisory Committee, the Patient Safety Committee and the Service Management Group.

Specific quality and safety structures and processes in the Northland DHB Provider include:

- a Patient Safety Committee to oversee the quality and safety framework and monitor activities related to it
- other committees to monitor clinical risks and support quality assurance and improvement activities, including Drugs and Therapeutics, Laboratory and Transfusion, Infection Control, Quality Facilitators and Morbidity and Mortality committees
- monitoring and management of adverse events and errors
- monitoring and management of complaints
- clinical audit and research projects
- benchmarking, especially in conjunction with the Health Roundtable
- projects dealing with medicine reconciliation, physiologically unstable patients, central venous line bundles, pressure ulcer prevention, falls prevention and stroke management bundles
- use of the Global Trigger Tool to measure patient harm for inpatient services.

An electronic risk register system allows all parts of the organisation to record and manage risk. The most serious risks are reviewed monthly with senior clinical staff to ensure they are mitigated to acceptable levels.

Risks to the organisation exist in:

- managing acute demand
- after-hours services in rural communities
- recruitment and retention of skilled staff
- the quality of the physical facilities of NDHB

- the quality of information systems within NDHB.

Northland DHB's existing quality and safety efforts focussed on the primary health care sector include:

- GP liaison positions established by the DHB to provide links with the primary care sector and work on matters of mutual interest
- strong clinical governance within PHOs
- accreditation of GP practices and other community health care providers
- a governance group for the Primary Options initiative
- NGO membership of NDHB's governance structures for long term conditions and child and youth health.

A major change in 2011 will be the implementation of a regional patient safety campaign, to be called "First Do No Harm". This will reinforce many of the patient safety initiatives already underway in Northland and there will be an alignment between the regional and local programmes. It is envisaged that the regional programme will allow Northland to utilise regional training, toolkits, outcome measures and other resources to speed and strengthen implementation of and learning from patient safety initiatives. The regional campaign will be cross-sectoral and there will be a focus on engagement of primary care and the aged care sectors in quality and safety initiatives.

In addition, further direction from the national Quality Improvement Commission can be expected to drive some specific programmes. This will include the implementation of a standard national medication chart for adult inpatient medical and surgical services.

5.2.6 Collaboration

RHP 3.4, 3.12, 3.41 - 3.43

Northland DHB is but one part of the public sector which itself is part of a wider social system, and people and patients flow in complex ways through a multitude of agencies and structures. The DHB is only one of many ways in which people's behaviour is influenced, so we must work in concert with other agencies. Our principal relationships are described in the following table.

Level	Nature of relationship
National	Ministry of Health provides advice about policy and related matters, and NDHB responds when consulted while policy is being considered. National Health Board funds and monitors DHBs, manages the annual funding and planning round, and oversees regional planning and national services.
Regional	NDHB engages with the three Auckland DHBs to develop the Regional Health Plan, which includes numerous workstreams on clinical services, information services etc. On an operational basis, NDHB provider clinicians refer patients to tertiary (more specialised) services provided in Auckland (mainly by Auckland DHB). NDHB has a firm relationship with the Northern DHB Support Agency (NDSA), jointly funded by the four Northern Region DHBs to provide some shared services, including mental health planning for the region. HealthAlliance, the new shared services organisation for the northern region DHBs, provides 'back-office' functions such as payroll and procurement.
Local	All the NDHB Provider's services link in some way to Northland's NGOs (including general practices and PHOs, the community lab, Maori health providers, mental health providers and aged-care providers etc). A key focus at the moment is on smoothing the pathways for patients between primary care and hospital (secondary) services. The NDHB Funder holds 232 contracts with 129 non-government organisation providers of health services. It employs several portfolio managers to negotiate the contracts, monitor and support the providers. The Funder is currently working particularly closely with Northland's two PHOs over 'alliancing' arrangements (3.3 Services closer to home) for more collaborative ways for the primary and secondary sectors to work together. The Funder involves health sector agencies in various planning and clinical governance groups.
Intersectoral	Northland DHB is a member of the Northland Intersectoral Forum, a collaboration of public sector and territorial local authority agencies from throughout Northland. The NDHB Provider's Child, Youth, Maternal, Public Health and Dental Services arm works with territorial local authorities and a variety of government agencies on compliance with public health legislation, training of non-health sector staff in public health skills and knowledge, and control of communicable disease.

5.2.7 NDHB facilities

Stage 1 of the Whangarei Hospital Redevelopment is well underway. Construction of the new Mental Health Inpatient Unit is scheduled for

completion in September 2011 with the official opening in October. Construction work for the relocation of the kitchen is expected to commence this calendar year.

A review and update of the Whangarei Hospital Site Masterplan has occurred and been endorsed by the Board. Stage 2 of the Whangarei Hospital Redevelopment has been revised and now comprises a new Emergency Department and Acute Assessment Unit. The existing Radiology Department will be refurbished and expanded. Additional intermediate stages have been agreed in principal and comprise refurbishment of Maternity, a new stand-alone Laboratory and relocation of Chronic and Complex Care services. NDHB is about to to commence work on the business case for Stage 2, though any financial commitments will not occur until after 2011/12. Northland DHB's Clinical Services Plan will be scoped and implemented during the life of this annual plan. At this time, issues such as planning for services in the Mid North of the district will be reviewed.

5.2.9 Management of assets

We monitor the condition and performance of our assets and formulate priorities for physical works using project planning, life cycle analysis and asset management for prioiritising asset maintenance. With shared services, greater emphasis will be placed on asset management planning from a regional perspective alongside the Auckland DHBs.

5.3 NGO services

Northland DHB holds 232 contracts with 129 non-government organisation (NGO) providers of health services. The NDHB Funder employs four Portfolio Managers to negotiate and monitor these contracts.

The Funder Arm's procurement activities might be best described as a cyclical process of investment, monitoring and then either reinvestment or disinvestment.

Investment

We use a combination of tools available nationally to assist with specific investment decisions. Recently we have reviewed and updated our internal Prioritisation Policy (2.5 Key risks and opportunities). This policy will in future guide all investment activity, not just for the Funder Arm, but across the NDHB Provider as well.

Once investment decisions have been made, contract negotiation with NGOs is completed by the portfolio managers. These negotiations include decisions regarding price. The Ministry of Health may direct price increases for particular services, for example for 2011/12 we have been instructed to negotiate with Aged Residential Care providers using the Contribution to Cost Pressures funding which Northland DHB received in the 2011/12 funding envelope.

Monitoring

All contracts awarded are monitored in order to analyse service utilisation and to facilitate future planning. Monitoring requirements are written into each contract's service specifications when it is awarded. Nationwide service specifications, jointly agreed between the Ministry and DHBs and utilised by NDHB, cover the majority of our expenditure. Monitoring comprises a large percentage of each Portfolio Manager's workload because the majority of contract monitoring is completed on a quarterly basis.

NDHB Funder contracts are also audited on a cyclical basis to ensure that services being delivered are of the appropriate quality.

Reinvestment and disinvestment

At NDHB all contracts are reviewed as they approach their end date for alignment with national, regional and/or local priorities. Northland DHB recognises that the best outcomes for our population are achieved by directing money to services which align with the health priorities of NDHB. The new Prioritisation Policy will assist in this regard.

6 Service configuration

6.1 Service coverage

The Service Coverage Schedule (1.2.2 Health sector context) specifies the services a DHB is expected to ensure are provided. This section deals with any significant exceptions that might be sought.

Northland DHB seeks no such exceptions.

6.2 Service issues

Northland DHB has no emerging service issues other than what is already covered under 6.3 or described within the context of the Regional Health Plan (3.6 Regional health planning and collaboration).

6.3 Service change

DHBs were asked by the National Health Board to generate a list of "significant" service changes possible in the next year. Feedback from NHB has trimmed the original list to what appears below. It includes only one (HBSS) assessed as being significant; the other three are items on which the NHB is seeking more information in order to make an assessment.

Northland DHB will follow the Service Change Protocols in the Operational Policy Framework. We will notify the National Health Board of any service changes resulting from planned service reviews or that may arise during 2011/12.

NDHB Provider

Title	Description	Rationale	Timing	Risk	
				Description	Lo/med/hi
Home based support services (HBSS)	Review 1000 existing housekeeping-only clients for the appropriateness of the services they have been receiving.	Almost half of the total allocated HBSS hours were for housekeeping only (that is, for people not requiring personal clinical care). Assessment and goal-setting during the restorative pilot revealed that a significant number of these clients had no disability support needs. Subject to the outcome of robust reassessment of clients, Northland DHB anticipates the 'recovery' of an amount in the vicinity of $2M. This will be reinvested in services for higher-need clients, whose numbers are growing all the	This process has been ongoing for three years and is projected to be completed by Sep 2012.	Reallocation of this sort has attracted adverse publicity in other parts of the country. NDHB is managing this by fully explaining the process to clients and/or by offering alternative services to those who have been assessed as no longer requiring housekeeping-only services.	Low

Title	Description	Rationale	Timing	Risk	
				Description	Lo/med/hi
		time. Those reassessed as no longer requiring HBSS have been offered other services. These include SCOPE[58] which exists in four areas of Northland, and referral to an intermediary care/ enablement service[59].			
Access to hospital based podiatry services	Access to simple foot care is being reduced in secondary services.	There are an increasing number of high-risk feet placing pressure on limited podiatry resources. Patients who simply need nail cutting are being referred back to the community.	Gradual process over a year.	Patients without home support are being referred to WINZ for financial assistance, but some may still need to pay for private foot care.	Med
Kaupapa Maori Medical Support Service	Change Kaupapa Maori Medical Support Service into general practice service.	The Provider believes the services offered by the Kaupapa Medical Support Service (primarily nursing development) are no longer needed as these services are being provided by a robust and highly qualified nursing team and a local general practitioner.	Discussions in progress. Business case to be developed. Expected to complete by June 2011.	Ki a Ora Ngatiwai are wanting to change their current Kaupapa Maori Medical Support Service into a general practice service..	Low
Modelling Whanau Ora Service for Kaumatua and Kuia across Northland.	Establishing a Maori NASC for Northland. Implementing a new model of care will necessitate the review of existing agreements, with new service specifications and realignment of services to reflect the agreed model of care.	In 2010 NDHB contracted Ngati Hine Health Trust by RFP to provide research and consultancy services to advise NDHB on the design and development of a Whanau Ora framework and service delivery model, for the delivery and funding of health services for older people. Examining the deficits in current service delivery goes some way to reducing inequalities.	Pilot project to commence April 2011, with a proposed 18 mth-2yr timeline for evaluation/ full implementation.	Expectation and historical call for responsive Kaupapa Maori Services (HOP). The 2010 consultation themes were derived from the opinions of 300 Kaumatua and Kuia, who now anticipate services closer to home, and kaupapa Maori based services. This risk will be minimised by a sound project management response and project inclusive of Maori leadership and a communication strategy. NDHB will also ensure the appropriate realignment of services to support the Whanau Ora Policy.	Medium

[58] A primary health service coordination service which aims to support older people to maintain their citizenship, independence, health and wellbeing, and self determination, and to reduce their risk of functional and social decline.

[59] Multidisciplinary team assessment followed by implementation of a recovery and/or rehab plan for a timed-constrained period, typically of 6-12 weeks.

7 Production Plan

This section includes the summary sheet from the detailed Production Plan spreadsheet.

Summarised Outputs (DHB of Service)	Northland			
	2010/11 Output Plan		***% growth***	***% growth weights***
	2010/11 Forecast	*2011/12 Planned*		
Case-weighted inpatient discharges				
Maternity	**2,079**	**2,120**	**1.97%**	**0.11%**
Medical	**10,359**	**10,563**	**1.97%**	**0.53%**
Medical electives	*101*	*103*	*1.98%*	*0.01%*
Medical acute	*10,258*	*10,460*	*1.97%*	*0.52%*
Surgical	**13,005**	**13,386**	**2.93%**	**0.98%**
Surgical electives	*6,402*	*6,652*	*3.91%*	*0.65%*
Surgical acute	*6,603*	*6,734*	*1.98%*	*0.34%*
Total case-weighted inpatient discharges				
Total	**25,443**	**26,069**	**2.46%**	**1.62%**
Outpatient services (expressed as events)				
ED	21,692	22,121	1.98%	0.06%
Medical first	7,996	8,141	1.81%	0.03%
Medical follow up	12,027	12,264	1.97%	0.04%
Renal	13,335	13,598	1.97%	0.08%
Scopes	4,342	4,432	2.07%	0.04%
Surgical first	11,857	12,085	1.92%	0.04%
Surgical follow up	21,111	21,521	1.94%	0.05%
Other services (expressed as events)				
Maternity	13,507	13,773	1.97%	0.05%
Medical	14,939	15,233	1.97%	0.04%
Surgical	2,574	2,625	1.98%	0.01%
Health of Older People	10,317	10,520	1.97%	0.05%
Miscellaneous	190,040	197,199	3.77%	0.47%
All non-inpatient services (expressed as case-weighted outputs)				
Total	**13,259**	**13,625**	**2.76%**	**0.95%**
Total volume growth	**38,702**	**39,694**		**2.56%**

Explanatory notes

The Production Plan is a detailed analysis of the volumes and costs of all services funded by Northland DHB. The information used to build this table has been drawn from volume data in the 2011/12 Production Plan, across forecast (2010/11), and planned (2011/12) years. The scope of services counted has been limited to those services that meet two criteria: a national price must exist; and the unit of measure must be output (not input or programme) based.

Oncology Services are excluded as they are provided by ADHB as satellite clinics in Whangarei Hospital.

The Northland DHB population is expected to rise by 0.6 - 0.7% per annum. This population is an aging one and this has significant cost implications for health care. Northland DHB will receive an extra 1.97% funding in 2011/12 to cover the expected increase in demand for services and some of this is being used to increase DHB provided services in Northland. The Ministry of Health is also providing extra funding to increase the availability of non-emergency surgery at a rate faster than population growth. These factors are taken into consideration when planning the level of services to be delivered by Northland DHB in 2011/12.

This table is called a "DHB Provider View" as it relates only to local services provided directly by Northland DHB staff. It excludes services provided to Northland residents by Non Government Organisations (NGOs) and public hospitals south of Whangarei (in particular, Auckland City Hospital). The figures in these tables represent only 37% of the total planned Northland DHB spending on health care in 2011/12.

8 Financial performance

RHP 3.1, 3.3, 3.11, 3.31

8.1 Managing the funding

Northland DHB has consistently maintained a balanced budget. This has met the requirements of the Minister and has allowed the DHB some flexibility in allocating resources to new needs and services. In the current climate of financial constraints and capped funding in real terms, keeping the books in the black is even more important.

Northland DHB's Financial Management Systems give us the ability to set targets and monitor performance against these. Target setting occurs with advice from the Ministry of Health and includes financial budgets, numbers of employees and service delivery targets.

Performance against these targets is monitored on a monthly basis. This starts with Internal Performance Management Reporting within each service which feeds into the Executive Leadership Team. The reports are consolidated each month for the board of governance and its associated subcommittees. We also meet MoH reporting requirements on a monthly basis.

NDHB continues to seek efficiencies in the way we operate, including participating in regional and national processes. At least three-quarters of operating expenditure is on our workforce, and we continually reviewing patterns and levels of staffing to reduce costs.

Northland DHB received a total increase of $15.9m (3.7%) in the December 2010 Funding Envelope. This population based funding increase is a contribution to both our cost and population growth pressures. The 2011/12 contribution to cost pressure is $7.4m (1.72%) and the contribution to demographic growth is $8.5m (1.98%).

The various 2011/12 Funding Envelope component figures are shown below, compared with those for the 2010/11 year. Over the year, there are usually some adjustments made on Inter District Flows and other items such as devolution of services leading to ongoing revision of the Northland DHB's Funding Envelope amount.

Northland DHB Funding Envelope changes from 2010/11 to 2011/12 ($m)

Funding Envelope component	2010/11 $m	2011/12 $m	% change
Population Based Funding			
Funding for Northland DHB based services	$363.9	$380.8	4.6%
Funding for services for Northland population at other DHBs	$64.8	$66.1	1.3%
Inter District Flows			
Funding from other DHBs for treating their residents	$8.1	$7.5	-7.4%
Total Funding Envelope Revenue	$436.8	$454.4	4%

The Funding Envelope together with various national and regional service priorities and local population demand has implications for Northland DHB for 2011/12:

- *Primary care*: The Ministry of Health expects that DHBs will increase 'first contact' rates by 2%
- *Aged related residential care (ARRC):* The Ministry of Health expects that DHBs will negotiate with ARRC providers using the 1.72% contribution to cost pressure funding.
- *Pharmacy:* The Government has committed to increase spending on community pharmaceuticals by an expected $20m in 2011/12. Northland DHB's share of this cost is $0.8m which excludes the flow-on cost of filling the additional scripts.
- *Elective services:* NDHB is required to increase surgical discharges by 100 for the new year. This is an additional cost of approximately $0.5m.

8.2 The three-year forecasts

NDHB will achieve a break-even performance for each of the three years detailed in the financial template.

The 2011/12 result has been arrived at after taking into account all the currently known cost increases we forecast to occur. Included are the increased capital costs of the new Mental Health Inpatient Unit expected to open in October 2011 (costs include additional depreciation and the loss of interest income as cash resources diminish). Wage increases after the expiry of current employment agreements have been budgeted at 2%. Shared services savings are expected to be $2m in 2011/12.

The outer years have been reported as break-even, although the increased depreciation and operating costs and loss of interest income resulting from continuing investment in building development and information technology, coupled with an advice from the Ministry of Health that future funding increases will be no more in actual terms than that received this year, has meant that savings assumptions have needed to be included in those results.

The level of savings assumed for these out-years is approximately $2m in 2012/13 and a further $2.5m in 2013/14. It will be achieved from savings of the regional shared service organisation (healthAlliance) as well as savings realised from the investments themselves.

The 2012/13 and 2013/14 projections have been based on the following assumptions:

- core revenue increases will continue at their current dollar value, approximately $16m per annum; any reduction in this increase will increase the savings targets
- other revenue will increase at 1.72% (the current Contribution to Cost Pressures funding level) with the exception of interest income which will reduce by $1m in 2012/13 and a further $1m in 2013/14
- staff costs will rise by 4% per annum
- outsourced services will rise by 4% per annum
- clinical supplies will rise by 4% per annum
- infrastructure and non-clinical supplies will rise by 4% per annum and depreciation will rise by $2m in 2012/13 and a further $2m in 2013/14
- payments to NGO providers will rise by 2% per annum.

8.3 Shared services

A major project to combine the back-office functions of finance, procurement and information services of the 4 Northern Region DHBs culminated on 1 March 2011 with the staff from these areas transferring to healthAlliance NZ Limited, a company owned by the 4 DHBs. Following the receipt of pending Crown approval, the cost lines within the Statement of Financial Performance will be reallocated to show the transferred expenditure and staff as an outsourcing payment to the shared services organisation. Similarly the Balance Sheet will also be restated to reflect the investment in the company, and the transfer of assets and liabilities to the company. This will be restated in the second Annual Plan round.

8.4 Productivity initiatives

Our major productivity initiatives are as follows:

Initiative	Estimated savings 2011/12
Regional Shared Services:	$600k
Commenced 1 March 2011; full savings will be realised over 3 years	
Human resources:	
Continue to hold vacant positions	$600k
Contain FTE increases for replacement staff using improved scrutiny of staff requirements	$240k
Motor vehicles:	
Replace old fleet with a mixture of leased and purchased new vehicles to reduce repairs and fuel costs; improve fleet vehicle usage to reduce fuel and maintenance costs	$240k
Utilities:	
Replace coal-fired boilers in Bay of Island Hospital with heat pumps	$100k
Upgrade air conditioning plants in Whangarei Hospital and offices and putting in timers to control electricity usage	$100k
Upgrade theatre systems for electricity, heating,	TBA

ventilation and air conditioning

8.5 Full time equivalent (FTE) staff management

Emphasis has been placed on controlling FTE numbers. Increases arise from the substitution of locum costs with employed FTE positions, specifically - funded new positions (oral health for example) and clinical positions driven by increased patient demand.

Management and administrative FTEs have been held, despite increases in activity and new services. FTE level remains well below the FTE cap.

Note that the above FTE analysis does not reflect the approximate 55 FTEs that will transfer to healthAlliance on 1 March 2011.

8.6 Capital plan

The financial templates include the capital plan for the DHB. Baseline capital, funded via depreciation, is the common description of the plan which funds the replacement of existing assets.

Strategic capital is funded from the DHB's cash resources, Crown equity and Crown debt. Northland DHB's strategic capital intentions signalled in the Annual Plan represent ambitions to renew our building stock on the Whangarei and Kawakawa campuses, and to upgrade our essential clinical information systems.

8.7 Assets

Assets were last valued on 30 June 2009 and are due for another revaluation 3 years from that date, that is 30 June 2012.

8.8 Disposal of land

If Northland DHB decides to dispose of any land transferred to or vested in the DHB, we will do so under the Health Sector Transfers Act 1993. Northland DHB has no plans at present to dispose of any land.

8.9 Financial statements

Statement of Comprehensive Income

$000s

	2009-10 Audited Actuals	2010-11 Forecast	2011-12 Budget	2012-13 Budget	2013-14 Budget
DHB Provider Revenue	246,241	248,453	260,546	270,600	280,548
DHB Funder Revenue	216,474	225,828	228,861	233,918	239,084
DHB Governance & Administration	4,566	3,580	3,597	3,722	3,851
Inter District Flow Revenue	7,824	8,141	7,500	7,631	7,764
Total Revenue	475,105	486,002	500,504	515,871	531,246
DHB Provider Operating Expenditure	231,484	230,538	240,596	248,418	256,141
DHB Non Provider Funded Services	153,247	166,223	167,428	170,204	173,048
DHB Governance & Administration	4,218	3,557	3,576	3,701	3,828
Inter District Flow Expense	66,793	67,747	68,933	71,345	73,800
Total Operating Expenditure	455,742	468,064	480,533	493,667	506,817
Earnings before Interest, Depreciation, Abnormals & Capital Charge	19,363	17,938	19,972	22,204	24,430
Less					
Interest on Term Debt	1,694	1,623	1,670	1,699	1,728
Depreciation	11,848	11,167	12,911	15,030	17,151
Revaluation					
Earnings before Abnormals & Capital Charge	5,821	5,148	5,391	5,475	5,551
Profit/(Loss) on Sale of Assets	-	-	-	-	-
Net Operating Surplus (Deficit)	5,821	5,148	5,391	5,475	5,551
Capital Charge	5,016	5,148	5,390	5,484	5,579
Surplus (Deficit)	**805**	**0**	**0**	**(8)**	**(28)**
Revaluation of Fixed Assets	(43)	-	-	-	-
Comprehensive Income	**762**	**0**	**0**	**(8)**	**(28)**

Statement of Movements in Equity

$000s

	2009-10 Audited Actuals	2010-11 Forecast	2011-12 Budget	2012-13 Budget	2013-14 Budget
Equity at the beginning of the period	61,877	64,343	64,357	64,357	64,348
Surplus/Deficit for the period	805	0	0	(8)	(28)
Total Recognised Revenues and Expenses	62,681	64,344	64,357	64,348	64,320
Other Movements					
Revaluation of Fixed Assets	(43)	-	-	-	-
Other	534	-	-	-	-
Equity introduced (Repaid)	1,171	14	-	-	-
Equity at end of Period	**64,343**	**64,358**	**64,357**	**64,348**	**64,320**

Statement of Financial Position

$000s

	2009-10 Audited Actuals	2010-11 Forecast	2011-12 Budget	2012-13 Budget	2013-14 Budget
Equity					
Crown Equity	35,703	36,875	36,875	36,875	36,875
Retained Earnings	1,987	1,987	1,987	1,978	1,950
Subsidiaries & unrestricted trusts	310	309	309	309	309
Revaluation Reserve	25,172	25,172	25,172	25,172	25,172
Capital Injections	1,171	14	14	14	14
Total Equity	64,343	64,357	64,357	64,348	64,320
Represented by:					
Assets					
Current Assets	53,343	38,493	23,573	24,029	19,063
Non-Current Assets	125,001	138,855	153,775	153,309	158,247
Total Assets	178,344	177,348	177,348	177,338	177,310
Liabilities					
Current Liabilities	81,501	76,507	76,507	76,507	76,507
Non-Current Liabilities	32,500	36,484	36,484	36,484	36,484
Total Liabilities	114,001	112,991	112,991	112,991	112,991
Net Assets	**64,343**	**64,357**	**64,357**	**64,348**	**64,320**

Statement of Cash Flows

$000s

	2009-10 Audited Actuals	2010-11 Forecast	2011-12 Budget	2012-13 Budget	2013-14 Budget
Cash Flows from Operating Activities					
Operating Income	477,073	482,095	497,754	514,121	530,496
Operating Expenditure	469,747	476,141	485,923	499,153	512,395
Net Cash from Operating Activities	7,326	5,954	11,831	14,968	18,101
Cash Flows from Investing Activities					
Interest receipts 3rd Party	2,933	4,856	2,750	1,750	750
Sale of Fixed Assets	182	-	-	-	-
Purchase of Fixed Assets	(10,570)	(23,633)	(27,831)	(14,564)	(22,089)
Increase in Investments and Restricted & Trust Funds Assets	(25,064)	(2,159)	-	-	-
Net Cash from Investing Activities	(32,519)	(20,937)	(25,081)	(12,814)	(21,339)
Cash Flows from Financing Activities					
Equity injections (repayments)	1,171	14	-	-	-
Borrowings	363	(57)	-	-	-
Interest Paid	(1,699)	(1,623)	(1,670)	(1,699)	(1,728)
Repaid debts	-	-	-	-	-
Other Non-Current Liability Movement	-	-	-	-	-
Net Cash from Financing Activities	(165)	(1,666)	(1,670)	(1,699)	(1,728)
Net Increase/(Decrease) in Cash held	(25,358)	(16,648)	(14,920)	456	(4,966)
Add opening cash balance	54,499	29,141	12,493	(2,427)	(1,971)
Closing Cash Balance	29,141	12,493	(2,427)	(1,971)	(6,937)

Note: *Cash balance includes short term investments which are considered cash or cash equivalents*

Consolidated Statement of Financial Performance ($000s)

	2009-10 Audited Actuals	2010-11 Forecast	2011-12 Budget	2012-13 Budget	2013-14 Budget
MOH Devolved Funding	443,485	453,836	470,977	486,878	502,779
MOH Non-Devolved Contracts (provider arm side contracts)	10,934	11,459	10,984	11,175	11,370
Other Government (not MoH or other DHBs)	4,554	3,858	3,783	3,849	3,916
Patient / Consumer sourced	457	408	354	360	366
Total Other Income	6,032	6,749	5,304	4,348	3,393
IDFs	7,824	8,141	7,500	7,631	7,764
InterProvider Revenue (Other DHBs)	1,819	1,552	1,602	1,630	1,659
Total Consolidated Revenue	475,105	486,002	500,504	515,871	531,246
Personnel Costs	163,349	162,965	172,033	178,384	184,603
Outsourced Services	12,754	10,203	11,133	11,672	12,231
Clinical Supplies	37,682	39,475	40,132	40,486	40,728
Infrastructure & Non-Clinical Supplies	21,917	21,454	20,873	21,577	22,406
Finance Costs	6,710	6,771	7,060	7,183	7,307
Depreciation	11,848	11,167	12,911	15,030	17,151
Personal Health	152,055	161,689	165,216	168,403	171,572
Mental Health	15,061	16,040	14,904	15,099	15,375
Disability Support Services	45,455	48,889	48,884	50,526	52,213
Public Health	1,601	1,482	1,485	1,531	1,579
Maori Health	5,869	5,868	5,872	5,989	6,109
Total Operating Expenditure	474,301	486,002	500,504	515,884	531,280
Surplus (Deficit)	**805**	**(0)**	**0**	**(12)**	**(34)**

Key Financial Analysis and Banking Covenants

	2009-10 Audited Actuals	2010-11 Forecast	2011-12 Budget	2012-13 Budget	2013-14 Budget
Financial Analysis					
Term Liabilities and Current Liabilities	114,001	112,991	112,991	112,991	112,991
Debt	23,650	20,937	24,918	24,918	24,918
Owners Funds	64,343	64,357	64,357	64,348	64,320
Total Assets	178,344	177,348	177,348	177,338	177,310
Owners Funds to Total Assets	36.1%	36.3%	36.3%	36.3%	36.3%
Interest Expense	1,694	4,269	1,670	1,699	1,728
Depreciation Expense	11,848	11,167	12,911	15,030	17,151
Surplus/(Deficit)	805	0	0	- 8	- 28
Interest Cover	8.47	3.62	8.73	9.84	10.91
Debt/Debt + Equity Ratio	27%	25%	28%	28%	28%
Banking Covenants					
Debt/Debt + Equity Ratio	26.9%	24.5%	27.9%	27.9%	27.9%
Interest Cover	8.5	3.6	8.7	9.8	10.9
Interest Cover Minimum	3.0	3.0	3.0	3.0	3.0

Statement of Financial Performance - By Output Class

	Intensive Assessment & Treatment	Early Detection & Management	Prevention	Rehabilitation & Support Services	2011-12 Budget Total
DHB Provider Revenue	201,749	35,418	12,992	10,387	260,547
Less Revenue Offsets	- 6,139				- 6,139
DHB Funder Revenue	144,345	26,491	8,127	57,399	236,362
DHB Governance & Administration	3,597				3,597
					-
Total SOI Revenue	343,552	61,910	21,118	67,786	494,366
		4,269			
Personnel Costs					
Medical Labour	41,847	2,661	981	18	45,508
Nursing Labour	54,167	3,086	3,034	3,844	64,132
Allied Health Labour	17,216	8,219	2,908	1,822	30,165
Non Clinical Support Labour	104	1	1	3	108
Management and Admin Labour	6,472	1,155	1,244	355	9,225
	-	-	-	-	
Non-Personnel Operating Costs	-	-	-	-	
Outsourced Clinical Services	3,948	243	126	382	4,699
Oth Clinical Supp	26,058	2,365	628	1,748	30,799
Implants	4,298	20	0	0	4,318
Pharmaceuticals	3,780	94	123	191	4,188
Infrastructure and Non Clinical	6,147	1,134	176	261	7,718
Allocated Pharmaceuticals	947	24	23	59	1,053
Corporate Departments	16,137	1,857	1,183	736	19,913
Cost of Capital	5,422	609	341	297	6,670
CSSD Overhead	-	0	0	0	-
CTA Recoveries	- 2,140	-71	-23	-1	- 2,235
Patient Support	4,261	133	9	70	4,473
Patient Support Overhead	-	0	0	0	-
Service Based Departments	20,506	3,357	1,969	1,166	26,999
Sterile Supplies	228	10	1	33	271
Provider Payments					
Personal Health	131,323	20,835	6,632	6,426	165,216
Mental Health	8,548	5,656	-	700	14,904
Disability Support Services	134	-	10	48,740	48,884
Public Health	-		1,485	-	1,485
Maori Health	4,340	-	-	1,532	5,872
Total SOI Operating Expenditure	353,745	51,386	20,853	68,383	494,366
Surplus (Deficit)	- 10,192	10,524	266	- 597	1

Capital Plan

$000s

	2009-10 Audited Actuals	2010-11 Forecast	2011-12 Budget	2012-13 Budget	2013-14 Budget
Capital Plan Expenditure					
Baseline Capital	10,570	9,388	10,725	9,681	9,681
Strategic Capital	-	15,513	17,106	4,883	12,408
Total Capital Expenditure	10,570	(6,125)	(6,381)	4,798	(2,727)
Financing					
Internal Contribution	10,570	21,934	27,831	14,564	22,089
External Contribution	-	2,967	-	-	-
Net Cash from Investing Activities	10,570	24,901	27,831	14,564	22,089

9 Other performance measures

The principal performance measures by which performance of DHBs is measured are the national Health Targets, covered in section 3.2. This section describes the other centrally-driven performance measures by which DHB performance is gauged quarterly, and the targets set by Northland DHB.

Many of these measures are used in 4 Statement of Forecast Service Performance.

9.1 Policy priorities

Indicator	Indicator details and NDHB target
PP1 Clinical leadership	
Each DHB is required to report progress of DHB work to improve clinical leadership and engagement across all levels of the DHB.	
Includes how the DHB is: • contributing to regional clinical leadership through networks • investing in the development of clinical leaders • involving the wider health sector (Including primary and community care) in clinical inputs • demonstrating clinical influence in service planning • investing in professional development • influencing clinical input at board level and all levels throughout the DHB, including across disciplines; what are the mechanisms for providing input?	Satisfactory report to be completed on time.
PP2 Implementation of better, sooner, more convenient primary health care	
All DHBs are required to report on the implementation of changes to primary health care services that deliver on the core elements of Better, Sooner, More Convenient primary health care.	
In particular progress must be described regarding: • the shifting of services from secondary care to primary care settings • the development of Integrated Family Health Centres • any specific reporting requirements that may be identified in the Minister's Letter of Expectations (to be confirmed).	Satisfactory report to be completed on time.
PP3 Local iwi/Maori engagement and participation in DHB decision making, development of strategies and plans for Maori health gain	
Each DHB is required to report demonstrating across five key aspects:	
1 Percentage of PHOs with Maori Health Plans that have been agreed to by the DHB:	100%
2 Report on how Maori Health Plans are being implemented by PHOs and monitored by the DHB.	Satisfactory report to be completed on time.
3 Provide a report demonstrating: • achievements against the MoU between the DHB and its local Iwi/ Maori health relationship partner, and describe other initiatives achieved that are an outcome of engagement between the parties during the reporting period • provide a copy of the MoU	Satisfactory report to be completed on time.
4 Report on how (mechanisms and frequency of engagement) local Iwi/ Maori are supported	Satisfactory report to be completed on time.

Indicator	Indicator details and NDHB target
by the DHB to participate in the development and implementation of the strategic agenda, service delivery planning, development, monitoring, and evaluation (include a section on PHOs).	
5 Provide a report by exception on national level priorities that have not been achieved in the DHB Maori Health Plan. The report will say why the priority has not been achieved, what the DHB will do to rectify it, and by when..	Satisfactory report to be completed on time.
PP4 Improving mainstream effectiveness	
Each DHB to report providing information on the activities undertaken to improve mainstream effectiveness ensuring clinical safety and effectiveness for Maori	
1 Provide a report describing the reviews of pathways of care that have been undertaken in the last 12 months that focused on improving Health outcomes and reducing health inequalities for Maori.	Satisfactory report to be completed on time.
2 Report on examples of actions taken to address the issues identified in the reviews.	Satisfactory report to be completed on time.
PP5 Shorter waits for chemotherapy treatment	
Everyone needing chemotherapy treatment will have this within 4 weeks.	100%.
PP6 Improving the health status of people with severe mental illness	
The average number of people domiciled in the DHB region, seen per year rolling every three months being reported (the period is lagged by three	

	Maori	Other	Total
Ages 0-19	2.80	2.99	2.90
Ages 20-64	5.69	3.47	4.28
Ages 65+	1.90	2.08	2.00

Indicator	Indicator details and NDHB target
months) for the categories in the table	
PP7 Improving mental health services using relapse prevention planning	
1 The number of adults and older people (20 years plus) with enduring serious mental illness who have been in treatment (at least one provider arm contact every three months for two years or more) for two years or more since the first contact with any mental health service. The subset of alcohol and other drug only clients will be reported for the 20 years plus.	Number to be reported.
2 The number of child and youth who have been in secondary care treatment (at least one provider arm contact every three months for one year or more) for one or more years who have a treatment plan.	Number to be reported.
3 The number and percentage of long-term clients with up to date relapse prevention/ treatment plans (NMHSS criteria 16.4 or HDSS [2008] 1.3.5.4 and 1.3.5.1 [in the case of child and youth]).	
4 Describe the methodology used to ensure adult long-term clients have up-to-date relapse prevention plans and that appropriate services are provided. DHBs that have fully implemented KPP across their long-term adult population should state KPP as the methodology.	Satisfactory report to be completed on time.

	Maori	Non-Maori	Total
% clients with long-term crisis prevention/ resiliency plans	95%	95%	95%

Indicator	Indicator details and NDHB target
PP8 DHBs report alcohol and drug service waiting times and waiting lists	
1 Longest waiting time in days for each month (in Q2 Jun-Nov, in Q4 Dec-May).	

	Maori	Other	Total
Inpatient detox	60	60	60
Residential detox	n/a	n/a	n/a
Specialist prescribing	31	31	31
Structured counselling	91	91	91
Day programmes	91	91	91
Residential rehab	n/a	n/a	n/a

n/a = services not provided in Northland

2 Identify the name and location of service(s) with the longest waiting time. Explain variances of more than 10% in waiting times. Identify and explain targets the DHB may have for reducing waiting times.	Satisfactory report to be completed on time.
PP9 Delivery of Te Kokiri, the Mental Health and Addiction Action Plan	
Provide a summary report on progress made towards implementation of *Te Kōkiri: the Mental Health and Addiction Action Plan*. A template for this report can be found on the NSFL homepage: http://nsfl.health.govt.nz .	Satisfactory report to be completed on time.
PP10 Oral health, DMFT score at Year 8	
Upon the commencement of dental care, at the last dental examination before the child leaves the DHB's Community Oral Health Service, the percentage number of:	*DMFT:*

Non-fluoridated	**Maori**	**Other**	**Total**
Decayed	1.24	0.54	1.26
Missing	0.02	0.01	0.02
Filled	1.24	0.60	0.81
Total	2.90	1.12	2.11

Caries-free:

Non-fluoridated	**Maori**	**Other**	**Total**
Caries-free	25.0%	43.3%	33.2%

Indicator	Indicator details and NDHB target
Permanent teeth of children in school Year 8 (12/13-year olds) that are: • decayed (D) • missing due to caries (M) • filled (F) Children who are caries-free (decay-free).	
PP11 Oral health, children caries-free at age 5	
At the first examination after the child has turned five years, but before their sixth birthday, the total number of: Children who are caries-free (decay-free) Primary teeth of children that are: • decayed (D) • missing due to caries (M) • filled (F).	*Caries-free:*

Non-fluoridated	**Maori**	**Other**	**Total**
% caries-free	30%	58%	43%

DMFT:

Non-fluoridated	**Maori**	**Other**	**Total**
Decayed	3.23	1.32	2.23
Missing	0.35	0.06	0.14
Filled	0.84	0.50	0.68
Total	4.42	1.88	3.05

PP12 Utilisation of DHB-funded dental services by adolescents from School Year 9 up to and including age 17 years	
The total number of adolescents accessing DHB-funded adolescent oral health services, defined as: • the unique count of adolescent patients' completions and non-completions under the Combined Dental Agreement • the unique count of additional adolescent examinations with other DHB-funded dental services (eg DHB community oral health services, Maori oral health providers and	

	Maori	Other	Total
Completions	n/a	n/a	61%
Non-completions	n/a	n/a	4%
Total	n/a	n/a	65%

Ethnicity data is not captured via sector services' claiming process.

<table>
<tr><th>Indicator</th><th>Indicator details and NDHB target</th></tr>
<tr><td>other contracted oral health providers).</td><td></td></tr>
<tr><td colspan="2">PP13 Improving the number of children enrolled in DHB-funded oral health services</td></tr>
<tr><td>1 Percentage of preschool children enrolled in DHB-funded oral health services</td><td>
<table>
<tr><th></th><th>Maori</th><th>Other</th><th>Total</th></tr>
<tr><td>Enrolled</td><td>72%</td><td>86%</td><td>65%</td></tr>
</table>
NDHB has estimated the 2010 enrolment of Pacific under 5s to be about 10%. However this figure is probably an underestimate because the numerator is based on self-identification (by children attending the service or their parents) while the denominator is based on Census data which counts all people with any Pacific ethnicity.
</td></tr>
<tr><td>2
percentage of children aged 0-4 not enrolled with DHB-funded dental services
• the greatest length of time children have been waiting for their scheduled examination, and the number of children that have been waiting for that period</td><td>
<table>
<tr><th></th><th>Maori</th><th>Other</th><th>Total</th></tr>
<tr><td>Total number of children</td><td>n/a</td><td>n/a</td><td>12%</td></tr>
</table>
<table>
<tr><th></th><th>Longest wait time</th><th>% of children</th></tr>
<tr><td>Preschool</td><td></td><td></td></tr>
<tr><td>Primary school</td><td></td><td></td></tr>
</table>
</td></tr>
<tr><td colspan="2">PP14 Family violence prevention</td></tr>
<tr><td>Confirmation report based on audit scores for partner abuse and child abuse and neglect programme components (100 each for child and partner abuse).</td><td>140/200.</td></tr>
<tr><td colspan="2">PP15 Improving the safety of the elderly: Reducing hospitalisations for falls</td></tr>
<tr><td>Percentage of the population domiciled in the DHB region who are hospitalised for falls (data sourced by MoH). MoH will, for the 2012/13 year, set targets for the reduction of falls.</td><td></td></tr>
<tr><td>DHBs will report activities that are undertaken to monitor and reduce fall rates.</td><td></td></tr>
<tr><td colspan="2">PP16</td></tr>
<tr><td colspan="2">Each DHB is required to report on progress for career planning for those professions who receive funding form Health Workforce New Zealand (HWNZ).</td></tr>
<tr><td>The DHB provides quantitative data to demonstrate progress achieved for career planning in their staff.
For each of the following categories of staff a measure will be given for numbers receiving HWNZ funding and the number with career plan for required categories:
• medical staff
• nursing
• allied technical
• Maori health
• Pacific
• pharmacy
• clinical rehabilitation
• other.</td><td></td></tr>
</table>

9.2 System integration

<table>
<tr><th>Indicator</th><th>Indicator details and NDHB target</th></tr>
<tr><td colspan="2">SI1 Ambulatory sensitive (avoidable) hospital admissions</td></tr>
<tr><td>Each DHB is expected to provide a commentary on their latest 12 month ASH data that's available via the nationwide service library.

This commentary may include additional district level data that's not captured in the national data collection and also information about local initiatives that are intended to reduce ASH admissions.

Each DHB should also provide information about how health inequalities are being addressed with respect to this health target, with a particular focus on ASH admissions for Pacific and Maori 45-64 year olds.</td><td>
<table>
<tr><td>Age 0-74</td><td>Maori</td><td>107 or below</td></tr>
<tr><td></td><td>Other</td><td>95 or below</td></tr>
<tr><td>Age 0-4</td><td>Maori</td><td>101</td></tr>
<tr><td></td><td>Other</td><td>95</td></tr>
<tr><td>Age 45-64</td><td>Maori</td><td>113 or below</td></tr>
<tr><td></td><td>Other</td><td>95 or below</td></tr>
</table>
</td></tr>
<tr><td colspan="2">SI2 Regional service planning</td></tr>
<tr><td>Report qualitative progress report against actions in the regional implementation plan. A single progress report on behalf of the region agreed by all DHBs within that region. The report should focus on the actions agreed by each region as detailed in its regional implementation plan.</td><td>Satisfactory report to be completed on time.</td></tr>
<tr><td colspan="2">SI3 Service coverage</td></tr>
<tr><td>Report progress achieved during the quarter towards resolution of exceptions to service coverage identified in the DAP, and not approved as long term exceptions, and any other gaps in service coverage identified by the DHB or Ministry through:
• analysis of explanatory indicators
• media reporting
• risk reporting
• formal audit outcomes
• complaints mechanisms
• sector intelligence.</td><td>Satisfactory report to be completed on time.</td></tr>
<tr><td colspan="2">SI4 Elective services standardised intervention rates</td></tr>
<tr><td colspan="2">Standardised Intervention Rates (SIRs) measure a DHB's delivery of services relative to their standardised population. The Ministry will be monitoring DHB SIRs for elective surgical services, and for a range of identified elective procedures.</td></tr>
<tr><td>For any procedure where the standardised intervention rate in the 2011/12 financial year or 2011 calendar year is significantly below the target level a report demonstrating:
• what analysis the DHB has done to review the appropriateness of its rate
• whether the DHB considers the rate to be appropriate for its population
• a description of the reasons for its relative under-delivery of that procedure
• the actions being undertaken in the current year (2011/12) that will ensure the target rate is achieved.</td><td>Elective services SIRs will be analysed and posted on a Ministry website.
<table>
<tr><th>Type of procedure</th><th>Expected national SIR</th><th>NDHB elective discharges</th></tr>
<tr><td>All procedures</td><td>308.0</td><td>6,541</td></tr>
<tr><td>Hips</td><td>10.5</td><td>200</td></tr>
<tr><td>Knees</td><td>10.5</td><td>200</td></tr>
<tr><td>Cataracts</td><td>27.0</td><td>514</td></tr>
<tr><td>Cardiac surgery</td><td>6.5</td><td>143</td></tr>
</table>
</td></tr>
<tr><td colspan="2">SI5 Expenditure on services provided by Maori Health providers</td></tr>
<tr><td>1 Actual expenditure (GST exclusive) on Maori health providers by General Ledger code</td><td>Maori health providers $14,856,031
Specific Maori services within mainstream services $3,026,055</td></tr>
</table>

Indicator	Indicator details and NDHB target
2 Actual reported expenditure for Maori providers in comparison to estimated expenditure for Maori providers in their Annual Plan for the same reporting period, with explanation of variances.	Total $17,882,086 Satisfactory report to be completed on time.
SI7 Improving breastfeeding rates	
Increase the proportion of infants fully and exclusively breastfed: • at six weeks to 74% or greater • at three months to 57% or greater • at six months to 27% percent or greater.	**Age** / **Maori** / **Other** / **Total** 6 weeks / 68% / 81% / 74% 3 months / 57% / 63% / 57% 6 months / 25% / 28% / 28%

9.3 Ownership

Indicator	Indicator details and NDHB target
OS3 Elective and arranged inpatient length of stay*	
Ratio of actual to expected LOS for NDHB, compared to national ratio.	4.00
OS4 Acute inpatient length of stay*	
Ratio of actual to expected LOS for NDHB, compared to national ratio.	3.90
OS5 Theatre utilisation	
Actual utilisation as a percentage of resourced utilisation.	85%
OS6 Elective and arranged day surgery*	
Ratio of actual to expected day surgery rate for NDHB, compared to national ratio. DHBs will be supplied with comparative data on performance relative to other DHBs and the suggested target of 62% standardised.	60%
OS7 Elective and arranged day-of-surgery admissions*	
For elective and arranged discharges, DOSA as % of total. DHBs will be supplied with comparative data on performance relative to other DHBs and the suggested target of 90%.	92% of elective and arranged discharges should be day-of-surgery admissions.
OS8 Acute readmissions to hospital*	
Ratio of actual to expected acute readmissions for NDHB, compared to national ratio. DHBs will be supplied with comparative data on performance relative to other DHBs and suggested target ranges.	9.95%
OS9 Mortality*	
Ratio of actual to expected 30-day mortality for NDHB, compared to national ratio.	1.39%
OS10 Improving the quality of data provided to National Collection Systems*	
1 *National Health Index (NHI) duplications:* percentage of NHI duplicates that require merging by Data Management per DHB per quarter.	>3%, ≤6%
2 *Ethnicity set to 'Not stated' or 'Response Unidentifiable' in the*	>0.5%, ≤2%

Indicator	Indicator details and NDHB target
NHI: percentage of NHI records created with ethnicity of 'Not Stated' or 'Response Unidentifiable' per DHB per quarter.	
3 *Standard versus specific diagnosis code descriptors in the NMDS:* percentage of versions of text descriptor for specific diagnosis codes (M00-M99, S00-T98, U50 to Y98) per DHB.	≥55%, < 65%
4 *Timeliness of NMDS data:* percentage of publicly funded NMDS events loaded into the NMDS more than 21 days post month of discharge.	>2%, ≤5%
5 NNPAC *Emergency Department admitted events have a matched NMDS event:* percentage of NNPAC Emergency Department admitted events that have a matching NMDS event	≥97%, <99.5%
6 *PRIMHD File Success Rate:* percentage of PRIMHD records successfully submitted by the DHB in the quarter.	≥98%, <99.5%

Appendix 1 : Statement of Accounting Policies

The Financial Statements included in this plan have been prepared using the following Accounting Policies. These policies are also used by the Northland District Health Board to prepare its Annual Report which is audited by Audit New Zealand. There have been no changes to the Accounting policies during the periods reported upon.

Reporting entity

Northland District Health Board (NDHB) is a Health Board established by the New Zealand Public Health and Disability Act 2000. NDHB is a Crown entity in terms of the Crown Entities Act 2004, owned by the Crown and domiciled in New Zealand. NDHB is a reporting entity for the purposes of the NZ Public Health and Disability Act 2000, the Financial Reporting Act 1993, the Crown Entities Act 2004 and the Public Finance Act 1989.

NDHB is a public benefit entity (PBE), as defined under NZIAS 1.

The consolidated financial statements of NDHB and group for the year ended 30 June 2010 comprise NDHB and its joint venture subsidiary the Kaipara Total Health Care Joint Venture (54% owned).

NDHB's activities involve funding and delivering health and disability services in a variety of ways to the community.

Statement of compliance

The consolidated financial statements have been prepared in accordance with generally accepted accounting practice in New Zealand (NZGAAP). They comply with New Zealand equivalents to International Financial Reporting Standards (NZIFRS) as appropriate for public benefit entities, and other applicable Financial Reporting Standards as appropriate for public benefit entities.

In addition, funds administered on behalf of patients have been reported as a note to the financial statements.

Basis of preparation

The financial statements will be presented in New Zealand Dollars (NZD), rounded to the nearest thousand. The financial statements are prepared on historical cost basis except for land and buildings that are stated at their revalued amounts.

The accounting policies as set out below have been applied consistently to all periods presented in these consolidated financial statements.

The preparation of financial statements in conformity with NZIFRS requires management to make judgments, estimates and assumptions that affect the application of policies and reported amounts of assets and liabilities, income and expenses. The estimates and associated assumptions will be based on historical experience and various other factors that are believed to be reasonable under the circumstances, the results of which form the basis of making the judgments about carrying values of assets and liabilities that are not readily apparent from other sources. Actual results may differ from these estimates.

The estimates and underlying assumptions are reviewed on an ongoing basis. Revisions to accounting estimates will be recognised in the period in which the estimate is revised if the revision affects only that period or in the period of the revision and future periods if the revision affects both current and future periods.

There have been no changes in accounting policies during the financial year.

The Board and group have adopted the following revisions to accounting standards during the financial year, which have only had a presentational or disclosure effect:

NZ IAS 1 Presentation of Financial Statements (Revised 2007) replaces NZ IAS 1 Presentation of Financial Statements (Issued 2004). The revised standard requires information in financial statements to be aggregated on the basis of shared characteristics and introduces a statement of comprehensive income. The statement of comprehensive income will enable readers to analyse changes in equity resulting from non-owner

changes separately from transactions with owners. The Board and group have decided to prepare a single statement of comprehensive income for the year ended 30 June 2010 under the revised standard. Financial statement information for the year ended 30 June 2009 has been restated accordingly. Those items of other comprehensive income presented in the statement of comprehensive income were previously recognised directly in the statement of changes in equity.

Amendments to NZ IFRS 7 Financial Instruments: Disclosures. The amendments introduce a three-level fair value disclosure hierarchy that distinguishes fair value measurements by the significance of valuation inputs used. A maturity analysis of financial assets is also required to be prepared if this information is necessary to enable users of the financial statements to evaluate the nature and extent of liquidity risk. The transitional provisions of the amendment do not require disclosure of comparative information in the first year of application.

Standards, amendments, and interpretations issued that are not yet effective and have not been early adopted

Standards, amendments, and interpretations issued that are not yet effective and have not been early adopted, and are relevant to NDHB include:

NZ IFRS 9 Financial Instruments will eventually replace NZ IAS 39 Financial Instruments: Recognition and Measurement. NZ IAS 39 is being replaced through the following 3 main phases: Phase 1 Classification and Measurement, Phase 2 Impairment Methodology, and Phase 3 Hedge Accounting. Phase 1 on the classification and measurement of financial assets has been completed and has been published in the new financial instrument standard NA IFRS 9. NZ IFRS 9 uses a single approach to determine whether a financial asset is measured at amortised cost or fair value, replacing the many different rules in NZ IAS 39. The approach in NZ IFRS 9 is based on how an entity manages its financial instruments (its business model) and the contractual cash flow characteristics of the financial assets. The new standard also requires a single impairment method to be used, replacing the many different impairment methods in NZ IAS 39. The new standard is required to be adopted for the year ended 30 June 2014. NDHB has not yet assessed the effect of the new standard and expects it will not be early adopted.

Basis for consolidation

Subsidiaries

Subsidiaries are entities controlled by NDHB. Control exists when NDHB has the power, directly or indirectly, to govern the financial and operating policies of an entity so as to obtain benefits from its activities. In assessing control, potential voting rights that presently are exercisable or convertible are taken into account. The financial statements of subsidiaries are included in the consolidated financial statements from the date that control commences until the date that control ceases.

The consolidated financial statements include the parent (Northland District Health Board) and its subsidiary. The subsidiary is accounted for using the purchase method, which involves adding together corresponding assets, liabilities, revenues and expenses on a line by line basis. All significant inter-entity transactions are eliminated on consolidation.

Transactions eliminated on consolidation

Intragroup balances and any unrealised gains and losses or income and expenses arising from intragroup transactions, are eliminated in preparing the consolidated financial statements.

Investment in subsidiaries are carried at cost in NDHB's own "parent entity" financials statements.

Budget Figures

The budget figures are those approved by the health board in its District Annual Plan and included in the Statement of Intent tabled in parliament. The budget figures have been prepared in accordance with NZGAAP. They comply with NZIFRS and other applicable Financial Reporting Standards as appropriate for public benefit entities. Those standards are consistent with the accounting policies adopted by NDHB for the preparation of these financial statements.

Foreign currency transactions

Transactions in foreign currency are translated at the foreign exchange rate ruling at the date of the transaction. Monetary assets and liabilities denominated in foreign currencies at the balance sheet date are translated to NZD at the foreign exchange rate ruling at that date. Foreign exchange

differences arising on translation are recognised in the surplus or deficit. Non-monetary assets and liabilities that are measured in terms of historical cost in a foreign currency are translated using the exchange rate at the date of the transaction. Non-monetary assets and liabilities denominated in foreign currencies that are at fair value are translated to NZD at foreign exchange rates ruling at the dates the fair value was determined.

Property, plant and equipment

Classes of property, plant and equipment

The major classes of property, plant and equipment are as follows:

- freehold land
- freehold buildings
- plant and equipment
- vehicles
- work in progress.

Owned assets

Except for land and buildings and the assets vested from the hospital and health service (see below), items of property, plant and equipment are stated at cost, less accumulated depreciation and accumulated impairment losses. The cost of self-constructed assets includes the cost of materials, direct labour, the initial estimate, where relevant, of the costs of dismantling and removing the items and restoring the site on which they are located, and an appropriate proportion of direct overheads.

Land and buildings are revalued to fair value as determined by an independent registered valuer every three years. The net revaluation results are credited or debited to other comprehensive income and is accumulated to an asset revaluation reserve in equity for that class of asset. Where this would result in a debit balance in the asset revaluation reserve, this balance is not recognised in other comprehensive income but is recognised in the surplus or deficit. Any subsequent increase on revaluation that offsets a previous decrease in value recognised in the surplus or deficit will be recognised first in the surplus or deficit up to the amount previously expensed, and then recognised in other comprehensive income.

Accumulated depreciation at revaluation date is eliminated against the gross carrying amount so that the carrying amount after revaluation equals the revalued amount.

Property that is being constructed or developed for future use as investment property is classified as property, plant and equipment and stated at cost until construction or development is complete, at which time it is reclassified as investment property.

Where material parts of an item of property, plant and equipment have different useful lives, they are accounted for as separate components of property, plant and equipment.

Property, Plant and Equipment Vested from the Hospital and Health Service

Under section 95(3) of the New Zealand Public Health and Disability Act 2000, the assets of Northland Health Limited (a hospital and health service company) vested in Northland District Health Board on 1 January 2001. Accordingly, assets were transferred to NDHB at their net book values as recorded in the books of the hospital and health service. In effecting this transfer, the health board has recognised the cost and accumulated depreciation amounts from the records of the hospital and health service. The vested assets will continue to be depreciated over their remaining useful lives.

Disposal of property, plant and equipment

Where an item of plant and equipment is disposed of, the gain or loss recognised in the surplus or deficit is calculated as the difference between the net sales price and the carrying amount of the asset. The gain or loss is recognised in the reported net surplus of deficit in the period in which the transaction occurs. Any balance attributable to the disposed asset in the asset revaluation reserve is transferred to retained earnings.

Additions to property, plant and equipment

The cost of an item of property, plant and equipment is recognised as an asset if, and only if, it is probable that future economic benefits or service potential associated with the item will flow to NDHB and the cost of the item can be measured reliably.

In most instances, an item of property, plant and equipment is recognised at its cost. Where an asset is acquired at no cost, or for a nominal cost, it is recognised at fair value as at the date of acquisition.

Leased assets

Leases where NDHB assumes substantially all the risks and rewards of ownership are classified as finance leases. The assets acquired by way of finance lease are stated at an amount equal to the lower of their fair value and the present value of the minimum lease payments at inception of the lease, less accumulated depreciation and impairment losses.

The property held under finance leases and leased out under operating lease is classified as investment property and stated at fair value. Property held under operating leases that would otherwise meet the definition of investment property may be classified as investment property on a property-by-property basis.

Subsequent costs

Subsequent costs are added to the carrying amount of an item of property, plant and equipment when that cost is incurred if it is probable that the service potential or future economic benefits embodied within the new item will flow to NDHB. All other costs are recognised in the statement of comprehensive income as an expense as incurred.

Depreciation

Depreciation is provided using the straight line method on all property plant and equipment other than land, and recognised in the surplus or deficit.

Depreciation is set at rates that will write off the cost or fair value of the assets, less their estimated residual values, over their useful lives. The estimated useful lives of major classes of assets and resulting rates are:

Class of asset	Estimated life	Depreciation rate
Buildings		
Structure	1 to 65 years	1.5% - 100%
Services	1 to 25 years	4% - 100%
Fit out	1 to 10 years	10% - 100%
Plant and Equipment	1 to 10 years	10% - 100%
Motor Vehicles	5 years	20%

The residual value of assets is reassessed annually to determine if there is any indication of impairment.

Work in progress is recognised at cost less impairment and is not depreciated. The total cost of a project is transferred to the appropriate class of asset on its completion and then depreciated.

Borrowing costs

For each property, plant and equipment asset project, borrowing costs are recognised as an expense in the period which they are incurred.

Intangible assets

Intangible assets that are acquired by NDHB are stated at cost less accumulated amortisation and impairment losses.

Costs that are directly associated with the development of software for internal use, are recognised as an intangible asset. Direct costs can include the software development employee costs and an appropriate portion of relevant overheads.

Subsequent expenditure

Subsequent expenditure on intangible assets is capitalised only when it increases the service potential or future economic benefits embodied in the specific asset to which it relates. All other expenditure is expensed as incurred.

Amortisation

Amortisation is provided in the surplus or deficit on a straight-line basis over the estimated useful lives of intangible assets unless such lives are indefinite. Intangible assets with an indefinite useful life are tested for impairment at each balance sheet date. Other intangible assets are amortised from the date they are available for use.

Class of asset	Estimated life	Amortisation rate
Software	2 to 3 years	33% - 55%

Impairment of property, plant and equipment and intangible assets

Intangible assets that have an indefinite useful life, or not yet available for use, are not subject to amortisation and are tested annually for impairment. Assets that have a finite useful life are reviewed for indicators of impairment at each balance date. When there is an indicator of impairment the asset's recoverable amount is estimated. An impairment loss is recognised for the amount by which the asset's carrying amount exceeds its recoverable amount. The recoverable amount is the higher of an asset's fair value less costs to sell and value in use.

Value in use is depreciated replacement cost for an asset where the future economic benefits or service potential of the asset are not primarily dependent on the asset's ability to generate net cash inflows and where the entity would, if deprived of the asset, replace its remaining future economic benefits or service potential.

The value in use for cash-generating assets and cash generating units is the present value of expected future cash flows.

If an asset's carrying amount exceeds its recoverable amount, the asset is impaired and the carrying amount is written down to the recoverable amount. For revalued assets the impairment loss is recognised in other comprehensive income to the extent the impairment loss does not exceed the amount in the revaluation reserve in equity for that same class of asset. Where that results in a debit balance in the revaluation reserve, the balance is recognised in the surplus of deficit.

For assets not carried at a revalued amount, the reversal of an impairment loss is recognised in the surplus or deficit.

Financial Instruments

Non-derivative financial instruments

Non-derivative financial instruments comprise investments in equity securities, trade and other receivables, cash and cash equivalents, interest bearing loans and borrowings, and trade and other payables.

Financial instruments are initially recognised at fair value plus transaction costs unless they are carried at fair value through surplus or deficit in which case the transaction costs are recognised in the surplus or deficit.

Financial instruments are derecognised when the rights to received cash flows have expired of have been transferred and NDHB have transferred substantially all the risks and rewards of ownership.

Financial assets are classified into the following categories for the purposes of measurement:

- fair value through surplus or deficit
- loans and receivables
- fair value through other comprehensive income.

Classification of the financial asset depends on the purpose for which the instruments were acquired.

Financial assets at fair value through surplus or deficit

Financial assets at fair value through surplus or deficit include financial assets held for trading. A financial asset is classified in this category if acquired principally for the purpose of selling in the short-term or is part of a portfolio that are managed together and for which there is evidence of short-term profit-taking.

Financial assets acquired principally for the purpose of selling in the short-term or part of a portfolio classified as held for trading are classified as a current asset.

After initial recognition financial assets in this category are measured at their fair values with gains or losses on remeasurement recognised in the surplus or deficit.

Loans and receivables

Loans and receivables are non-derivative financial assets with fixed or determinable payments that are not quoted in an active market. They are included in current assets, except for maturities greater than 12 months after the balance date, which are included in non-current assets. NDHB's loans and receivables comprise cash and cash equivalents, trade and other receivables, term deposits, Trust / Special Fund assets and related party loans.

After initial recognition they are measured at amortised cost using the effective interest method less any provision for impairment. Gains and losses when the asset is impaired or derecognised are recognised in the surplus or deficit.

The effective interest rate method is a method of calculating the amortised cost of a financial instrument and of allocating interest over the relevant period. The effective interest rate is the rate that exactly discounts future cash receipts or payments through the expected life of the financial instrument, or where appropriate, a shorter period to the net carrying amount of the financial instrument.

Financial assets at fair value through other comprehensive income

Financial assets at fair value through other comprehensive income are those that are designated as fair value through other comprehensive income or are not classified in any of the other categories above. They are included in non-current assets unless management intends to dispose of the investment within 12 months of the balance date.

NDHB's Bond investments that it intends to hold long-term but which may be realised before maturity are held in this category.

After initial recognition these investments are measured at their fair value, with gains and losses recognised in other comprehensive income except for impairment losses, which are recognised in the surplus or deficit.

On derecognition the cumulative gain or loss previously recognised in other comprehensive income is re classified from equity to the surplus or deficit.

Cash and cash equivalents

Cash and cash equivalents comprise cash balances and call deposits with maturity of no more than three months from the date of acquisition.

Accounting for finance income and expense is explained in a separate note

Interest-bearing loans and borrowings

Subsequent to initial recognition, other non-derivative financial instruments such as Interest bearing loans and borrowings, are measured at amortised cost using the effective interest method, less any impairment losses.

Trade and other receivables

Trade and other receivables are initially recognised at fair value and subsequently stated at their amortised cost less impairment losses. Bad debts are written off during the period in which they are identified.

Trade and other payables

Trade and other payables are initially measured at fair value and subsequently stated at amortised cost using the effective interest rate method.

Impairment

At each balance sheet date NDHB assesses whether there is any objective evidence that a financial asset or group of financial assets is impaired. Any impairment losses are recognised in the surplus or deficit.

Loans and other receivables

Impairment of a loan or a receivable is established when there is objective evidence that NDHB will not be able to collect amounts due according to the original terms. Significant financial difficulties of the debtor/issuer, probability that the debtor/issuer will enter into bankruptcy, and default in payments are considered indicators that the asset is impaired. The amount of the impairment is the difference between the asset's carrying amount and the present value of estimated future cash flows, discounted using the original effective interest rate. For debtors and other receivables, the carrying amount of the asset is reduced through the use of an allowance account, and the amount of the loss is recognised in the surplus or deficit. When the receivable is uncollectible, it is written off against the allowance account. Overdue receivables that have been renegotiated are reclassified as current (i.e. not past due). For other financial assets, impairment losses are recognised directly against the instruments carrying amount.

Financial assets at fair value through other comprehensive income

For equity investments, a significant or prolonged decline in the fair value of the investment below its cost is considered objective evidence of impairment. For debt investments, significant financial difficulties of the debtor, probability that the debtor will enter into bankruptcy, and default in payments are considered objective indicators that the asset is impaired.

If impairment evidence exists for investments at fair value through other comprehensive income, the cumulative loss (measured as the difference between the acquisition cost and the current fair value, less any impairment loss on that financial asset previously recognised in the surplus or deficit) recognised in other comprehensive income is reclassified from equity to the surplus or deficit.

Equity instrument impairment losses recognised in the surplus or deficit are not reversed through the surplus or deficit.

If in a subsequent period the fair value of a debt instrument increases and the increase can be objectively related to an event occurring after the impairment loss was recognised, the impairment loss is reversed in the surplus or deficit.

Inventories

Inventories are stated at the lower of cost and net realisable value. Net realisable value is the estimated selling price in the ordinary course of business, less the estimated costs of completion and selling expenses.

Cost is determined on a first in first out basis.

The amount of any write-down for the loss of service potential or from cost to net realisable value is recognised in the surplus or deficit in the period of the write-down.

Interest bearing borrowings

Interest bearing borrowings are recognised initially at fair value less attributable transaction costs. Subsequent to initial recognition, interest bearing borrowings are stated at amortised cost with any difference between cost and redemption value being recognised in the surplus or deficit over the period of the borrowings on an effective interest basis.

Employee benefits

Defined contribution plan

Obligations for contributions to defined contribution plans are recognised as an expense in the surplus or deficit as incurred.

Long service leave, sabbatical leave and retirement gratuities

NDHB's net obligation in respect of long service leave, sabbatical leave and retirement gratuities is the amount of future benefit that employees have earned in return for their service in the current and prior periods. The obligation is calculated on an actuarial basis and involves the projection, on a year by year basis, of the entitlements, based on accrued service. These benefits are estimated in respect of their incidence according to assumed rates of death, disablement, resignation and retirement and the in respect of those events according to assumed rates of salary progression. A value is placed on the resulting liabilities by discounting the projected entitlements back to the valuation date using a suitable discount rate.

Annual leave, conference leave and medical education leave

Annual leave, conference leave and medical education leave are short-term obligations and are calculated on an actual basis at the amount NDHB expects to pay. These are recognised in the surplus or deficit when they accrue to employees. NDHB accrues the obligation for paid absences when the obligation both relates to employees' past services and it accumulates.

Sick leave

NDHB recognises a liability for sick leave to the extent that compensated absences in the coming year are expected to be greater than the sick leave entitlements earned in the coming year. The amount is calculated based on the unused sick leave entitlement that can be carried forward at balance date to the extent the NDHB anticipates it will be used by staff to cover those future absences.

Provisions

A provision is recognised at fair value when NDHB has a present legal or constructive obligation as a result of a past event, it is probable that an outflow of economic benefits will be required to settle the obligation and that a reliable estimate can be made. If the effect is material, provisions are determined by discounting the expected future cash flows at a pre-tax rate that reflects current market rates and, where appropriate, the risks specific to the liability. The movement in provisions are recognised in the surplus or deficit.

Revenue relating to service contracts

NDHB is required to expend all monies appropriated within certain contracts during the year in which it is appropriated. Should this not be done, the contract may require repayment of the money or NDHB, with the agreement of the Ministry of Health, may be required to expend it on specific services in subsequent years. The amount unexpended is recognised as a liability.

Income tax

NDHB is a crown entity under the New Zealand Public Health and Disability Act 2000 and is exempt from income tax under section CB3 of the Income Tax Act 1994.

Goods and services tax

All items in the financial statements are presented exclusive of GST, except for receivables and payables, which are presented on a GST inclusive basis. Where GST is not recoverable as input tax then it is recognised as part of the related asset or expense.

The net amount of GST recoverable from, or payable to, the Inland Revenue Department (IRD) is included as part of receivables or payables in the statement of financial position.

The net GST paid to, or received from the IRD, including the GST relating to investing and financing activities is classified as an operating cash flow in the statement of cashflows.

Commitments and contingencies are disclosed exclusive of GST.

Revenue

Crown funding

The majority of revenue is provided through an appropriation in association with a Crown Funding Agreement. Revenue is recognised monthly in accordance with the Crown Funding Agreement payment schedule, which allocates the appropriation equally throughout the year. It is measured at fair value of consideration received or receivable.

Goods sold and services rendered

Revenue from goods sold is recognised when NDHB has transferred to the buyer the significant risks and rewards of ownership of the goods and NDHB does not retain either continuing managerial involvement to the degree usually associated with ownership nor effective control over the goods sold.

Revenue from services is recognised, to the proportion that a transaction is complete, when it is probable that the payment associated with the transaction will flow to NDHB and that payment can be measured or estimated reliably, and to the extent that any obligations and all conditions have been satisfied by NDHB.

Rental income

Rental income is recognised in the surplus or deficit on a straight-line basis over the term of the lease. Lease incentives granted are recognised as an integral part of the total rental income over the lease term.

Interest

Interest Income is recognised using the effective interest method.

Expenses

Operating lease payments

An operating lease is a lease whose term is short compared to the useful life of the asset or piece of equipment.

Payments made under operating leases are recognised in the surplus or deficit on a straight-line basis over the term of the lease. Lease incentives received are recognised in the surplus or deficit over the lease term as an integral part of the total lease expense.

Financing costs

Net financing costs comprise interest paid and payable on borrowings calculated using the effective interest rate method.

Equity

Equity is the community's interest in Northland District Health Board and is measured as the difference between total assets and total liabilities. Equity is disaggregated and classified into a number of components.

The components of equity are Retained Earnings, Revaluation Reserve (consisting of Land and Buildings), Trust/Special Funds and fair value through other comprehensive income reserves. Special funds are funds donated or bequeathed for a specific purpose. The use of these assets must comply with the specific terms of the sources from which the funds were derived. The revenue and expenditure in respect of these funds is included in the surplus or deficit. An amount equal to the expenditure is transferred from the Trust fund component of equity to retained earnings. An amount equal to the revenue is transferred from revenue earnings to trust funds.

Insurance Contracts

The future cost of ACC claims liabilities is revalued annually based on the latest actuarial information. Movements of the liability are reflected in the surplus or deficit. Financial assets backing the liability are designated at fair value through surplus and deficit.

Contingent liabilities

Contingent liabilities are recorded in the Statement of Contingent Liabilities at the point at which the contingency is evident. Contingent liabilities are disclosed if the possibility that they will crystallise is not remote.

Cost of Service (Statement of Service Performance)

The cost of service statements, as reported in the statement of service performance, report the net cost of services for the outputs of NDHB and are represented by the cost of providing the output less all the revenue that can be allocated to these activities.

Cost allocation

NDHB has arrived at the net cost of service for each significant activity using the cost allocation system outlined below.

Cost allocation policy

Direct costs are charged directly to output classes. Indirect costs are charged to output classes based on cost drivers and related activity and usage information.

Criteria for direct and indirect costs

Direct costs are those costs directly attributable to an output class.

Indirect costs are those costs that cannot be identified in an economically feasible manner with a specific output class.

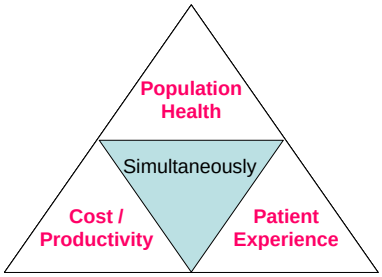
Cost drivers for allocation of indirect costs

The cost of internal services not directly charged to outputs is allocated as overheads using appropriate cost drivers such as actual usage, staff numbers and floor area.

Appendix 2: Regional Health Plan overarching framework

Our Mission

"To Improve health outcomes and reduce disparities by delivering better sooner more convenient services. We will do this in a way that meets future demand whilst living within our means"



Our Region's Strategic Challenges

Inequalities in health status and health outcomes linked to ethnicity and socioeconomic deprivation.

Demand for health care services, and particularly acute care, is predicted to exceed the level of health care resources.

The cost of providing publicly funded health services is growing at an unsustainable rate, influenced by demand pressures, new technologies and labour costs.

Delivery of care is fragmented between primary and secondary services and is based around an episodic model of care which does not work well for people with long term and complex conditions.

There are substantial human and financial costs to our community associated with failures in health and disability services.

Objectives and expected outcomes	Expanded outcomes and high level measures (short, medium, long term)
Strategic Goal 1, Population health: Lift health outcomes of Northern Region population; Life and years (longer, healthier, more independent lives); Reduce health inequalities	
1.1 Minimise impacts from diabetes and cardiovascular disease evidenced by: • improving outcomes for patients and reduced inequality gap • reducing incidence of disease • regionally consistent response and methodology to prevention, care and treatment of those at risk of or with disease • development and support of workforce to meet demand. 1.2 Improve outcomes for older people and have a regionally consistent approach to best ensure the alignment of capacity and demand, by: • reducing the need for older people to enter residential care • reducing older people acute demand on hospital through development and implementation of alternative care settings and care processes • ensuring dementia care needs are met by consistent regional coordination and care pathways • improving the safety and quality of care for older patients in hospital and aged residential care • development and support of workforce to meet demand. 1.3 Minimise impacts from cancer and improve quality of cancer care by ensuring regional equity of access to care, improved treatment times and appropriate screening mechanisms, these approaches evidenced by: • further develop/ improve lung cancer and bowel cancer pathways for the region • improved early diagnosis and management of bowel cancer • partnering with private sector to increase region capacity • reducing wait times for care.	1.11 Develop and implement an auditable clinical pathway for diabetes. 1.12 Develop and implement a GP mentoring system and nurse practitioner model supported by training as required. 1.13 Develop outcomes-based framework. 1.14 Improve data capture and information quality with regard to diabetes and CVD. 1.15 Align diabetes / CVD workforce to meet demand. 1.16 Reduce morbidity and mortality from diabetes and cardiovascular disease (including inequalities between different population rates). 1.17 Better diabetes and cardiovascular services. [HT6] 1.18 Better help for smokers to quit. [HT5] 1.19 Appointment of a diabetes and a Cardiology Clinical Network with supporting resource. 1.21 Understand and manage drivers for admission to ARC. 1.22 Promote Aging in Place in line with national strategy. 1.23 Expand implementation of community gerontology model. 1.24 Develop regional strategies to: reduce ASH rates for older people; manage hospital acute demand from ARC. 1.25 Better support older people with cognitive decline – mental health issues. 1.26 Reduce falls and pressure injuries in hospitals and ARC facilities. 1.27 Appoint an Older People Clinical Network with supporting resource 1.28 Engage in workforce modelling and development. 1.31 Improve lung cancer and bowel cancer pathways 1.32 Implemented Northern Region prioritisation criteria for colonoscopy. 1.33 Deliver a successful bowel screening pilot at Waitemata DHB.

Objectives and expected outcomes	Expanded outcomes and high level measures (short, medium, long term)
1.4 Healthier safer children evidenced by: • increased immunisation.	1.34 Source a long term, sustainable RT solution. 1.35 Monitor time from date of waitlist to colonoscopy. 1.41 Increased immunisation rates. [HT4]
Strategic Goal 2, Patient experience: Better services; First do no harm; Informed choice; Performance improvement	
2.1 Improve safety and quality of the Region's health care across the whole sector: • ensure fewer adverse clinical events result from patient care • understand what harm is occurring (also where and how it is occurring) • raise patient satisfaction with their care • implement regionally consistent methodologies to address regional issues • implement a structured regional collaboration approach to drive progress of safety and quality priorities. 2.2 Informed patient choice to ensure patients get appropriate care that best suits their context: • develop and promote consistent Advanced Care Planning (ACP) • implement Whanau Ora assessments. 2.3 Appropriate health and disability services can be accessed in a timely manner when needed: • rapid access for patients with acute needs • improved access to elective services to restore/ maintain peoples' functional independence • maintain / reduce target wait times for patients accessing the hospital system.	2.11 Develop a safety and quality outcomes based framework with performance indicators, measures and targets. 2.12 Develop 'how to' guides for areas of focus (incl. falls, pressure injuries CLABs, care transfer and patient ID) . 2.13 Establish pilot site for medication safety. 2.14 Complete 50 deaths audit in each DHB. 2.15 Implement 'Trigger Tool' across the Region. 2.16 Establish a campaign with collaborative structure and resource. 2.21 Stocktake existing ACP activities especially in relation to ARC. 2.22 Develop capacity of staff to undertake ACP. 2,23 Increase number of people having an advanced care plan. 2.22 Number of Whanau Ora assessments with agreed goal-oriented plans. 2.31 Shorter stays in emergency departments. [HT1] 2.32 Elective surgical services to be increased in line with elective service Health Target. [HT2] 2.33 Shorter waits for treatment • maintain 4 week radiotherapy [HT3] • reduce wait time for chemotherapy • meet door to cath-lab target time.
Strategic Goal 3, Cost/ productivity: Ensure capacity to meet demand whilst living within our means	
3.1 Regional resources are used effectively and services delivered efficiently with minimal wastage. 3.2 Improve Regional radiology services by: • improving access to, and timeliness of radiology diagnostics. 3.3 Manage infrastructure and assets to ensure safe, efficient and effective services, evident by : • regional collaboration on spatial planning to inform capital planning • delivering major infrastructure developments on time within budget. 3.4 Work in partnership to effectively influence health and wellbeing outcomes, evident by: • improving involvement of internal and external partners in the planning and provision of health services. 3.5 Ensure a consistent region-wide service investment mix prioritisation process to help each DHB determine the optimum service mix. 3.6 Invest in information systems and technology in five priority areas: • common PAS with standard processes and improved data quality related to patient registration • provide a consistent user experience, improve clinical communication options and reduce the complexity of integration and audit functions • meet the requirements of continuity of care • create a single source of truth for regional population health information • maintain current capability and support ongoing development.	3.11 Maximise gains through regional provision of back office shared services. 3.12 Minimal Region delivery variation once good clinical practice is identified. 3.21 Develop a Radiology Clinical Network and agree regional workplan with priorities likely to encompass, models of care, workforce, IS and capital expenditure. 3.31 Develop Regional Spatial and Asset Plan. 3.41 Clinicians engaged in development and management activities. 3.42 Number of planned clinical networks successfully established across Region. 3.43 Number of public/ private partnerships explored and converted to successful implementation. 3.44 Number of IFHCs implemented with social service solutions and implementation of Whanau Ora. 3.51 Prioritisation process developed and agreed for implementation. 3.61 Improved Regional alignment of Patient Administration System (PAS) and PAS processes. 3.62 Improved data quality (consistency of identification and event data). 3.63 Improved clinician satisfaction with access to clinical information.

Appendix 3: Acute Care Reform Programme

The vision of the project is to provide the acutely ill patient access to the highest quality of acute care by the right person, in the right setting- first time. It also aims to assist the achievement of the national 6-hour ED length of stay target.

Key workstreams of the project are in relation to the management of the acutely ill patient in secondary care, as follows:

- primary care – impact on secondary services
- efficiencies in ED
- models of care
- discharge planning
- communication and handover
- use of and access to diagnostics.

NDHB recognises that the care of the acutely ill patient needs to be improved right across all services. The purpose of the Acute Reform Programme is to support the development of consistently high quality care throughout all its services. The key is to reduce variation and develop standardise practices. In essence NDHB wish to ensure that the first assessment of the acutely ill patients is by a competent clinical decision maker, supported when necessary by ready access to senior clinical decision makers. Competent decision making also requires diagnostic support and the availability of these services will need to be better aligned to when and where they are needed. The combination of competent first assessment and appropriate levels of diagnostic support guarantees that the right assessment and treatment are delivered – first time.

Appendix 4: Performance measures from NDHB Maori Health Plan 2011/12

The following pages have been extracted from Northland DHB's *Maori Health Annual Plan 2011/12*. The full plan is available at http://www.northlanddhb.org.nz/publications/.

National indicators

Priority	Indicator	Target(s)	Actions to achieve target	Expected gains		Linkages with regional and district plans[60]
				For health services	For patients/ clients	
Data Quality	Accuracy of ethnicity reporting in PHO registers (y)	100%	Improve collection, quality, availability and sharing of population health data across DHBs and PHOs.	Create a single source of truth for regional population health information potentially supported by a shared population health intelligence team. Better informed and consistent health planning decisions and regional resource prioritisation	Improved health outcomes.	NRHP: 3.6 AP: 3.7 Information Services
Access to care	(1) Percentage of Maori enrolled in PHOs (y)	100%	Enrolment data suggests Maori are well represented in PHOs.	Ability to determine any disparities in access to care between Maori and non-Maori	Ability to participate in targeted approaches to improving health care through Dr Info	NRHP: 2.3 AP: 3.4 Services closer to home
	(2) Ambulatory Sensitive Hospitalisations, age standardised rates per 100,000 (y)	0-4 101 45-64 113 or below 0-74 101 (in relation to national ASH average)	Establish an overarching clinical governance group with clear terms of reference and alignment to TTTAH. LTC Clinical Governance Working Party to establish District-wide performance measurements/ benchmarks by long term condition, aligned to regional standards, once baseline data is established.	Clinical leadership and collective accountability for the quality and delivery of health and disability services. Improved governance of long term conditions district wide.	Improved management of people living with long term conditions. Improved management of people living with long term conditions. Reduced disruption to the lives of people living with long term conditions, specifically cancer and diabetes.	
Maternal health	Exclusive breastfeeding at 6 months (y)	25%	Identify populations with lower rates of breastfeeding. Support midwives to encourage breastfeeding.	Identification of disparities between Maori and non-Maori.	Improved wellness.	AP: 4.2 Prevention Output Class
Cardiovascular disease	(1) Percentage of the eligible population who have had their	76%	Recruit and appoint cardiologist by 30 June 2012. Agree Memorandum of Understanding with the Regional	Increased peer support and review for clinicians. Improved governance and	Improved care and management of CVD. Improved timely access to	NRHP: 1.1, 1.12-1.17, 1.19 AP: 3.2.6 Diabetes

[60] NRHP = Northern Regional Health Plan. Numbers refer to those in its overarching intervention framework (included as Appendix 2 of the Annual Plan). AP = Northland DHB's Annual Plan, section number and title.

Priority	Indicator	Target(s)	Actions to achieve target	Expected gains		Linkages with regional and district plans[60]
				For health services	For patients/ clients	
	CVD risk assessed within the past five[61]* years (q) (ht)		Cardiology Service Plan.	management of CVD-specific services. Reduced clinical risk.	specialist CVD services.	and CVD, 4.3 Early Detection and Management Output Class
			Develop and implement regional performance targets. Investigate ways to better identify and collect data of all known CVD patients upon referral, ED presentation and/or inpatient ward admission. Identify workforce issues. Set Northland-specific targets to align with the Regional Cardiology Services Plan.	Improved and maintained seamless management of CVD patients. Improved clinical and care management of CVD patients while in the secondary setting.	Improved timely access to specialist care services.	
	(2) Number of tertiary cardiac interventions (y) (no target, information only)	Regional Outpatients Service: 70% of patients triaged to chest pain clinics seen within 6 weeks by 01-12-11 80% of patients triaged to chest pain clinics seen within 6 weeks by 01-12-12	Improve equity and access to tertiary coronary services through annual reporting of intervention rates, implementation of regionally agreed measurements Increased access to CVD and Diabetes support – Manaaki Manawa	Improved time to FSA from GP referral to Cardiologist for chest pain	Improved timely access to specialist care services	
Diabetes	(1) Percentage of people who attend their diabetes annual review (DAR) (q) (ht)	Total 80% Maori 80% Other 80% RHP:	Long term conditions (LTC) group to develop the clinical governance framework of performance measures (benchmarks) and	Greater intersectoral participation in management of patient care. Improved reporting on	More equitable and accessible diabetes services, reflected in improved diabetes Health	NRHP: 1.1, 1.11-1.17, 1.19 NDHB AP: 3.2.6 Diabetes and CVD,

[61] Denotes a change from the MHP template to align with Health Target Indicator

Priority	Indicator	Target(s)	Actions to achieve target	Expected gains		Linkages with regional and district plans[60]
				For health services	For patients/ clients	
		Total 80%	evidence-based best practice protocols (MDT, audit, review) for diabetes to ensure district alignment with regional and national priorities and strategic goals. Pilot of protocols. Clinical input into LTC strategic planning. LTC group representation at local diabetes team (LDT) and regional level to ensure "joined-up" clinical governance. Cross-sector clinical representation on local diabetes team. Review role of LDT governance group and where it sits structurally within NDHB, and its role in implementing the Northland Diabetes Strategic Action Plan. Clear and relevant performance measures will be developed that align with district, regional and national plans.	specialist interventions to GPs. Strengthened cross-service provision, with reduced boundaries between services to achieve continuity of service rather than distinct primary and secondary services. Clinical input into LTC strategic planning.	Target performance. Improved management of diabetes reflected in improved diabetes Health Target performance. Fewer hospital visits for people with diabetes as a result of improved care. Early detection and management of the complications of diabetes	4.3 Early Detection and Management Output Class
	(2) Percentage of people with diabetes who complete a DAR and have a HbA1c level less than 8% (q) (ht)	Total 80% Maori 80% Other 80%				
Cancer	(1) Breast Screening (6)	Maori 67.5% Non-M 70.5% Total 70.4%	Breast cancer screening in eligible populations.	Meeting national targets Early detection of abnormal screening results	Prevention of illness and disease. Optimum quality of life for those with long term conditions.	NRHP: 1.3, 1.31-1.35, 2.33, 3.2, 3.21 AP: 3.2.3 HT3 Shorter waits for cancer treatment, 4.3 Output Class: Early Detection and Management Output Class
	(2) Cervical Screening (6)	74% (total pop.)	Cervical cancer screening in eligible populations.	Priority groups identified in the screening programme: Maori, Pacific, Asian, never screened, no screen in last 5 years	Prevention of illness and disease. Optimum quality of life for those with long term conditions.	
Smoking	(1) Hospitalised smokers provided with advice and help	95% of Maori mauiwi	Senior clinicians and management updated monthly on ABC progress. Service ABC progress charts	Reduction in smoking related complications. Decreased preventable	Increased quit attempts. Reduction in smoking rate	NRHP: 1.18 AP: 3.2.5 HT5 Better help for smokers to

Priority	Indicator	Target(s)	Actions to achieve target	Expected gains		Linkages with regional and district plans[60]
				For health services	For patients/ clients	
	to quit (ht) (y)		displayed on quality boards. Smokefree champions will continue to be monitored to ensure that training programme are effective in improving confidence and consistency around their role, particularly when facilitating ABC education for other staff. Targeted guidance and support for the ED team, so that ABC becomes standard practice. Planning will continue for the Mental Health Inpatient Unit to become completely smokefree by late 2011. Takawaenga provide ABC for Maori patients with a particular focus on ED. Support for all staff will continue with free nicotine replacement therapy and ensuring more widespread compliance with the Smokefree Policy. This will be augmented by specific training for the DHB security team in early 2011. All DHB staff who smoke will continue to be encouraged and supported to ultimately be successful in quitting smoking. New signage to better inform staff, patients and visitors of the Smokefree Policy. Appointment of Smokefree Educator with major role in mental health.	hospitalisations, especially respiratory illness, ischaemic heart disease, smoking-related cancers. Decreased GP consultations for smoking-related illnesses. Increase in documentation of smoking status and ABC in Primary Care.	across all ethnicities. Reduction in disparity between Maori and European.	quit, 4.2 Prevention Output Class, 4.3 Early Detection and Management Output Class, 4.4 Intensive Assessment and Treatment Output Class.
	(2) Current smokers enrolled in a PHO	90% Up to 48% of	Increase the rate of advice and help provided to high needs enrolled	Reduction in smoking related complications	Increased quit attempts. Reduction in smoking rate	

Priority	Indicator	Target(s)	Actions to achieve target	Expected gains		Linkages with regional and district plans[60]
				For health services	For patients/ clients	
	and provided with advice and help to quit (ht) (y)	high needs enrolled population are current smokers	populations in the PHOs	Decreased preventable hospitalisations, especially respiratory illness, ischaemic heart disease, smoking-related cancers. Decreased GP consultations for smoking-related illnesses. Increase in documentation of smoking status and ABC in	across all ethnicities. Reduction in disparity between Maori and European	
Immunisation	(1) Percentage of two year olds fully immunised (y) (ht)	95%	Implementation of NDHB Immunisation Strategy in the following key areas: Immunisation (as a key component/indicator of child health services) is recognised and supported as a top priority by the DHB The Immunisation Steering Group (incl CEO) will provide strong leadership and governance direction to the child health work stream Processes to be implemented that collectively support early enrolment with PHOs and well child programmes. Processes will involve key providers e.g. midwives Plunket, PHOs, Tamariki Ora, Maori Women's Welfare League, and will be inclusive of IT solutions Ensure all PHO and NIR data and feedback is timely and of high standard to support best quality performance at a practice level	A more unified and improved health and disability system. Better health and disability services. The health and disability system and services are trusted and can be used with confidence. This measure will also support delivery of the Minister of Health's priorities of strengthening the health workforce and speeding up the implementation of the Primary Health Care Strategy.	Reduced rates of vaccine preventable disease and consequently better health and independence for children, and longer and healthier lives. The changes required to reach the target immunisation coverage levels will lead to better health services for children, because more children will be enrolled with and visit their primary care provider on a regular basis. Delivery against this measure supports the health and disability system outcome of 'New Zealanders living longer, healthier and more independent lives' and the primary intermediate outcome of 'Good health and independence are protected and promoted'.	NRHP 1.4, 1.41 AP: 3.2.4 HT4 Increased immunisation, 4.2 Prevention Output Class

Priority	Indicator	Target(s)	Actions to achieve target	Expected gains		Linkages with regional and district plans[60]
				For health services	For patients/ clients	
			Improve , refine and monitor discharge and referral process of newborns to Well Child providers from maternity, LMCs, Paediatricians Development and distribution of accessible, quality information for service users and providers including GPs CME . Continuation of programme to support the development of quality systems within primary care e.g. pre-calls, re-calls, data management, through provision of practical support and education at GP practice level. Ensure outreach services are universally available throughout Northland. Analysis required for quintile 5 areas to identify gaps in service and recommendations made to Steering Group to lessen any identified inequalities in provision of this service. Continuation of current work to facilitate immunisation as “core business” within NDHB hospital services i.e. Out-Patients, Ward, Child health Centre and ED. To include access to NIR in these areas and also education of staff to enable provision of immunisations as appropriate. Consider development of targeted social marketing that supports key immunisation messages to ‘normalise immunisation’ if coverage does not continue to improve.			

Priority	Indicator	Target(s)	Actions to achieve target	Expected gains		Linkages with regional and district plans[60]
				For health services	For patients/ clients	
			Support immunisation schedule changes as they occur with education resources NIR support and immunisation coordinator support.			
	(2) Seasonal influenza immunisation rates in the eligible population (65 years and over) (6)	To Sept 2010, 60% of eligible population vaccinated For 2011-12 62% of eligible population vaccinated	Immunisation Reference Group to identify Maori enrolled population (65+), to offer the influenza vaccine	Reduction in Maori respiratory conditions presentation at ED	Improved health conditions during the winter period	Not a NRHP or NDHB Annual Plan priority.
Workforce	Percentage of Maori staff in DHBs by occupation class.(y) (no target, information only): management clinical administrative	At Dec 2010: Maori =13% of NDHB workforce. Mgmt/Admin: 22% Clinical: 47% Allied: 26% Support: 21%	NDHB continues to coordinate and allocate HWNZ funding for postgraduate study for nursing and midwifery and the non-regulated workforce. In addition NDHB pursues "Grow our Own" staffing initiatives by providing additional Maori scholarships for staff and a Pihirau Hauora Maori Scholarship for students who whakapapa to Te Tai Tokerau hapu and Iwi. There is also a training fund for the non-regulated Maori health and disability workforce to build their capability and capacity. NDHB's relationships with Auckland University, Auckland University of Technology and NorthTec (Northland's polytechnic) continues to provide future opportunities for doctors, nurses, midwives and allied health professionals to join the organisation. Regional work continuing with Kia Ora Haoura Regional refernce	[Not stated openly, but inference is that there will be better recruitment and retention, especially of Maori workers.] Workforce both clinically and culturally competent	[Not stated openly, but inference is more accessible and appropriate services, especially for Maori.] Improved culturally responsive services to patients	NRHP: 1.28 Regional Activity with KOH and HWNZ AP: 5.1.3 Human resources

Priority	Indicator	Target(s)	Actions to achieve target	Expected gains		Linkages with regional and district plans[60]
				For health services	For patients/ clients	
			gourp – Maori careers services			

Regional indicators

Priority	Indicator	Target(s)	Actions to achieve target	Expected gains		Linkages with regional[62] and district plans
				For health services	For patients / clients	
CVD	Increase number of vulnerable population (Maori) to be screened for CVD	76% of Maori enrolled population	Identify through Information Systems in PHOs the number of Maori at high risk of CVD	Reduced demand on services through improved early intervention identification	People with chronic conditions will live healthier and more fulfilling lives.	RHP 1.1, 1.11-1.17, 1.19
	Maori clients triaged to chest pain clinic within 6 weeks from GP to FSA	70% of Maori patients	Monitor timeframes of referral to FSAs	Reduced demand on services through improved referral system.	People with heart conditions will live healthier and more fulfilling lives.	
Cancer	Monitor and improve performance of lung cancer and bowel tumor pathways	60% of Maori LC patients	Maori Lung Cancer patients discussed at MDT meeting within 28 days of referral from GPs	Reduced demand on services through improved clinical pathways and earlier notifications.	People with cancer conditions will live healthier and more fulfilling lives.	RHP 1.3, 1.31-1.35, 2.33, 3.2, 3.21
		50% Maori patients	Maori LC patients in first treatment within 14 days of MDT mtg			
			Implement a bowel tumor remapping of clinical pathways and identify targets for Northland			
	Northern Region prioritisation for colonoscopy		Determine prioritisation criteria and apply within Northern Region	Reduced demand on services through improved criteria	People will live healthier and more fulfilling lives.	
Diabetes and CVD	Update of self management education programmes – Diabetes/CVD focus	Number people by area who have been through the train-the-trainer	Northland PHOs intend to implement the Stanford Chronic Disease Self -Management Programme (Whakamana Hauora) self management training programme during 2011/12. This utilises a train-the-trainer approach	Reduced demand on services through improved self-management of conditions.	People with chronic conditions will live healthier and more fulfilling lives.	RHP 1.1, 1.11-1.17, 1.19

[62] NRHP = Northern Regional Health Plan. Numbers refer to those in its overarching intervention framework (included as Appendix 2 of the Annual Plan).

Priority	Indicator	Target(s)	Actions to achieve target	Expected gains		Linkages with regional[62] and district plans
				For health services	For patients / clients	
		programme. Number of people who have been through the self-management programme.	and thereafter facilitation of patient self -management groups. An initial cohort of ten trainers in total has completed the training and will serve the Whangarei, Kaipara, Bay of Islands, Mid North and Hokianga region. They will be offering (through a GP referral and self-referral process) 6-week courses for.			
	Improved system of care for diabetes leading to reduction in complications	N/a (completion of pilots)	CVD/diabetes demonstration sites (Mid North and Far North) developed to pilot early intervention pathways and screening.	Reduced demand on services through improved early intervention mechanisms	People with chronic conditions will live healthier and more fulfilling lives.	
Maori health	Engagement of Maori health care providers in clinical networks	At least 30% representation from Maori NGO health sector	Ensure Maori NGOs are invited to participate in clinical networks	An appropriate and culturally responsive service to Maori	Patient receive a culturally responsive service	RHP Strategic Challenge

Local indicators

Priority	Indicator	Target(s)	Actions to achieve target	Expected gains		Linkages with regional[63] and district plans
				For health services	For patients/ clients	
Oral Health	Percentage of Maori children accessing dental care Increase in % of Maori children who are caries free Lower average scores for decayed, missing or filled teeth	Maori Age 5: DMFT 4.42 Caries-free 20% Maori Year 8: DMFT 2.50 Caries-free 25%	Higher enrolments and improved access to community oral health services.	Services are well coordinated to improve access to oral health care for Maori	Children have healthier mouths. Children learn good oral health practices at an early age.	TTT Maori Health Strategic Plan AP: 4.3 Early Detection and Management Output Class, S9.1 indicators PP10 and PP11
Rheumatic Fever	Reduced acute Rheumatic fever notifications among Maori children.	Reduce age-standardised annual rate of acute rheumatic fever among all DHB populations to 0.4 per 100,000 by 2020.[64]	Screen Maori children aged between 9 and 13 for evidence of rheumatic heart disease in specific geographic areas.[65] Increase health literacy among parents and the community. Increase awareness of the condition and how to manage sore throats among GPs.	Reduced acute rheumatic fever hospitalisations Reduced demand on health services. Eventual eradication of rheumatic fever in the Northland population..	Healthier children. Reduced inequity for Maori. Improved mortality and morbidity for the Northland population especially Maori.	Not a NRHP or NDHB Annual Plan priority.
Sudden Unexpected Death in Infancy (SUDI)[66]	Reduced Sudden Infant Death Syndrome (SIDS) notifications	SUDI mortality (rate per 1,000 live births) in children 28 days to 364 days. Breastfeeding rates for Maori mothers:	Continue to raise risks associated with SIDS through Well Child/Tamariki Ora providers and smoking cessation providers. The SUDI Project Team will assess the practicability and affordability of interventions concerning: • infant safe-sleeping policy	Reduced mortality from SUDI	Improved life expectancy for babies	Not a NRHP or NDHB Annual Plan priority.

[63] NRHP = Northern Regional Health Plan. Numbers refer to those in its overarching intervention framework (included as Appendix 2 of the Annual Plan).
[64] This matches the national target suggested by MoH.
[65] Rheumatic fever programmes have been targeted to areas where rates have been highest. Initially this was in Whangaroa (where rates are now zero), more recently in Kaitaia and currently in Kaikohe. Hokianga???
[66] Also important are intiatives to reduce smoking rates, especially for Maori, which are covered in detail in NDHB's *Tupeka Kore* plan, available at http://www.northlanddhb.org.nz/publications/ .

Priority	Indicator	Target(s)	Actions to achieve target	Expected gains		Linkages with regional[63] and district plans
				For health services	For patients/ clients	
		6 weeks 68% 3 months 57% 6 months 25%	• SUDI risk assessment policy, tool and training • % of infants recorded on the NIR at four weeks of age • assessment of infant SUDI risk and intervention needs at service transition points • health professionals' attendance at training in the last four years for SUDI prevention, cultural competencies, Maori responsiveness and/or effective engagement. Maintain Baby Friendly Hospital accreditation for all Northland hospitals.			
Respiratory Conditions	Decrease in respiratory conditions as primary diagnosis in ED for Maori	Reduce rates of COPD, asthma, pneumonia, bronchiolitis, among Maori. Reduce the gap between Maori and non-Maori.	Support the self management of respiratory conditions in Maori to reduce ASH rates improve community-based treatment of respiratory conditions.	Reduction of top four ASH rates for Maori	Improved respiratory care management	AP: 3.8.2 Respiratory conditions