Financing a First Nations and Inuit Integrated Health System

A Discussion Document

Laurel Lemchuk-Favel
FAV COM
February 22, 1999
# TABLE OF CONTENTS

Executive Summary .............................................................. i

Overview ................................................................................. 1
   Scope of the Paper .......................................................... 2
   The Provincial Environment .............................................. 4

First Nations and Inuit Integrated Health Funding ............................... 7
   Why is it needed? ........................................................... 7
      1. Limitations of Health Transfer ................................. 7
      2. Focus of the Western Health System ............................ 8
      3. Lack of Culturally Sensitive or Traditional Programming .... 8
      4. Cost Shifting Concerns ...................................... 8
      5. Limitations to Achieving Efficiencies with the Present System 20
      6. Resources Currently Provider Driven ......................... 22
      7. Current Government Directions .............................. 22
      8. Opportunity for Greater Accountability ....................... 23

Aboriginal/Indigenous Health Systems ......................................... 24
   The United States Experience ............................................ 29

Factors For Consideration in an Integrated Health Funding Approach ........... 32
   Equity in Health Care .................................................. 33
      1. Mortality rates ................................................... 35
      2. Demographic structure ...................................... 35
      3. Socio-economic Risk ........................................... 36
      4. Geographic Location and Community Size .................... 37
      5. Capacity Requirements ....................................... 38
   First Nations and Inuit Population Projections .......................... 39
      Implications of Demography ....................................... 39
      Long Term Impact of Bill C-31 Status Inheritance Rules ...... 40

The Scope of Integrated Health Funding ..................................... 43
   Provincial Overview ................................................... 45
      1. MSB ........................................................... 45
      2. DIAND .................................................... 47
      3. Province of Ontario .......................................... 50
      4. Per Capita Calculations ...................................... 52
   Community Expenditures ................................................ 54
      1. MSB ........................................................... 54
      2. Province of Ontario .......................................... 57
      3. DIAND .................................................... 59
   Combined Expenditure Scenarios ....................................... 59
<table>
<thead>
<tr>
<th>Topic</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>Community Structures and Requirements</td>
<td>62</td>
</tr>
<tr>
<td>Economies of Scale and Purchasing</td>
<td>62</td>
</tr>
<tr>
<td>Governing Body</td>
<td>64</td>
</tr>
<tr>
<td>Capacity</td>
<td>64</td>
</tr>
<tr>
<td>Requirements and Principles</td>
<td>67</td>
</tr>
<tr>
<td>Legislative Environment</td>
<td>68</td>
</tr>
<tr>
<td>Pilots</td>
<td>68</td>
</tr>
<tr>
<td>Observations</td>
<td>70</td>
</tr>
<tr>
<td>Endnotes</td>
<td>75</td>
</tr>
</tbody>
</table>
Overview

For all First Nations and Inuit, a primary goal of health services reform is the improvement of individual and community health status. This can be addressed through two complementary, but distinct, objectives: achieving equity in access to health services and secondly, improving the effectiveness and cost-efficiency of the health services system. Contemporary approaches to health service reform have fundamentally realigned the health system, by placing control closer to the community and by instituting allocation mechanisms which are responsive to local needs. Among First Nations and Inuit, the progression to community control of health services can be seen through the first contribution agreements, to integrated community-based service agreements and today’s transfer agreements.

The purpose of this paper is to stimulate discussion on an integrated funding approach for First Nations and Inuit health services whereby health resources from both federal and provincial sources can be seamlessly combined at the community level. Many First Nations and Inuit have successfully embraced Health Canada’s Health Transfer initiative and have or are presently designing health systems which are more reflective of Aboriginal needs, both individually and at a community level. These innovations, however, have been impeded by the lack of integration and harmony among the complete spectrum of health programs and services, as funds and/or services are received by different government departments independently. Health Transfer has established a track record and a foundation for communities who wish to develop a more integrated health system, one which is holistic and compatible with the Aboriginal goal of self-determination. As one mental health worker eloquently expressed at a workshop on suicide:

*People think the government can do something about it, or the hospital, or the doctors and nurses. But I think it has to come from within us as communities. . . We have to take responsibilities and control for what’s happening in our communities. We can no longer blame the government, or Ottawa, or anybody else.*

The Royal Commission on Aboriginal Peoples (RCAP), in its lengthy deliberations on the past, present and future of Aboriginal people in Canada, has provided a new paradigm for Aboriginal peoples’ health. The following four guidelines for action were developed after the most extensive and comprehensive consultation in the history of indigenous peoples.

1. Equity of health and social welfare outcomes
2. Holism in the diagnosis of problems, their treatment and prevention
3. Aboriginal peoples’ control over health systems
4. Diversity in the design of systems and services.

RCAP’s guidelines provide a framework to create and evaluate a new financing model for First Nations and Inuit. Regarding the first point, the allocation of resources should be designed to facilitate equitable health status, both compared with non-Aboriginal populations, and within the different Aboriginal peoples. Addressing equity means a focus on the financing of health needs, not services.

Holism is reflective of Aboriginal peoples concepts of health and well-being, which are very similar to a socially determined wellness model based on broad determinants of health. Holism means that optimally social and health services should be integrated. At the very least health and health-related services should be coordinated in a holistic manner, which respects physical, mental, emotional and spiritual outcomes.

Control over health systems relate to the self-determination aspirations of Aboriginal people, but in a broader sense, it is confirmed by research which shows that persons with control over their life events will have better health and will live longer. RCAP argues forcefully that a piece-meal approach to health programs and services by policy-makers is counterproductive to self-government development among communities and nations.

Diversity in the design of systems and services is a recognition of the different cultural approaches to health and healing that exist among different Aboriginal groups, such as First Nations, Inuit and Métis. Diversity also means a co-existence of traditional approaches to healing with the western model now used as the basic health services structure in First Nation and Inuit communities.

**Scope of the Paper**

The scope of integrated funding described in this paper includes health funds from Health Canada and provinces, and health-related funding from the Department of Indian Affairs and Northern Development (DIAND). Issues and options for further investigation and consultation have been identified. In the development of this discussion paper, some fundamental principles of integrated indigenous health systems were assumed. An integrated system should:

- build on the experiences and progress to date in improving the First Nations and Inuit health system, including the current Health Transfer initiative;
- be aligned with the desires and need for First Nations and Inuit to control, in a
meaningful sense, the administration, planning, delivery of their health system, both now and in the future;

- be sufficiently flexible to allow unique expressions of a health system, which may incorporate both indigenous and western perspectives;
- embrace existing knowledge on determinants of health and its contribution to the design of a health system;
- allow an accountability to First Nations and Inuit communities and funders;
- be compatible with self-determination and self-government goals of First Nations and Inuit;
- be adaptable to meet the health financing requirements of all First Nations and Inuit communities, which may vary according to community size, geographic location, and health status;
- be founded on the principles of equity in access to health resources; and
- lay out a long term vision of a health financing system, which may be implemented at the pace desired by communities.

Although the central theme in this paper is financing reform, it should be seen as a tool which will facilitate a broader reform of the health system directed to integrating health services to achieve increased efficiencies, effectiveness, and improved First Nations and Inuit health. Accordingly, this paper will present an overview of future directions in health service reform which would complement a new financing approach.

This financing approach is illustrated using 1997/98 expenditures to First Nations in Ontario. An analysis is presented which looks at all health and health-related expenditures to First Nations and Inuit, both in the province overall, and for two First Nations health authority models: a single community and a tribal council.

A three year trend analysis on the non-insured health benefits (NIHB) program is presented. This program, which now accounts for 52% of the federal government’s financial contribution to health services of First Nations and Inuit, is very sensitive to changes in financing in diverse sectors of the health system. This is due to its mandate as a program of last resort for medically necessary services. The NIHB program, as part of an overall Health Canada capped budget, is encroaching on the balance of resources directed community health services in this budget, as it has proven difficult to control these NIHB health costs in a meaningful way. The analysis looked specifically for evidence of cost-shifting between different health funders which has impacted on the NIHB budget. Potential solutions to this cost shifting are discussed in the context of First
Nations and Inuit health system reform.

Finally, it is not the intent of this paper to advance the concept that the current services delivered by Medical Services Branch (MSB) financing are fundamentally wrong. Indeed, as Health Transfer has shown, community health plans often look remarkably similar to services provided in the pre-transfer environment. The poor health status of First Nations and Inuit (which will not be documented here) result from a complex interaction of social conditions, economic circumstances, in some cases diet, the consequences of the Indian Act in defining a reserve system, jurisdictional service issues, lifestyle choices, the residential school legacy, the relocation experience of some communities, and the overall breakdown of Aboriginal culture and community cohesion. The financing vehicle for First Nations and Inuit services, however, must keep pace with the need for an Aboriginal controlled, holistic approach to community, family and individual healing. As well, the segmentation of funding among federal and provincial government departments limits opportunities for cost efficiencies, an issue which is absolutely essential in First Nations and Inuit communities which are feeling the impacts of a federal funding cap and provincial downsizing.

First Nations and Inuit communities are essentially powerless to affect change in the largest expenditure area, the NIHB program; to proactively address the consequences of reduced hospital services in the provincial sector; or to redesign the physician-focused primary care system to meet unique Aboriginal circumstances and culture. Given the great health needs of Aboriginal people and their continued poor performance in health indicators, reductions in the demand side of the financing equation are not expected in the short term. Cost containment must be found in the supply side, and can be facilitated by an integrated method of health financing.

The Provincial Environment

The focus of this paper is First Nations and Inuit health systems, but as these systems are influenced and dependent on provincial systems outside of the community borders, a brief review of recent changes to the provincial health systems is essential in order to understand the factors which have been considered in the reforms envisioned here.

Great strides have been made over the years in developing cures and treatments for many of the illnesses which affect populations, but biomedical advances have proven to be limited without equal attention to two other areas integral to improving the health of a nation – population health, which addresses the broad determinants of health including lifestyle and socio-economic conditions, and the management, organization and delivery of health services, which have an
impact on accessibility to health services, efficiency of resource utilization and the effectiveness of services provided. It is the latter variable, that concerning the management, organization and delivery of health services which is most directly linked to health financing. This relationship is evident in the provincial health systems, which now are the throes of changing their delivery systems to more effectively and efficiently manage limited resources. Canadian health system reform was sparked by the escalating provincial health costs in the 1980s, at a time when the federal government was restraining the increases to health transfers to the provinces, then more recently, actually reducing these transfer payments. Provinces have responded to the decrease in federal contributions in two fundamental ways.

- The first was to reorganize the care delivery system, both for fiscal reasons and to improve the quality of care provided. The goal of this reorganization was to integrate health services and provide a continuum of care from primary through tertiary to community-based services. In real terms, the mechanism of this reform centered on reducing services in the area which demanded 41.7% of total resource expenditures in Canada in 1993 - the hospital sector. Hospitals, primarily those in acute care, are being or have been closed, merged, or reduced in numbers of inpatient beds. A new paradigm on health care is being developed, one that has utilized new technologies and procedures to reduce inpatient stay, which has re-evaluated the roles of different health professionals in the system, but which has also relied to an increasing extent on community based services and informal caregivers to provide care previously assumed by hospitals.

- The second provincial response was to fundamentally realign the organization and management of the health system to bring it closer to home, to devolve resource allocation to the community level, and to place accountability and decision-making in the community. This has been seen through regionalization initiatives in nine of the ten provinces (all except Ontario). Regional or district health councils have resource envelopes from which they fund services according to health needs of the region, and have the freedom to adjust the spectrum of services within the mandate of the Canada Health Act and provincial health priorities. The scope of services varies from province to province; for example Prince Edward Island includes health, social and correctional services in its regional envelope, whereas another province’s envelope may contain mainly health institution resources.

With First Nations and Inuit, despite the advances made by Health Transfer in consolidating funds, the resourcing of health services is fragmented into separate agreements and programs, and
both federal and provincial governments have responsibility for funding of health services. The federal component of health services to First Nations is funded through MSB of Health Canada, although DIAND funds health-related social services such as Child and Family Services and Adult Services. MSB has been moving to integration of health funding with the Health Transfer program, but even for those communities which have undergone health transfer, nationally administered programs including the NIHB Program have remained outside of the transfer funding envelope.

Provincial involvement in First Nations and Inuit health is primarily through provision of physician and hospital services, as required under the Canada Health Act. A few provinces, such as Ontario, provide additional Aboriginal or First Nations/Inuit health programs. In the provinces where regional health authorities have assumed responsibility for resource allocation of health services, these authorities are charged with the provision of health services to First Nation and Inuit persons residing within their jurisdiction. If a regional authority’s resource envelope includes hospital budgets, the calculation of resources to these institutions includes those persons living in First Nations or Inuit communities. To date, physician services have not been included in regional funding envelopes, however a number of provinces are now investigating alternate payment systems for delivery of physician resources, such as capitation using rostered or enrolled populations. Therefore the situation may arise where regional health authorities will also be administering primary care physician budgets, which will include resources targeted to delivery of physician services to the First Nations or Inuit population in the region.

Presently, federal and provincial cost containment and reduction strategies for health care affecting First Nations and Inuit occur in isolation from each other. For these communities, the implications of these strategies are often more profound than for the general population, as services are obtained from both jurisdictions, and reductions in one jurisdiction may place added stress on the services provided by the other. This issue will be discussed more thoroughly in a subsequent section of this paper.
First Nations and Inuit Integrated Health Funding

Why is it needed?

This paper’s overview has introduced some of the main catalysts to the establishment of an integrated health funding model. The justification to a further evolution of financing arrangements is multifaceted and as described in this section, is based on Aboriginal desires for enhanced control over health services, the need for flexibility in designing health programs, the current policy directions of the federal government and the limitations imposed by the current system to proactively meet the fiscal realities of capped resources and a growing Aboriginal population.

1. Limitations of Health Transfer

As already highlighted, one of the main impetuses for reform to the financing mechanism in First Nations and Inuit health care relates to a desire by First Nations and Inuit to obtain more control over their health system. Health Transfer is the current mechanism to provide increased community control, but it has been subject to various criticisms, for example, some First Nations feel that it will impinge on their rights guaranteed under treaties and the fiduciary responsibility of the federal government. First Nations are also concerned about future roles and responsibilities of Health Canada. The Auditor General in his 1997 review of MSB concluded that the framework for transfer was basically sound, although accountability mechanisms and evaluation procedures were in need of development. He highlighted the concern of some First Nations that the government may be pursuing a ‘dump and run’ strategy, and that communities would not be prepared to adequately design and manage health programs when MSB leaves the service delivery business. In the end, this scenario could be judged, sometimes unfairly, as mismanagement by bands or communities.

Communities which have transferred have more operational concerns, and transfer is seen as an intermediary, rather than final step to full self-determination in health care. The existing transfer arrangements have been described as mainly an administrative devolution of services, as communities report that they are restricted in the type and scope of health programs which may be implemented under health transfer. Communities despite the stated health transfer objective “to enable Indian communities to design health programs, establish services and allocate funds according to community health priorities” find that their final approved community plans resemble
closely existing MSB programs and services. This may be due, in part, because the transfer budget is only one part of the communities’ primary care resources, and the community cannot access for transfer, either physician budgets (a responsibility of the provincial governments) or other primary care resources, such as dental, vision and chiropractor services (which remain outside of transfer in the MSB envelope). Primary care funds eligible for transfer, particularly in small communities with only visiting nursing services and a community health representative, present a limited, partial resource pool for system redesign.

2. **Focus of the Western Health System**

The Canadian health system is focused on curative services. As well, the mainstream health system’s emphasis is on physical and mental domains over the spiritual and cultural components of well being. Compounding this is a lack of integration of social and health services at federal, and First Nations/Inuit levels, and also in most provinces. Thus, there is no single, concerted approach to improving health through addressing biomedical and social needs of a community. Integration of funding will provide a tool for First Nations and Inuit communities to develop a greater coordination of health and health-related services, and it will lay the foundation for future integration of social services as communities progress in their self-government aspirations.

3. **Lack of Culturally Sensitive or Traditional Programming**

Culturally based health programming, which Aboriginal people have clearly stated is crucial to improving community and individual well being, is still rare, and therefore a holistic approach to healing does not commonly exist,. This paper does not advocate any particular method of healing whether it be western-based or traditional, rather its purpose is to identify potential areas for health system improvement which may be facilitated by the devolution of financing to community control. The section “Aboriginal/Indigenous Health Systems” addresses in more detail Aboriginal views of health service delivery.

4. **Cost Shifting Concerns - The Example of the NIHB Program**

As stated above, First Nations and Inuit are particularly vulnerable to cost shifting as two governments, comprising three main ministries (provincial ministry of health, Health Canada, Indian and Northern Affairs Canada) independently and without mutual consultation, provide resources for First Nations and Inuit health and health related services. This has very real consequences, for example, provinces which have aggressively promoted hospital downsizing or
closures, are downloading costs to the home care sector as patients are discharged earlier. Home nursing costs on-reserve are a federal responsibility in the view of most provincial governments, and therefore the existing federal envelope of funds must accommodate increases to home care expenditures. In reality, the federal envelope is already being squeezed through the increased demands of the NIHB Program, and there is little or no room for any community health expenditure increases.

In a closed system created by integrating all health resources, First Nations and Inuit would have the means to deal proactively with jurisdictional issues such as cost-shifting. The following analysis looks in depth at the NIHB Program in Ontario Region for evidence of cost-shifting from the provincial government. In the preparation of this report, little real evidence was found of cost-shifting from the federal government to the provincial or territorial governments. Some persons might say that the arbitrary enforcement of a funding cap for MSB services to a population in great need which is experiencing sizable population growth is, in essence, creating a climate for cost-shifting to the provinces, if indeed there are services to shift to. The small amount of information available on First Nations utilization of Ontario health services does not support a shift to provincial services. As a subsequent section will show, First Nations’ utilization of Ontario Health Insurance Plan (OHIP) services as evidenced through per capita expenditures has decreased since the early 1990s, and is substantially lower than the rest of the Ontario population.

With most First Nations and Inuit health services, a chicken-and-egg scenario exists. Does the federal government provide services because the provincial governments do not or do the provincial governments not provide services because they are already covered by the federal government? The issue of NIHBs is more clear cut. The NIHB Program is a federal program of last resort that provides prescription drugs, dental care, eye care including eyeglasses, eye exams and repairs to frames, medical supplies such as wheelchairs, crutches, hearing aids and orthotic services, medical transportation to health facilities outside the community including meals and accommodation, mental health counseling (crisis intervention), and health insurance premiums for First Nations citizens in B.C and Alberta. Prior to the recent NIHB mandate renewal with Treasury Board, some allied health services such as podiatry, chiropractic care and physiotherapy were also covered.
Provincial Coverage Changes

Cost shifting from the provincial government to the NIHB Program can occur in two main ways:

(a) Direct delisting of insured services by the province. The most commonly cited area for delisting is pharmaceutical insured coverage. For example, if a provincial drug benefits plan delists certain pharmaceuticals from its insured list, then eligible First Nations and Inuit would turn to the NIHB Program for reimbursement of expenditures relating to these de-insured drugs. Another example is in the frequency of reimbursement for certain insured services, such as optometrist care in Ontario, or removal of coverage entirely such as in dental care or optometrist care in other provinces.

A recent study by William M. Mercer Ltd for the Health Care Coordination Initiative Secretariat of the federal government examined health care expenditures of federal clients (including Health Canada) which are outside of the Canada Health Act. It found that federal clients should be particularly concerned about further devolution of health services given the past trends. Since supplementary coverage for First Nations is provided through the federal programs, they were seen as potentially easy targets given that delisting by the provinces would be picked up by the federal programs. This study looked at seven primary areas for continued devolution of expenditures:

Prescription drugs: Prescription drugs were rated as the greatest single risk to the federal departments in provinces where coverage still exists, such as in Ontario, Quebec and Manitoba. Federal clients were seen as facing a threat of complete delisting of coverage. When First Nations were delisted from the British Columbia pharmacare plan, the NIHB Program absorbed a $4 million cost increase.

Vision Care: The Mercer Report predated the latest change to the vision care benefits instituted by Ontario, however it warned of impending restricted coverage or tightened eligibility in this area. As is covered below, the vision care changes brought in this year in Ontario have had a revenue neutral effect on the NIHB Program.

Paramedical Services: Provinces such as BC, Alberta and Ontario have coverage for paramedical services, which are based on maximum reimbursements (per visit and annual). The Mercer Report warned of the risk of further devolution, as these
services could be seen as discretionary and therefore more vulnerable to cutbacks. This is one area which is outside of the NIHB Program as paramedical or allied health services are not within the Program’s mandate.

**Dental Services**: There are few dental services covered by the provinces, other than surgical procedures. Future changes could impact on the age of children which are covered, or the limits to coverage based on income. These would all have a significant impact on the NIHB Program, as dental care is a core component.

**Ambulance**: The potential for delisting was identified in land ambulance services. This would have a great effect on NIHB Program clients, who are largely rural and who have a high incidence of hospitalization.

**Provincial Mental Health Services**: Some off reserve First Nations access provincially sponsored community health centres, and the Mercer Report has targeted these services as potential areas for delisting.

**Assistive Devices Program**: The Mercer Report indicated that the Assistive Devices Program in Ontario could be a future target of delisting by extending coverage based on income.

(b) **Changes to the provincial health care system.** This is more difficult factor from which to assess quantitative impacts on the NIHB Program, but nonetheless, it has the capacity to profoundly affect the Program, both directly through removing patients earlier from the protective umbrella of the *Canada Health Act* (i.e. early discharge to the home) and indirectly through poor health outcomes. Both of these factors are discussed below:

**Poorer Health Outcomes**: Although no provincial or territorial health system would deliberately set out to institute changes to its health system that would adversely effect the client outcomes, this has been a concern in all of the jurisdictions which have restructured their health system. The creation of a more responsive, cost-efficient, effective and appropriate health system has been the goal of all reform efforts. Criticisms of restructuring have largely been centred on its fast pace of implementation and the inability for new modes of health care delivery to replace traditional, expensive hospital-based care on a timely basis.
Within the hospital system which remains, concerns have been raised over availability of care (less beds and a further distance to travel to remaining hospitals) and quality of care (fewer staff to attend to patient needs) by diverse professional and consumer groups. The more recent health service reinvestment strategies, both real and proposed, of provincial and federal governments which now have their fiscal houses in order, gives credence to the legitimacy of these concerns. Persons who cannot access beds, do not recover as fast or suffer setbacks due to a reduced LOS all have cost implications on the NIHB Program.

*Replacement of Hospital Services*: One of the most visible effects of restructuring has been the shortening of length of stays in acute care hospitals. Regardless of a debate about health outcomes in a post-restructured environment, there are real costs which have been shifted outside of the hospital confines. As more day surgeries replace in-patient procedures and people are discharged earlier to become clients of home care services, more home care is required and an increased acuity of care is present in this environment. As *Canada Health Act* insured services are often the boundary between provincial and federal jurisdictions for First Nations and Inuit services, the financial impact of restructuring is felt beyond the NIHB Program to all community health services of First Nations and Inuit. However, the effect on the NIHB Program maybe seen through increased drug costs relating to drugs which would have been covered under hospitals’ global budgets or due to poorer health status outside of a medical facility, increased expenditures for medical supplies and equipment needed in the home, and increased medical transportation costs for patients who have been discharged early and which return for medical check-ups or for re-admission.

**Other Health System Changes**

The broad scope of the NIHB Program which extends to medical supplies and equipment means that it must respond to changes in the clinical environment which are independent of restructuring activities of provinces. These factors include:

*Technology Changes*: As medical supplies and equipment are covered under NIHB Program, changing technology will impact on expenditures. For example, intravenous lines needed in the home, glucose testing kits for diabetes, and simple supplies like bandages can be new and improved and increase in price. New, more effective
pharmaceuticals are also implicated in NIHB expenditure increases.

\textit{Clinical Practice Guidelines:} As health care providers standardize treatment protocols in an effort to provide more appropriate and effective care, the effect may be an earlier treatment regime and a greater scope of eligibility for treatment. For example, changes in clinical practice guidelines for diabetes which incorporate a lower cut off for blood glucose levels means treatment starts earlier. This treatment can include a need for glucose monitoring kits, needles and syringes, and the like.

**Changing Demographics**

First Nations are living longer, and the population is increasing; two very important factors when assessing the demand for the NIHB Program. The aging population has been implicated in rising health costs, particularly in pharmaceuticals and home care. As well, lifestyle issues may affect utilization of benefits. AIDS is only now beginning to be seen as an impending epidemic among the Aboriginal population, and its high cost is felt in all areas of the health and social system. For example, treatment of AIDS patients who may wish to stay or return to their home communities will mean increased demand for home care services, and the need for skilled, appropriate care in the community.

Rising NIHB costs can be due as well to simply increased utilization. It is beyond the scope of this analysis to comment on whether increased utilization is a result of a worsening of health of First Nations people, increased awareness of the availability of services, increased access to services which are becoming more culturally appropriate and First Nations managed, or other factors.

**Ontario Region NIHB Program**

The Ontario Region NIHB Program has been analyzed by benefit category over a three year period to investigate the role of cost-shifting between jurisdictions and it relationship to expenditure increases. The most recent three year period was selected (1995-96 to 1997-98). This time period includes the NIHB mandate renewal of Treasury Board which in essence caused a “delisting” of its own, as allied health services were definitively placed outside of the NIHB Program. Although some of the resources, for example, foot care and chiropractic care, have found a place elsewhere in the region’s budget, the effect on the overall NIHB budget has been to dampen the increase driven by other components, notably pharmaceuticals and medical transporation.
As Figure 1 illustrates, the time period of 1995/96 to 1997/98 which has been selected for review avoids the period of escalating cost increases which occurred in the early 1990s. By 1994/95, the continuous rise in the NIHB Program had peaked, with the stabilization thereafter coinciding with the new policy of a budgetary cap for the MSB program as a whole. The MSB funding envelope was allowed to grow by 6% in 1995/96 followed by 3% (increase calculated on 1994/95 levels) in each of 1996/97 and 1997/98.

In the NIHB Program, a decline of 2.6% in total expenditures was seen between 1995/96 and 1996/97. As will be discussed below, this decline was somewhat artificial as resources were moved from the NIHB budget, although the dental program achieved a real, substantial decrease. Between 1996/97 and 1997/98, NIHB costs rose by 6.7% due primarily to stabilization of many benefit categories, counterbalanced by increases in the drugs, supplies and equipment, and transportation categories.

Figures 2 and 3 provide a visual description of the expenditure trends in the major categories of the NIHB Program: dental care; drugs, supplies and equipment; health professional services; contracts for health professionals; counseling/mental health contracts; vision care; and transportation. Health professional expenditures have been split into three categories to illustrate the changes in the benefit area over the three years depicted. Figure 2 presents gross expenditures in current dollars, and gives a macro view of the actual changes in the benefit expenditure areas.
Figure 3 has converted these gross expenditures to 1986 constant dollars (thereby controlling for inflation by use of the consumer price index) and also presents these values on a per capita basis. Therefore, both inflation and population increases have been controlled, and expenditure fluctuations, in the absence of changes to the eligible list of benefits, can be attributed to two main factors: changes in the price of items and changes in utilization of items.

Figure 2 illustrates that in real terms, substantial increases to the NIHB Program over the three year period under review occurred in the drugs, supplies and equipment category (15.5%), and the transportation category (27.7%). A minor increase was also seen in the vision care category (2.1%). Overall, however, the NIHB Program budget increased only 3.9%. To explain this low overall increase, an analysis by benefit category is required:

**Dental Care**
Dental care is a benefit category that has historically experienced unchecked rising costs. For example, for Ontario from 1990/91 to 1994/95, dental costs rose 67.6%\(^7\) (data not shown), and previous analysis have suggested a number of factors for this: an increased eligible population, increased costs of treatment, and increased utilization per person. However, in 1996/97, a frequency based program was put in place nationally, where limits were established for certain procedures such as dental hygiene. This new policy resulted in a short term dip in total expenditures, but the longevity of such a program in reducing costs was not put to the test, as in the following year, a pre-determination program was instituted for all dental care. Now all dental plans must be submitted for examination and approval by MSB, and a holistic look at the dental needs of a patient is encouraged. These two management strategies have been very effective in holding down and in fact decreasing the dental budget over the last two years. In real dollars, it has decreased 22.3%; when controlling for inflation and population increase, the constant dollar, per capita decrease was actually 29.1% from 1995/96 to 1997/98.

**Drugs, Supplies and Equipment**
This category has experienced similar rising costs in the early 1990s as noted in the dental program. In this case, expenditures rose 59.1% from 1990/91 to 1994/95 in actual dollars (data not shown). In contrast to the successful management strategies employed by the dental program which has controlled dental costs, costs in the drugs, supplies and equipment area have continued to rise in the past three years, although not quite as sharply. In the time period under review, these costs have increased 15.5% in actual dollars, or 5.4% in per capita constant dollars. Ontario Region has not seen significant delisting of pharmaceutical drugs from the Ontario Drug Benefit (ODB) plan\(^8\). The Ontario government is the only province to coordinate benefits with MSB,
which means that eligible First Nations clients are covered under its ODB Plan.

One provincial change to ODB benefits has impacted the NIHB Program recently. On July 15, 1996, the Ontario government instituted a $2.00 co-payment for prescriptions filled to low income and social assistance recipients and a $6.11 co-payment prescription fee with $100 deductible for ODB clients who are single seniors earning over $16,000 a year or couples earning over $24,000 a year. This has been estimated to have impacted the NIHB Program by $2 million over the last two years.9

There are two strategies in place at a national level that have been implemented to control the rising drug costs. The Drug Utilization Review process has been developed to evaluate prescribing, dispensing and utilization patterns and to implement activities and interventions to optimize drug therapy. Secondly, the Program has recently implemented a Point-of-Service Claims Processing system, which allows the capturing and approval of drug claims in a real-time environment. Currently, 80% of pharmacies are on-line. Certain categories of drugs require prior approval for eligibility before release. Both strategies have been described as helpful in controlling drug costs.10

Vision Care
Vision care expenditures have been essentially stable over the last three years, as real costs rose by 2.1% from 1995/96 to 1997/98, or if constant dollars, per capita expenditures are considered, a decrease of 6.8% was achieved. This is despite a recent change in the frequency of eye exams which are covered under OHIP. The province of Ontario, at the same time as initiating the frequency-based policy, implemented an exception process whereby ophthalmologists can request an added exam for certain medical conditions such as glaucoma. This has meant that MSB has not had to pick up extra eye exam visits which are medically necessary and fall under the province’s exemption list.

Health Professional Services
Allied health services have been a small component of the NIHB Program, and never were included in the original mandate of the program. As a result of the mandate renewal with Treasury Board, allied health services were definitively removed from the Program. As Figure 2 shows, the expenditure level for Health Professional Services was just over $1 million in 1995/96, and within two years, was removed completely from the Program. This category covered foot care, chiropractic care, emergency speech therapy and emergency physiotherapy. Approximately $350,000 relating to foot care was removed in 1996/97 and converted to operating dollars as part
of the nursing budget in the Diabetes Program. The following year, a similar amount was removed to Basic Health Services for chiropractic care. The Ontario Region is currently deciding whether or not it can sustain this chiropractic program. MSB now picks up the portion of chiropractic costs that OHIP does not cover. As chiropractic care does not have a regulated fee structure, chiropractors are charging from $25 to upwards of $95 for one visit (OHIP covers approximately $10 of this amount). If this program is sustained at Ontario Region, MSB will have to establish a uniform co-payment level. Emergency speech therapy and emergency physiotherapy are no longer covered by the NIHB Program, as by definition, an emergency service should be covered by the provincial medical plan.11

**Contract for Health Professionals**
This category covered mental health contracts, and in 1996/97 was converted to operating dollars under Building Healthy Communities.

**Counseling/Mental Health Contracts**
This benefit area shows a 27.7% drop in real dollars over 1995/96 to 1997/98, however the actual drop was between the first two years of this time period. In 1995/96, the fee for service (FFS) mental health unit was established and the NIHB Program was analyzed for services which did not meet criteria. FFS mental health services which should have been in Building Healthy Communities were removed. In the last two years, a 30% increase has occurred in this category, and has been attributed to increased demand for the short-term crisis intervention services which are now funded under the NIHB Program.

**Transportation**
In the three years under review, transportation services have been undergoing a shift from MSB managed FFS to First Nations contribution agreements. Overall, transportation costs are up 27.7% in real dollars or 16.5% in constant, per capita dollars. This increase has been attributed to client demand, and is the single, largest increase in the NIHB Program for the time period 1995/96 to 1997/98.

A looming concern expressed at the Ontario Region is the area of ambulance services. Currently, ambulance services include a $45 copayment which the NIHB Program covers. The province is moving the administration of emergency transportation services to the municipalities. Although the province has assured the municipalities that only management and delivery of the service, not funding will change, the response of the municipalities is an unknown at this time. Ontario’s ambulance services are seen as costly and inefficient by international standards, and recent media
attention will force municipal governments to address this issue. An offloading of costs could have significant consequences on the NIHB Program in Ontario.

Summary
The two main areas where NIHB Program is experiencing continued cost increases are the drugs, supplies and equipment, and transportation categories. Crisis intervention mental health services have increased, however this benefit category is of far lower magnitude. Overall, expenses have been controlled in the Program by the establishment of a pre-determination for dental services, the removal of allied health services (the majority of which have been transferred to other expenditure categories) and transferral of FFS mental health services resources to Building Healthy Communities.

Examples of cost shifting have been seen in:

- provincial copayment requirements in the ODB Program which are picked up by the NIHB Program
- emergency physiotherapy and emergency speech therapy services (removed from NIHB Program in Ontario Region)
- increased pharmaceutical, supply and equipment costs and home care costs presumed to be due to reductions in acute care hospital services

Potential areas for concern in delisting by the Ontario government include:

- prescription drugs
- paramedical (allied health) services
- ambulance services
- provincial mental health services
- assistive devices program

Other cost drivers which are impacting the NIHB Program:

- more expensive technology and pharmaceuticals
- clinical practice guidelines
- changing demographics
- increased utilization of services

5. Limitations to Achieving Efficiencies with the Present System

Transferred programs represent a minor component of Ontario Region’s total resources. In
Ontario among the two transferred community examples which are included in this paper, these programs represent about 37% of the MSB budget on average, as the NIHB program and some other centrally administered programs are not included. If provincial expenditures are included, then the proportion of transferred programs drop to 26% of the total MSB and Ontario resources spent on health services to these two communities (data from Figure 9). All health systems today are preoccupied with controlling costs. It is difficult, if not impossible, to control costs when different governments and organizations each possess a portion of the total resource pool. Efficiencies, therefore must be found in segmented portions of the health system to limited avail. Broader reform is not possible, such as labour adjustment strategies, which might replace a portion of the physician budgets with nurse practitioners, due to resource being handled at the provincial level (physician budgets) and provinces’ reluctance to enter into areas deemed federal jurisdiction (community nursing). This statement is a generality, as some exceptions exist. The provincial government has provided funding for nurse practitioners in the northern health authority of Weeneebayko. This situation is somewhat unique as it involves a health system redesign around a previously MSB-operated hospital, now under First Nations administration.

There are limitations imposed to health service reform even within jurisdictions. The NIHB Program operates on a regional and national level. Due to its immense scope ($507.7 million nationally in 1997/98), it functions as an insurance pool where risk (related to illness and utilization of a population) is greatly lowered due to its size. Also because of its size, regions are able to negotiate preferred rates for dental care and pharmaceutical and other medical supply purchases. However, somewhat ironically due to its scope and size, management of health provider practices in the NIHB program is difficult, leaving the program open to another type of risk, that of provider mismanagement and self interest. It is difficult to monitor individual health professional practices in such a large system, and the usual recourse is to conduct random audits. Dental services is the classic area where cost escalations have not been controllable and examples of inappropriate practice by dentists not uncommon. Recently, the establishment of predetermination, where dental care plans must be preapproved by the funders, has appeared to reverse the trend to rising costs. However, it is too soon to conclude that predetermination will control dental costs in the long term. A previous strategy of frequency based benefit reimbursement only had a short term effect in reducing costs, and has been attributed to providers resorting to lower frequency but higher cost care (such as root canals rather than routine fillings) to maintain former income levels.

Abuse by clients is second area of concern with the NIHB Program which is hard to control with its large, impersonal structure. The Auditor General has identified risks in this area as clients
accessing excessive levels of benefits, and clients abusing or misusing prescription drugs.\(^{12}\)

Another limitation of the regional administration of NIHBs is an inability to institute other types of funding processes which might be more cost-effective or appropriate for a population, such as a local-based arrangement for salaried or contract providers rather than FFS reimbursement. This has been done in one Ontario community, where the NIHB program has been devolved to local control, and has generated substantial savings in dental services. These savings have been redirected into other areas of their integrated health and social service system.

6. **Resources Currently Provider Driven**

The current system, which operates largely on an arms-length reimbursement of services provided directly through patient-professional interactions (certainly this is true for the NIHB Program, and provincial hospital and physician services), has limited ability to monitor performance or adjust the system to meet community needs. There are no financial incentives for quality of services delivered. Direct contracting with professionals and/or organizations will provide an opportunity for performance measures to be included in the contracts. In addition, a closer-to-home relationship between providers and health organizations means that contractual relationships can respond to population needs in a way that respects provider concerns and requirements.

7. **Current Government Directions**

The financing arrangement being advanced by this document is in alignment with federal policy direction. The inherent right policy which was announced by the federal government in January, 1998 in its policy statement *Gathering Strength*, promises a new fiscal relationship which provides more stable and predictable financing. This relationship will allow First Nations governments to exercise increased autonomy and greater self-reliance through the creation of expanded transfer arrangements, First Nations fiscal authority, and in a full blown self-government environment, resource-revenue sharing and incentives for enhancing First Nations own-source revenue capacity.\(^{13}\)

Through negotiation with Aboriginal, provincial and territorial governments, the federal government is committed to developing multi-year arrangements which will establish clear funding formulas, and which will provide more stable and predictable flow of revenue to facilitate program and financial planning.\(^{14}\)
The federal government has identified the consolidation of funding arrangements from different government departments as one avenue to improve financing of First Nations and Inuit, for example between Health Canada and DIAND. The goal of this initiative, labeled the Canada First Nations Funding Agreement, is to primarily achieve economies in administration, not present innovative new ways of financing.\(^{15}\)

The spirit of the federal *Gathering Strength* initiative does include, however, the promise of a future financial relationship, which goes beyond innovative administrative devolution. The federal government, with some provincial involvement, is developing mechanisms for financial government-to-government transfer systems for First Nations governments. Fair, stable, and equitable are the words used to describe the goals of these projected transfers.\(^{16}\)

8. **Opportunity for Greater Accountability**

Accountability derives from control. Governments speak in accountability terms with respect to First Nations programs and services, using the words “budgeting, internal controls, reporting and auditing standards.”\(^{17}\) The financing model in this paper is premised on greater control by First Nations and Inuit to develop a health system in the context of the holistic health needs of the community. Once a clear relationship is made between the ability to work towards meeting needs in a system that accommodates change and innovative reform (which requires meaningful control in the system), and the product – community designed programs and services, the foundation for a grass roots accountability will have been forged. The accountability is two fold, to both government (funders) and the community membership, with the more onerous accountability directed to the latter. In an integrated health funding approach, the organizers of the health system will not have the limitations of stove-pipe financing, and community needs will be more easily met as resources can follow need (rather than the present situation, where need is slotted into existing programs.) Full responsibility rests with the community health system to ensure that community consultation occurs and the results are reflected in the health design, to demonstrate improved health outcomes, to manage resources in a cost-efficient and effective manner, to evaluate community satisfaction and continuously improve the system, to use evidence in its decisions on health program design and implementation, and finally to report to the community periodically on the system’s progress against defined criteria and outcomes.
A funding model that holistically incorporates health and health related services is compatible with the Aboriginal view of health and well-being. The Medicine Wheel, or Circle of Life provides a framework for holistic healing which encompasses physical, mental, emotional and spiritual domains. Only in the last twenty years, has the mainstream health system adopted a similar perspective, one which acknowledges that health and well-being stem from a variety of factors and influences, classified as ‘broad health determinants.’ These determinants include social and economic forces, psychological influences, physical and genetic factors and cultural elements. The importance of health determinants has been validated in numerous studies which have shown the connection between health status and a number of factors including income, position in society, employment, lifestyle factors, and control over one’s personal situation. As well, international comparisons of per capita spending, life expectancy, and morbidity rates have illustrated that countries which spend high amounts of money on health expenditures do not have the best health indicators. Beyond a certain level, investments in illness care services do not equate to the same magnitude in improved health status, which suggest that other factors are important in improving population health. Certainly the situation in Aboriginal communities provides a real life example of the impact of health determinants, such as poverty, nutrition, living conditions and unemployment on individual and community health and well being.

Despite the importance of health determinants in individual and population well-being, the Canadian health system has retained a primarily clinical (and with respect to insured services, a medical) focus. This is the system that First Nations communities have inherited. It is particularly difficult in an environment where health and social programs are in protected envelopes to design and implement holistic solutions. Integrated health funding will provide the first step to achieving a more responsive, and community oriented health system. Ultimately, social service funding should be combined with the health and health-related dollars, and a system set up to seamlessly transfer individuals between housing, health, home care and other services.

For Aboriginal people, holistic healing which interrelates physical, mental, emotional and spiritual elements, will restore not only wellness to individuals, but also renew their capacity to exercise collective responsibility and build caring, inclusive communities. RCAP, in its final report, identified several areas where Aboriginal health and healing concepts are congruent with the health determinants model:

1. True health comes from the connectedness of human systems not their separate
dynamics. The four components of the healing circle reinforce the results of research on health determinants. “Health is the total effect of vitality in and balance between all life support systems.”

2. Economic factors are particularly important in determining the level of health of a population.

3. Responsibility for health is both individual and collective. Personal choices on lifestyle (smoking, diet, exercise etc.) combined with an individual responsibility for well-being are complementary to Aboriginal perspectives on collective responsibility for community well-being as well as individual self-care.

4. Aboriginal beliefs regarding good health are based on balance and harmony within one’s self and within the social and natural environment. This is echoed in research that has proven causal links between stress and ill health.

5. A healthy and happy childhood is the foundation for life. Many factors influencing health status throughout life are to be found in childhood and before birth, such as poverty, accidents and injury, and smoking and alcohol consumption during pregnancy.21

An integral component to restoring balance and well-being to communities involves community empowerment as well as individual well-being. The ultimate expression of an Aboriginal health system that embodies both individual and community empowerment is self-government; however a practical first step on this journey to assuming control over a health system, would be a system of integrated funding.

Despite concerns expressed by many First Nations about Health Transfer being merely an administrative devolution of services, recent survey results indicate that more communities with transfer feel their services are equitable to other Canadians, than do non transferred communities. This has been seen the First Nations and Inuit Regional Health Survey Project, which was conducted in 183 First Nations and 5 Labrador Inuit communities. A total of 9,870 adults were surveyed representing 199,782 First Nations and Inuit adults in participating communities. In a general question about comparability of health services to other Canadians, only two variables were found to be factors influencing the responses: presence of transfer and geographic isolation. The survey results demonstrated that the percentage of Aboriginal people who thought that the quality of their health services was equivalent to those of other Canadians was significantly higher in the communities which underwent Health Transfer: 35.3% from transferred communities versus 27.9% from non-transferred communities.22 (It is unlikely that the mere presence of transfer unduly biased respondents into answering favorably, as for example, the Manitoba
portion of the survey revealed that 35% of First Nations in that region were unsure if their health services had been transferred to band control. With respect to geographic isolation, 62.2% of Aboriginal people living in isolated communities did not believe they received the same quality of health services as Canadians, compared to 56.4% in non-isolated communities.

In a review and analysis of successful indigenous health programs in Canada, US and Australia, common strengths from an operational perspective included:

- authority over education, health and social services
- ability to offer a wide range of social services and health, including housing, emergency housing, food bank, training and education
- comprehensive services
- incorporation of cultural and traditional components
- capacity built at the community level (for evaluation and curriculum development)
- recognition and utilization of existing skills and resource people in the health system
- close working relationship with other social services agencies and local politicians
- support from the surrounding non-First Nations community due to a strong profile by the First Nation
- bilateral negotiations with the province
- evaluation, as a built-in, health outcome oriented component of programs.

In a financing model which ultimately included hospital and physician budgets as well as community health and health related funding from the federal government, First Nations would have the ability to fundamentally reform the primary care system, not unlike what is now being envisioned by provinces for their health systems. Ultimately an integrated, functioning First Nations health care system may need multiple entry points to increase accessibility to health care, such as through community health representatives (CHRs), traditional healers, and health professionals such as nurse practitioners.

*Nurse Practitioner Model - The Weeneebayko Experience*

A nurse practitioner model has been implemented in the Weeneebayko Hospital in Moose Factory, Ontario, as part of the transfer of the health system to First Nations. The restructuring efforts which resulted in the Weeneebayko Health Ahtuskaywin Authority (WHA) has included negotiations with both provincial and federal governments due to the presence of the First Nations administered hospital (previously called Moose Factory Hospital) in the region. Physician services are provided through a cost-sharing agreement.
between the province and MSB. MSB’s portion is included in a contribution agreement with the WHA, which in turn reimburses Queen’s university. Recently, as part of the health authority redesign, this physician services contract was expanded to include three nurse practitioners and one midwife position. The nurse practitioner positions are being phased in with one in place, one being currently hired, and the third expected in July, 1999. The hospital has had trouble recruiting the second nurse practitioner, however, due to competition from inner city clinics in Toronto which are also hiring nurse practitioners and the undesirability of the northern locale for many health professionals.

The Weeneebayko experience in designing a First Nations transferred health system is informative to a discussion on an integrated health funding model for a number of reasons. To begin with, despite a sincere belief that things could “really be done differently” in term of service design, it was realized that there were good reasons for the way MSB delivered services the way they did and therefore radical changes were not made to service delivery. Nonetheless, the establishment of a single regional health board, which has representation from each of the member northern communities plus the southern communities which are relied on for services, has been key to the success of the transfer. The Board initiated a community consultation which has driven the system planning process.  

The importance of accessibility to primary care cannot be overstated in Aboriginal health systems. Aboriginal people require multiple entry points into the system, such as CHRs, traditional healers, nurses, nurse practitioners and physicians. Accessibility is a perception as well as reality, for example, community members may not feel comfortable approaching a health clinic to see a visiting physician. Integrated health funding provides the flexibility to provide enhanced accessibility in the health system, and in the process also saves money. Numerous studies have established that nurse practitioners are cost efficient. In non-Aboriginal settings, they have been shown to reduce the use of ambulatory and emergency room visits, decrease hospital utilization rate, reduce radiology and lab costs without changing illness outcomes and increase the use of non-drug therapy.

The Weeneebayko health system has successfully integrated its first nurse practitioner into its primary care services. She is based in the family medicine clinic at the hospital, and conducts urgency clinics and participates in the first call rotation at the emergency department. She deals with patients within her scope of practice, and relieves physicians of minor complaints which form a major part of a family clinic. The nurse practitioner
credentials allows her to work independently, and to refer clients to physicians as appropriate. In the regular clinic, she handles follow-ups and repeat clients as well as those who have consented to see her. The number of repeat clients has indicated to the hospital management that this type of health professional has been accepted by the community. At the present time, the nurse practitioner position is limited to working in the hospital clinics. As the second and third nurse practitioners are added, this service will be considered for the nursing stations in the surrounding communities. This new role will be clearly defined in the nursing stations, to prevent nurse practitioners from doing work of the registered nurses who work full-time in these stations.  

An important factor to the successful integration of non-physicians into primary care roles usually provided by physicians will be the ability for individuals to choose who they see (at least initially), so that they do not feel that they have been handed off to a cheaper, inferior system. Through client education and confidence in this new provider, a successful transition to this new service model can occur.

**Health and Social Integration - The Nuu-chah-nulth Experience**

A common theme among all the health systems reviewed for this paper, is need for a holistic health focus, one that allows coordination among services, links community resources such as NNADAP workers and mental health workers with medical services, and deals with duplication of services. One such approach is the Nuu-chah-nulth Community and Human Services organization on Vancouver Island which serves 14 communities north of Port Alberni, British Columbia. Although the communities wanted a health system that integrated health and social services, they initially started out with Health Transfer in 1988. In 1992, the services were amalgamated into one board, offering child welfare, health, education and social services. By centralizing the services into an office of 30 staff with up to 60 additional workers at the community level, all 14 communities have access to a level of programming which would not have been possible individually. Since 1993, MSB funds flow through DIAND under a single Alternate Funding Agreement; however the communities are working towards block funding of all government funds, which would remove program funding with its onerous reporting requirements.

A strength of this community’s approach has been the integration of education into the health and social mix. Training is a priority at all levels. A life skills course in the community includes those employed persons, and is directed to enhancing individuals’
working skills. Native education workers participate in the mainstream education system, and act as liaisons, counsellors and teachers’ aids to the First Nations children attending the mainstream schools. Control and influence on curriculum is achieved to some extent through the funding arrangement which flows resources through the tribal council to the education system. Post-secondary education is also a priority with the Nuu-chah-nulth Board. It has developed cultural-based units on First Nations studies (including art, social sciences and science) to address the fact that many First Nations high school graduates lack science background for post-secondary training.31

Sioux Lookout Zone - Vision for the Future
As part of health needs assessment for the Sioux Lookout First Nations Health Authority, key informants and health workers were asked what kind of health care system they would like to see developed in their Zone and what kind of changes were needed. Most respondents had difficulty in articulating a vision, and spoke in terms of needing more of the existing services, better coordination between different agencies, more consultation between First Nation government and health professionals, and better understanding and cooperation among health professionals. The responses support the integrated health funding approach described herein, including:

- health care is part of self-determination
- need to redirect resources to health promotion and disease prevention
- recognition of the importance of spiritual and cultural dimensions of health.32

The United States Experience

The United States has already implemented the concept of block grants which encompass all functions and activities of the Bureau of Indian Affairs (BIA) and the Indian Health Service (IHS). In 1975, the Indian Self Determination and Educational Assistance Act initially gave tribes a limited scope to negotiate ‘self-determination contracts’ for the planning, implementation and administration of federal programs for their benefit. The 1988 amendments to this Act have included a block grant provision, providing a limited number of tribes with the option of complete responsibility over all services from the Bureau and the IHS, in a self-government style arrangement.

These self-government arrangements are commonly known as ‘compacts.’ They are analogous to the reforms suggested in this paper, as self-government in the American context refers to the
devolution of control of programs delivered by the BIA and IHS (the Canadian counterparts are DIAND and MSB.) Compacting is very contentious among tribes, and the concerns raised about self-government are very similar to those raised among Canadian First Nations to Health Transfer and self-government. These criticisms include:

- Compacting is being forced on tribes due to budget cutting. Why should a tribe want to take over a system that presently does not have enough funding to make it work?
- It is a harbinger of termination. Tribes are worried that the federal trust responsibility will diminish with compacting, similarly to other federal policies which led to termination of Indian status.
- It will pit tribes against each other, competing to get limited resources.
- The time is not right for self-government, and some tribes want to undergo such a change on their own terms.
- Tribes are worried that if they wait to negotiate a self-government agreement, there will be less funds available to them. As tribes access compacting resources from the IHS, they are entitled to charge an indirect cost on those funds. Because there is no additional funding for this support, the Indian Health Service must divert funding from other programs to meet this additional need. Tribes still receiving services from IHS are concerned that their programs are being cut to fund the indirect costs of compacting.

Despite these concerns, many tribes have entered into self-government arrangements. The compacting tribes which were in the initial demonstration phase, have reported success in increasing the health services that tribal members receive. One tribe, the Mississippi Band of Choctaw Indians which participated in the demonstration project and then signed a self-government compact in 1994, has reported an increased immunization rate to above 90%, reduced teen pregnancy from 50% to 17% and reduced mortality rates. Success in compacting with the IHS and BIA has prompted tribes to consider compacting other programs in the Department of Health and Human Services and the Department of the Interior. Such funding would include Head Start, the Administration for Native Americans, and programs on aging, rehabilitation, welfare and other funding. Tribes, similarly to their Canadian counterparts, find that too much time and resources are taken up in dealing with multiple funding agencies. An expanded self-government arrangement would enable tribal organizations to expand and strengthen services in a comprehensive and consolidated manner. The authority to do this already exists in legislation and executive orders.

The IHS has had to accommodate budget cuts from government downsizing. Furthermore, the new financing arrangements are removing its mandate as a direct care delivery system. Future
roles for the IHS that have been suggested include a continued presence in national health data collection, training and technical assistance to tribes, development of standards of care, and the creation of new purchasing arrangements to facilitate individual tribes in gaining purchasing power previously enjoyed by IHS.

US tribes have also had experience with direct contracting for services, as this is an alternative option to compacting funds for health services. Tribes which have chosen contracting are no longer required to receive services from the IHS and instead receive direct funding. Problems with this system include escalating costs of contractors in areas where there are no market forces to control costs and inability of small tribes to absorb costs of catastrophic cases or major illnesses. Although there is a Catastrophic Health Emergency Fund, it does not provide an adequate safety net for these tribes, as this fund generally runs out of money mid way through its annual budget. This will be an emerging concern in the Canadian context as NIHBs are transferred to community control.
Factors For Consideration in an Integrated Health Funding Approach

There are several factors which are essential in a discussion on an integrated financing model for health resources among First Nations. Much of the content of this paper thus far has focused on the reasons that reform is needed in the First Nations health system, what possibilities are available in terms of health system planning and design, and what the American experience with a similar funding initiative can contribute to a discussion on reform.

In non-Aboriginal contexts, provinces are now looking at capitation in primary care as an alternative to the current system where physicians are paid on a piece meal, FFS basis, and where no integrated approach to meeting the primary health needs of a population exists. Capitation would solidify the physicians’ role as gate-keepers in the primary care system, as a single per capita amount would be provided to physicians who would then ensure that all of a patient’s primary care needs are met. In the case of First Nations health financing reform which is proposed in this paper, the fundamental principle is the same, however the holder of funds would not be physicians and, depending on the community system design, physicians may not be sole gate-keepers to access services. This function may be shared with a number of community health care professionals, including nurse practitioners, NNADAP workers or even CHRs for limited services.

Financing reform raises a number of issues. How can funds be allocated which reflect community needs? What funds should be included? Should a financing formula be based on a per capita system? How will equity be addressed? How can the difficulties posed by small communities lacking economies of scale be overcome in a way which respects individual community needs and values? How will the formula be sensitive to population changes over a period of time? What restrictions, if any, do current provincial financing mechanisms have on a First Nations funding model which integrates funds from different government jurisdictions? How can catastrophic events and financial risk be addressed? What should be the governing body which will control the integrated funds? What should be the length of financial agreements? How should a new financial arrangement be introduced?

The following sections presents issues and options in each of these areas. They are offered as starting points for an informed discussion between First Nations and their funders on a new integrated financing model which can underpin a reform strategy geared to improved health status, equity in the access to health services and health care cost containment.
**Equity in Health Care**

One of the central issues in an integrated health funding model will be how to initially allocate resources to communities. Health Transfer agreements currently use existing expenditure levels as the basis for the funding allocation. First Nations have pointed to the inadequacies of this method, as no allowance is made for the real health need of communities, and no enrichment is factored in to deal with population increases. Addressing health needs in a fair manner means that resources must be allocated equitably, using a process which incorporates information on a community’s health status and other variables that effect resource consumption.

Equity in health care is a goal of all publicly funded systems. Equity can have a number of meanings, relating to whether it relates to health itself, the use of health care or access to it. Horizontal equity assumes that all persons are equals, and therefore all persons should be treated equitably. Vertical equity, on the other hand, is about the unequal, but equitable, treatment of unequals - or how individuals who may be unequal or different in a society are treated differently.³⁸

One type of horizontal equity is *equal use for equal need*, where need may relate to the extent of illness which is present in a population. This definition is difficult to put into practice, as it does not incorporate individual preferences for health or health care, which may directly impact health service use. Most commonly accepted definitions of horizontal equity involve *equal access for equal need*. Access is made equitable through acknowledging that factors such as socio-economic status, geographical location and culture, are important in a person’s interactions with the health care system.

Vertical equity, which is a much more difficult concept to operationalize, recognizes that there are differences in the way different individuals are treated. It has been theorized that vertical equity may be accommodated by weighting health gains to different groups differently, for example, by attaching weights greater than one to health gains to people, such as Aboriginal people, in particularly poor health.³⁹ For the purposes of this paper which looks at existing fixed level resources to First Nations people where direct comparisons to other Canadians may not factor in any allocation process, vertical equity will not be considered. Rather the contributions of horizontal equity to a discussion on resource allocation to First Nations from a fixed pool of resources will be investigated.

Fiscal equalization, in a First Nations and Inuit context, should ensure that in the process of
allocating resources to separate communities or tribal councils, that there will be no difference in their capacities to provide service to their respective populations. This entails adjustments to the funding amounts, based on factors which make a service in one community more or less expensive than another. There are two approaches which may be used.

1. Allocation of resources based on differences in the costs of providing services - a true reflection of fiscal equalization.
2. Allocation of resources to address inequities arising from the levels of unmet needs.

A combination of these approaches has been considered when allocating health care resources in Australia. Fiscal equalization is now the foundation of resource allocation to states by the Commonwealth Grants Commission. The factors which are used to adjust the level of resources to each state include cross-border flows, age, sex, Aboriginality, socio-economic composition, and a population dispersion factor. Aboriginality is measured by comparing the current utilization of services by Aborigines (adjusted by age and sex) with the level of utilization by non-Aborigines.\(^{40}\) This distribution factor does not account for the possibility that current service use by Aborigines does not adequately reflect their current need. This factor has questionable applicability for resource distribution among First Nations as it has been shown that in Ontario, First Nations on reserve utilize 30% less hospital expenditures (on a per capita basis) than other Ontario residents despite significantly poorer health status\(^{41}\), and overall among First Nations in Canada, 1991 per capita health expenditures were 6.8% less than that expended by the total population.\(^{42}\)

In the New South Wales state of Australia, the formula used to allocate resources across geographic regions measures need by three variables: standardized mortality rates, socio-economic status and rurality. Aboriginality is indirectly accounted for by virtue of the greater need of Aborigines captured through these three variables. Another state, Queensland includes a separate weighting for Aboriginality; it is included on top of the need variables.\(^{43}\)

In a situation where an existing pool of First Nations and Inuit health resources (federal government funds) are allocated among communities which are similar in that they all are in great need as evidenced by socio economic conditions and health status, many of the factors used to ensure equity among diverse populations will likely have a limited effect in adjusting a per capita allocation among different First Nations and Inuit communities. The variables of mortality rates, demographic structure, socio-economic risk, geographic location, and community size in a First
Nations and Inuit context are considered below.

The provincial funding scenario is somewhat different as hospital and physician resources are now not expended in a manner which is reflective of equitable access. An allocation process is based on historical expenditure levels will solidify existing inequities. An evaluation will be needed to ascertain if lower hospital and specialist utilization by First Nations occurs because persons are using other community-based services, or if it is one of the contributing factors to poor health status among First Nations in Ontario. If the latter can be established, a strong case can be made for establishing a provincial resources levels using the principles of equity where First Nations’ resource needs are benchmarked against an average provincial expenditure.

1. **Mortality rates**
   The commonly accepted indicator of population health status is the mortality rate, which is incorporated into health expenditure formulas to ensure equal expenditures for equal need. First Nations and Inuit community mortality rates can fluctuate markedly due to community size and the prevalence of suicide, a phenomenon which tends to occur in clusters. For this reason a mortality rate averaging a period of three or five years would even out the random variation due to low population numbers and suicide clustering. Even so, some communities may be simply too small for a mortality rate variable to have any significance. A sensitivity analysis will be required to determine the minimum population needed to effectively and fairly utilize mortality rates as reflective of First Nations and Inuit health need in a resource allocation formula.

2. **Demographic structure**
   Demographic structure variables relate directly to the fiscal equalization principle described above. This approach attempts to estimate a resource differential required to provide a service to different populations based on known costings by different population profiles. Age and gender are the usual variables used to provide a measure of demographic structure. But as two Manitoba researchers, Frohlich and Carriere point out, simply adjusting expenditures based on age and sex may actually disadvantage small populations, for example, small populations which have a high health service utilization by children, would actually receive less resources in a straight baseline allocation which looked at the percentage of children in a region. Clearly another factor must be included in order to incorporate utilization and need. These researchers have developed a model which combines age and gender with socio-economic risk (see next section) and using the population of Manitoba as an example, have found a high correlation between resource allocation using age/gender/socio-economic risk and the presence of premature mortality (an independent measure of health status).
3. **Socio-economic Risk**

In another Manitoba-based analysis, Frohlich and Mustard have illustrated, using non-Aboriginal 1986 Census data, a linear relationship between an individual’s health status and six socio-economic variables. Three of these variables were positively related to poor health:

- the percentage of the labour force unemployed: ages 15 to 24
- the percentage unemployed between 45 and 54, and
- the percentage of single parent households.

Three variables were negatively related to poor health:

- the percentage of the population between the ages of 25 and 34 having graduated high school,
- the percentage of females participating in the labour force, and
- the average dwelling value.

These variables were combined into a socio-economic risk index (SERI) which the investigators showed were strongly related to a number of measures of health status and resource utilization. Using the population of Manitoba as the base, the SERI combined with age/gender variables positively correlated with utilization of physician visits (the health service indicator used in the analysis). Average allocations for visits calculated on the basis of these variables were positively correlated with another established measure of need, premature mortality.

Again, there may be difficulties in measuring socio-economic risk of First Nations and Inuit communities. The usual source of socio-economic data described above is the Census, however, some First Nations communities do not participate in the Census data collection. As many communities have very poor socio-economic conditions which related to their location, including proximity to urban centres, a relevant (and easier to obtain) index of socio-economic risk may be one based on geography. A recent DIAND study which has analyzed 380 First Nations, has concluded that there are five types of First Nations based on socio-economic well-being. Its results show that different types of First Nations can be identified based on socio-economic circumstances and that there are distinctive geographical patterns of socio-economic well-being.

Five types of community were identified based on socio-economic indicators: primary industry, emerging economy, typical disparity, high disparity and extreme disparity. This study showed that there is considerable diversity in levels of socio-economic well-being among First Nations, and that distinctive regional disparities exist. Furthermore, even the Primary Industry First Nations and Emerging Economy First Nations have relatively poor conditions in the broader Canadian context. The study revealed that where conditions are defined in terms of housing,
environmental sanitation, education, employment and income, good conditions are generally associated with an older population, proximity to more populated areas, low use of an Aboriginal language at home and a high proportion of registered Indian members residing off reserve. Further work would be necessary to elucidate any connection between these First Nations socio-economic groupings and health status, and if there is a role for a socio-economic geographic index in a health financing formula.

4. Geographic Location and Community Size
As detailed above, geographic location is implicated in First Nations communities’ socio-economic well-being. It is also related to health service access in two direct ways:

- a community’s remoteness in terms of distance to health care services will affect a population’s health status (and therefore need) if health services are not be sufficient, timely, or appropriate.
- a direct effect on a health budget, through the expenditures required to access needed services, either by health professionals visiting communities or patients transported to southern medical facilities.

MSB has classified all First Nations communities based on geographic location and implied access to health services:

- Type 4: remote isolated: no road access, no scheduled flights, minimal telephone and radio access
- Type 3: isolated: no road access, scheduled flights, good telephone services
- Type 2: semi-isolated: road access to physician services at a distance greater than 90 kilometers
- Type 1: non-isolated: road access to physician communities at a distance less than 90 kilometers.

An access factor and a community size factor are currently being used in the present formula which MSB uses to allocate resources for special programming, for example, the Brighter Futures initiative. This formula is sensitive to the higher resource needs of small communities which cannot achieve significant economies of scale. It was developed in consultation with the Assembly of First Nations, and is called the AFN approved Modified Berger Formula (AFN-MBF). The AFN-MBF distributes 10% of resources equally to all communities classed as Type 2, 3 or 4 in terms of isolation. The remainder of a budget is divided on a per capita basis, with larger communities receiving lesser weights (i.e. a smaller population in the per capita calculation) according to the following system:
- 0-500 population weight of 1.0
- 500-1000 population weight of .9
- 1000 - 3000 population weight of .8
- over 3,000 population weight of .7

This formula is used to allocate resources to regions, and regions may pursue their own mechanisms for allocation to communities, such as requests for proposals, weighted per capita allocations etc.

5. Capacity Requirements
First Nations and Inuit communities will require resources to develop appropriate capacity, design a community plan, and develop transitional strategies for the devolution of funds in an integrated health model. These resources are required in the developmental stage and therefore will not form part of the regular financing formula allocation. It should be noted that not all transitional management resources should be devolved to the community. It will be imperative that sufficient expertise exists in the funding departments to manage the devolution process and ensure successful outcomes.

Resources will be needed on an ongoing basis for clinical and administrative training of Aboriginal health workers and managers, and for activities related to the functioning of a governance system, such as community consultations, election and convening of health councils etc. These resources may be incorporated as additional incremental per capita costs as they are independent of community health status or age/gender considerations, however related to geographic location (and the general increased costs of remote locations) and community size.

In summary, a funding formula in an integrated health funding model, to ensure equity in health services to First Nations and Inuit, should have the following equity-based components:
- base equal per capita allocation, adjusted for
  - health status using mortality rates, and potentially socio-economic risk
  - demographic structure
  - geographic location
  - community size
- equal per capita allocation for capacity building, adjusted for
  - geographic location
  - community size
First Nations and Inuit Population Projections

First Nations and Inuit have experienced large population increases over the past 15 years in response to two factors: a healthy fertility rate and the reinstatement and registration of First Nations under Bill C-31. An understanding of demographic change, including future projections for population size is necessary to accurately project future needs for programs and services. Unless otherwise noted, the data included in this section on population projections has been obtained from a DIAND publication, *Implications of First Nations Demography*.48

*Implications of Demography*

First Nations and Inuit populations are expected to increase substantially over the next 15 years. The projections show a 14% increase between 1995 and 2000 (83,600 individuals), or a 36% increase between 1995 and 2010 (135,900 individuals). This projected increase is due the following:

- although First Nations and Inuit fertility declined sharply over the last 15 years, the reinstatement and registration provisions of the 1985 *Indian Act* (Bill C-31) contributed to significant First Nations growth. These increases, particularly in the size of the population of childbearing age will more than offset the impact of a lower fertility rate and contribute to a sustained rise in First Nations population.

- due to declining mortality rates, life expectancy at birth is projected to increase to about 79 years for First Nations females and about 72 years for First Nations males by the year 2010.

Despite these absolute increases, the rate of population growth is expected to decline between 1995 - 2010, with a greater decline on reserve compared to off reserve. It is expected that the share of First Nations population on reserve will decline to about 54% by the year 2010 (from 71% in 1985). The difference between on and off reserve is primarily due to the expectations of sizable numbers of registrations under Bill C-31 off reserve. According to the Indian Register, as of December 31, 1995, C-31 registrants represented only 6% of the registered Indian population on reserve.

Even with the increased number of elderly, First Nations populations will remain youthful, as the younger age groups will continue to be the largest segments of the population. The implications of the increasing population on health services include:

- higher demand in general for services, placing pressure on the existing system to delivery services in a more efficient and cost-effective manner.
the number and cost of chronic conditions will increase substantially as the population grows and ages. The 1991 Aboriginal Peoples Survey (APS) demonstrated that chronic diseases were a significant problem for both on and off reserve populations. These conditions included diabetes, high blood pressure, arthritis or rheumatism, and tuberculosis. An estimate for diabetes has predicted that the number of First Nations adults affected by diabetes will increase from 30,000 in 1995 to more than 50,000 in the year 2010, a 67% increase.

- the NIHB program will face great demand. Pharmacy services are expected to increase over 50% in utilization and 56% in expenditures (1995 dollars) between 1995 - 2010. For the same time period, dental services are projected to increase 32% in utilization and 37% in expenditures.

**Long Term Impact of Bill C-31 Status Inheritance Rules**

The 1985 rules governing registration of First Nations at birth (Bill C-31) bear scrutiny, as the long term implications of these rules may mean reductions in the number of First Nations with status over time, or secondly, the creation of a category of First Nations people with band membership, but without status and therefore potentially no entitlement to federal services. These projected outcomes are a result of two factors: *Indian Act* rules and band membership codes.

**Indian Act Entitlement**

With Bill C-31, registration is obtained at birth and cannot be lost or taken away. Entitlement rules include:

- a child is entitled to registration under section 6(1) if both parents are (or are entitled to be) registered Indians
- a child is entitled to registration under section 6(2) if one parent is (or is entitled to be) registered under sub-section 6(1) and the other parent does not have legal status (and is likely non Indian)
- a child is not entitled to registration if one of the child’s parents is registered under 6(2) and the other parent is non Indian.

The above means that after two successive generations of out-marriage (i.e. marriage between a person registered under the *Indian Act*, and a non-registered person), off spring are not entitled to Indian registration. Therefore the rate of out-marriage will directly influence the numbers of First Nations entitled to Indian registration, and subsequent eligibility for certain federal health and other programs, such as post-secondary education and the NIHB Program.
Band Membership Provisions

Bill C-31 also contained provisions for individual First Nations to establish their own rules governing eligibility for band membership. There are currently four types of band membership codes in force that govern a person’s eligibility: (1) both parents are members (or eligible for membership); (2) a minimum blood quantum level, usually 50%; (3) Indian Act rules for registration entitlement; (4) one parent is a member (or eligible for membership).

The impact of Indian Act registration and band membership codes is two fold:

1. Fewer persons will be entitled to Indian Act registration. Most of Bill C-31’s impact with respect to increasing the size of the registered Indian population will occur by the year 2000. Between 1995 - 2010, children lacking entitlement is expected to increase from about 10% to 18%. This will have a greater effect on off-reserve populations compared to on reserve communities. After 2010, populations of most First Nations communities (both on and off reserve) are expected to include many individuals not entitled to registration. As well, some First Nations will likely experience sizable losses to their population in this respect.

2. Bands which have instituted one parent rules will face the situation where a portion of their membership does not have registered Indian entitlement. As of May, 1992, 90 or 15% of First Nations were governed by one parent rules. In these First Nations, as out-marriages occur, an increasing percentage of their band membership will not be entitled to federal health services, such as NIHBs. In a recent analysis, just over 50% of these First Nations were estimated to have out marriage rates exceeding 40%. This analysis concluded that the future population eligible for membership is expected to include 15% or more of individuals who are not entitled to Indian registration.

The implications of the changing demography of First Nations on future financing formulae is obvious. If a per capita system used in the calculation of funding levels is based on Indian Act entitlement, then First Nation and Inuit communities will undoubtedly face declining transfers within 15 years. It is unlikely that communities themselves would be the impetus to instituting two classes of residents based on the restrictive measures of the Indian Act. Up to now, the numbers of non-registered Indians in First Nations communities has not been a factor in resources
allocated for federally funded community-based services, as these numbers are small. Health status does not discriminate among persons in a community, simply by virtue of an invisible registration. A strong justification can be made for basing a per capita allocation on community membership, irrespective of Indian Act registration. In the event of a restrictive definition of the population included in the per capita calculations, even if a band would demand that a First Nation person without status leave the community, the incremental costs of providing service to that person which is saved by the health system, will likely be less than the per capita entitlement on which the funding level is based. Alternatively, if a per capita funding system uses band membership not Indian Act registration in the formula, then those First Nations communities which have a one parent rule would be able sustain their current level of funding for a longer period of time than communities with more restrictive membership rules.

The NIHB program, which is available to all registered Indians regardless of residence in Canada, is one area where registration is mandatory for receipt of benefits. If an integrated financing model includes funding for both on and off reserve NIHBs, and this is calculated on a per capita basis, then decreases in funding will certainly occur if out-marriages reach a level to cause a registered population to decrease. These out-marriage projections provide a compelling argument for communities to negotiate at least the NIHB portion of resources based on historical aggregate levels rather than per capita allocations.

In the short term however, the projected population increases point to a very real need for critical change to the health system in order to accommodate the demands of a growing and aging First Nations population. Currently, First Nations and Inuit Health programs must be delivered within existing MSB resources. In 1998/99, this envelope grew by only 1%. The federal Minister of Health, Alan Rock, has stated to First Nations that if a strong case can be made, he would be prepared to seek additional resources to address the priority health needs of First Nations people.49 The 1999 budget followed through on this statement, with $190 million committed over 3 years in two areas: an integrated continuum of services focusing on home and community care, and development of health information systems in First Nations communities. As well, additional resources have been identified for the implementation of an Aboriginal Diabetes Strategy.
The Scope of Integrated Health Funding

The direction seen from successful indigenous approaches to health systems is to an integration of both health and social service delivery. Even in a resource constrained environment as First Nations health care, duplication of services can occur. Currently, administration of programs are stove-piped, each incurring separate costs. In one First Nations community, prior to the integration of health and social services, nineteen directors existed, representing each of the different health and social programs funded in the community. As well as cost inefficiencies, quality of care may be stymied by a lack of coordination at the client level. Particularly in the counseling areas, different health providers may be following in each other’s footsteps. From a patient’s perspective, continuity of care may not be present, either horizontally between different primary care access points on a health-social continuum or vertically, as a patient progresses from primary to more specialized care.

Health Canada and DIAND have each made progress in simplifying the funding process and instituting multi-year funding agreements, however in both cases, the single transfer of funds does not include all programs from the department, and the devolution of funds is primarily administrative. In a broad determinants of health approach, the synergy possible between the programs funded by these two federal departments is obvious, and in fact, many First Nations are currently coordinating these programs and funds as best they can within the limitations imposed by each department. With respect to the federal funds, a starting point for an integrated health funding arrangement would include all health funds from MSB and the health-related funds from DIAND.

In the description of health and health related funds which follows, the province of Ontario has been used to illustrate the type and distribution of resources which could be included in an integrated system. Ontario provides an example of a provincial government which has on reserve health expenditure data available and which offers additional health programs directed to Aboriginal people, including First Nations communities.

Three different financial scenarios are presented: the province of Ontario as a whole, and two health authorities: a single community (“A”) and a tribal council (“B”) which represents several communities. Both of these health authorities have undergone Health Transfer. Figure 4 below shows the distribution of population, and a DIAND geographic class descriptor for each of these groupings.
Community size (on reserve) and geographic proximity to urban centres are two main factors in resource allocation for both MSB and DIAND. In terms of total status population obtained from the DIAND Indian Register, Community A and Tribal Council B are basically similar as both have approximately a 8800 membership. It is in the on reserve population, however, that these two communities provide distinct examples. Community A has over 80% of its population on-reserve, whereas Tribal Council B has a more typical on and off reserve spread, with slightly less people living in the community (43%) than outside its territory.

MSB provides community health services or resources to a community’s entire population, and does not distinguish between status residents and other residents. The Community Workload Increase System (CWIS) provides a count of all community residents, and therefore its on-reserve population is generally slightly higher than the Indian Register count. Tribal Council B’s CWIS population in 1997 was 4143 (10% higher); however Community A’s CWIS population was slightly lower than the Indian Register at 7134 (3% lower).

The province of Ontario provides yet another on reserve population count, this time for purposes of OHIP eligibility, which provides the lowest counts of the three sources of population: DIAND, MSB, Ontario (see Figure 5 for a comparison of all three populations).
Figure 5
1997 On-Reserve Population Counts

<table>
<thead>
<tr>
<th></th>
<th>DIAND</th>
<th>CWIS</th>
<th>Ontario</th>
</tr>
</thead>
<tbody>
<tr>
<td>Community A</td>
<td>7,333</td>
<td>7,134</td>
<td>7,200</td>
</tr>
<tr>
<td>Tribal Council B</td>
<td>3,767</td>
<td>4,143</td>
<td>3,666</td>
</tr>
</tbody>
</table>


For purposes of uniformity and consistency in the analysis which follows, the DIAND population count has been used in all subsequent per capita calculations.

These communities also present different scenarios for proximity to urban settings (see Figure 4). Using the DIAND classification, Community A is classed as urban, whereas Tribal Council B has a mixture of rural and urban designated communities.

**Provincial Overview**

Figure 6 itemizes the health and health related expenditures to First Nations communities in Ontario in 1997/98. MSB provides the largest component, at almost $204 million (63.9%), followed by the province of Ontario at $78 million (24.5%) and DIAND at $37.5 million (11.7%). The DIAND component includes the health-related expenditures of Adult Care and Child and Family Services.

1. **MSB**

In 1997/98, the largest component of MSB was the NIHB Program at 46.2% of total expenditures. This program is currently not available for transfer. Although the federal government originally planned to initiate NIHB transfers, this has been put on hold at the request of First Nations. First Nations are concerned about the implications of transferring NIHBs in an environment of capped funds. As well, an evaluation has not been completed on existing NIHB pilot projects.

Experience with First Nations and Inuit which have assumed management of the NIHB program
has demonstrated the substantial savings which may be realized from local management of this program, which may be redirected to other areas of the health system. In particular, dental care, which is paid through FFS (and which represented 21.4% of the total Ontario NIHB Program in 1997/98) presents opportunities for savings through alternative financing arrangements, such as contract or salaried dentists, which may be negotiated at the local level.

As will be discussed below, limitations imposed by community size may necessitate cooperative arrangements between communities or within regions with respect to inclusion of NIHBs in an integrated funding model.

Health Transfer accounts for 13.4% of the MSB expenditures – as of August 31, 1998, 19 transfer agreements had been struck in Ontario, comprising 33 communities or 26.6% of all communities in the province. Therefore Community Health Services (non-NIHB), Environmental Health and Surveillance and NNADAP in Figure 6 contain a mixture of expenditures relating to program funds to non-transferred bands and program funds which are not currently available for transfer. Regarding the latter, funding areas in Community Health Services not available for transfer include programs where resources have been provided to regional First Nations organizations, such as consultation funds and health liaison, resources for time-limited programs such as the Canada Prenatal Project, and time limited proposal-based programs such as Aboriginal Head Start.

Administration costs in the Ontario region (at regional and zone level) are provided in Figure 6 and were just under $3 million in 1997/98.

2. **DIAND**

DIAND provides the majority of the non-health programs to First Nations, including child and family support, adult care, income maintenance, elementary/secondary education, post secondary education, band government support, housing and capital infrastructure and maintenance. The health-related funds of child and family care and adult care would complement the other health components in an integrated financing model. Figure 6 provides a breakdown of these DIAND expenditures in Ontario in 1997/98. Most of these expenditures are paid directly to the Ontario Ministry of Community and Social Services (MCSS), nursing homes or First Nations political organizations. As a result of the 1965 Ontario Welfare Agreement between the province of Ontario and DIAND, the province agreed to provide services for social assistance, day care, child

47
welfare, homemakers and nursing in-home services. The province is reimbursed for the majority of these expenditures: for home care, the federal government pays 20% of the gross costs and 91.46% of the remaining 80% of costs incurred by the Ontario government. Regarding Type I and II institutional adult care, the federal government reimburses 100% of the provincial expenditures. The federal government also pays 91.46% of all child welfare costs. The DIAND financial system records expenditure information is based on an agreed cash flow with MCSS and First Nations and not actual costs incurred. The 1997/98 data in Figure 6 are estimates based on this projected cash flow as the financial audits of the programs are not yet completed and actual expenditures are not available. These estimates do not include headquarters or regional administration costs. (The total departmental spending on overhead reported in DIAND’s main estimates is about 3% of total departmental costs.)

**Adult care**

This program covers both institutional care and non-nursing home care. There has been wide variability in the per capita amounts provided to the regions for home care, as the allocation by headquarters has been based on historical levels. Additional resources were provided to regions which had demonstrated disparity in 1994/95.

The institutional care component is directed to Type I and II adult residential care. Higher adult level care which requires increased health services is the responsibility of the province under the *Canada Health Act*. There are only 13 residential care institutions situated on reserves in Canada, seven of which are in Manitoba. Of the remaining, three are in Ontario, two in Alberta, and one is in British Columbia. Utilization in off-reserve institutions by residents of First Nation communities has been low as many elderly and disabled people do not want to leave their communities. As well, provincial health facilities must accommodate the demand from both the general population and First Nations. Because of these factors, expenditures for institutional care show great disparities among the regions.

Figure 6 shows that a total of $10,955,117 was spent between home care and institutional care in Ontario in 1997/98.

Issues to be resolved if adult care was included in an integrated health funding model include:

- How can institutional dollars to First Nations be allocated equitably given the great range seen in per capita expenditures historically?
- What would be the catchment area of existing First Nations residential homes in the context of the surrounding First Nations? Would institutional resources be
distributed to these neighboring communities and services be contracted back to the institution?

- This analysis is focused on First Nations in Ontario, but in the broader national context, MSB may in practice pay for differing levels of residential care among the regions. How would resources be allocated to equitably address these region-specific issues?

Child and Family Services

Under legislation, provinces have legal authority for child and family services, stemming from their jurisdiction over health, welfare and education provided in the Canadian constitution. Before the advent of Indian Child and Family Service (ICFS) Agencies, the federal government reimbursed provinces for services provided, commonly from Children’s Aid Societies. Since the late 1980s, First Nations gradually assumed control over child care through ICFS Agencies, and direct provincial administration has greatly declined. ICFS Agencies are involved in foster care, group homes and institutional care for First Nations children up to 18 years of age. As Figure 6 shows, the estimated 1997/98 expenditures were $25 million in Child and Family Services, or two-thirds of the total health-related resources from DIAND.

Issues of note for an integrated health funding model include: How to align ICFS resources from ICFS agencies which represent several bands in an integrated health funding agreement if the health resources are not managed by the same band grouping?

Family Violence

The DIAND family violence initiative expired in 1995/96 however was extended into 1997/98. This initiative provides funds for the provision of on-going community-based services to deal with all aspects of family violence on reserve, including emergency shelters. There were four emergency shelter projects funded in 1997/98. The non-shelter funds were flowed mainly to Political Treaty Organizations (PTOs) to be distributed to communities. Together, these two components accounted for an estimated $1.4 million in 1997/98 (Figure 6).

Issues of note for an integrated health funding model include: What will be the relationship between PTOs and communities? Will a community’s resources remain at the PTO level or be allocated directly in the envelope of funds?
The third funder of First Nations and Inuit health services is represented by the provinces and territories. In the majority of cases, the province provides services rather than actual funds, as seen regarding health services insured under the *Canada Health Act*. First Nation and Inuit have little or no control over the planning and delivery of insured hospital services. Provinces have a recent history in devolution of institutional resources, as in all provinces except Ontario, regional health authority envelopes are founded on hospital budget transfers, with other budgets for services added according to provincial priorities. The situation has not occurred, however, where a portion of hospital’s budget is severed and given to a particular population in the hospital’s catchment area. This practice has many precedents internationally, with perhaps the most well-known being the GP fundholder system in Britain, where physician groups hold health funds for the benefit of their patients and contract with hospitals and specialists for needed services.

Considering the population of First Nations in Ontario compared to the total Ontario population, in this province at least, there would usually be minimal risk to the hospital sector in transferring hospital resources to First Nations control. In many cases, the transferred funds would be a minor part of a hospital’s budget, and the First Nation would have to negotiate with that same hospital for the return of the funds in the form of a contract. With the restructuring and merging of hospitals currently underway in Ontario, the likelihood of a market driven system where one hospital would compete against another for the First Nations business is remote except for some major southern Ontario cities. What the system would provide is the opportunity for performance contracts which clearly spell out the hospital’s commitments in terms of access and quality of care. Furthermore, the First Nation would become a respected stakeholder in the institutional system, and could negotiate services which are aligned to First Nations needs, such as interpreter services, traditional healers or enriched services for diabetics. In two areas where federal First Nations hospitals have existed (Sioux Lookout and Moose Factory), current arrangements with the province, federal government and First Nations have provided a model for tripartite collaboration.

The situation with respect to physician services is less clear. In most if not all provinces, the history of physician-provincial negotiation of FFS schedules has been rocky to say the least. The physician lobby is powerful, and individual First Nations would not have the financial or political clout to realize similar negotiation successes to that obtained by the provinces. As well, physicians’ receptivity to their budgets being rolled into an integrated funding agreement, and alternate forms of reimbursement pursued, is unknown at this point. In provinces where an
alternative medical funding mechanisms have been suggested, physicians are adamant that choice must exist, and that they will not be forced into salaried, capitation or contractual arrangements exclusively.

In Ontario, there are three main sources of health funds for First Nations: services covered under the Canada Health Act: OHIP and hospital (including the Medicare services at Sioux Lookout Zone and Moose Factory Zone), health programs some of which are largely reimbursed under the 1965 Agreement, and the Aboriginal Healing and Wellness Strategy (AHWS). As Figure 6 shows, an estimated $78.2 million was spent in 1997/98 on First Nations on reserve. The following observations are pertinent:

- The AHWS is a collaboration between First Nations, Métis and off reserve Aboriginal groups and the provincial Ministries of Community and Social Services, Health, the Ontario Native Affairs Secretariat and the Ontario Women’s Directorate. The Strategy provides resources for a variety of services to both on or off reserve populations including community prevention and health promotion workers, health liaison, crisis intervention teams and workers, health outreach workers, healing lodges and treatment centres, shelters, Aboriginal health planning authorities, maternal and child centres, community health access centres and translators. In 1997/98, expenditures for all services funded in First Nations communities or which serve both on and off reserve populations, were $24,92,467 excluding capital expenditures. This $24 million includes both operating costs (e.g. health access centres) and one-time grants (e.g. training projects) awarded through a competitive process.

- OHIP and hospital acute separations expenditures are identified for First Nations on reserve in the Ministry of Health database using a residency code. Missing from the expenditures provided is the cost of chronic hospital separations. Also listed in Figure 6 are Medicare services expenditures which include hospital services in Sioux Lookout Zone and WHA and physician services in WHA provided under a cost-sharing agreement with the federal government.

- It is very difficult, if not impossible to allocate other health program resources between on and off reserve populations, as Ontario Aboriginal health programs are provided to all Aboriginal people regardless of status. These programs include community health services, mental health services, diabetes strategy, Best Start Program, supportive housing, AIDS programming etc. As noted in Figure 6, an approximation has been made using the proportion of First Nations on reserve compared to the total Ontario Aboriginal population. An adjustment has been incorporated for the services reimbursed by the federal government under the 1965 Agreement.
Administration costs have been included in the AHWS expenditures, but were not provided for the balance of the provincial programs.

Issues for discussion on provincial funding in an integrated health funding model include:

- At what point should physician budgets be part of an integrated funding agreement - immediately or after integration in other areas of the health budget has established a track record and illustrated its benefits to a wary physician lobby?
- How would the provincial health insurance system deal with the on and off reserve migration of community members? This is an issue in integration generally, but perhaps more so for the provincial resources, due to the high costs of hospital stay and physician services.
- What should be the amount of hospital resources transferred? Average per capita costs based on the province as a whole, adjusted for need (see equity section above), or the historical costs which have previously shown a significantly reduced utilization of First Nations for hospital care? First Nations needs are great, and perhaps community control over the entire health system would mean that barriers to access are removed, and utilization would increase. In that case, funding on historical costs would put First Nations in a deficit position.
- Similarly, First Nations in the past have shown a higher usage of general practitioners than specialists when compared to the provincial usage. What would the basis be for the physician financial transfer – historical costs or costs projected on need?
- What compensation should be provided to First Nations for hospital resources being removed from the institutional sector by the Hospital Services Restructuring Commission in Ontario? Currently $900,000 is being removed from this sector, with equivalent amount to be reinvested into community-based and other care. The province is not required to provide home care services on reserve (although some services are provided through the 1965 Agreement as the section on DIAND financing illustrates), however First Nations will equally share the hardship imposed by decreased hospital resources. In fact, as home care resources are more scarce in First Nations communities presently, the impact of hospital closings may be more profound among this population.

4. Per Capita Expenditures

Figure 7 presents the 1997/98 expenditures on a per capita basis using the on reserve DIAND First Nations population. As the NIHB program is provided to all First Nations regardless of status, its per capita calculation uses the total DIAND First Nations population to provide a true
reflection of the cost allocation. As a result, the MSB proportion of the total per capita 
expenditures drops to 57.4% or $2,233.72 per person. The province of Ontario’s share of the 
per capita expenditures is $1,120.14 or 28.8% of the total, and DIAND’s health related 
expenditures are $536.36 per person or 13.8% of the total.

As mentioned earlier, an analysis of 1991/92 OHIP data found that on reserve residents 
consumed 30% less OHIP expenditures than the rest of the population. The 1997/98 expenditure 
data provided here show that $233.78 was spent per capita on reserves for OHIP services; if 
contract physician costs are added, this amount increases to $255.73. For the non-First Nations 
population in Ontario, per capita OHIP costs are $406.70. These results confirm the difference 
seen in the 1991/92 data and suggest that in fact, the disparity is increasing. For OHIP 
expenditures solely, First Nations on reserve consumed 42.7% less expenditures than other 
Ontario residents or 37.1% less if contract physician expenditures are included in the calculation.

**Community Expenditures**

Figure 8 provides a comparison of the total health and health-related expenditures for Community 
A and Tribal Council B by source of funds:

1. **MSB**

Both health authorities have completed health transfer, and the majority of the non-NIHB 
expenditures are captured in these agreements. Non-transferred expenditures in both 
communities include Aboriginal Head Start, Health Careers, health liaison, consultation funds, 
Canada Prenatal Nutrition, and the Green Plan (under Environmental Health and Surveillance). In 
addition, Community A receives $86,365 for administration of its NIHB Program which exists 
outside of the Health Transfer agreement. The total expenditures for both communities are 
comparable at $7.8 million in Community A and $8.3 million in Tribal Council B, which at face 
value might be not surprising given the similar populations of both bands. However as the 
following section illustrates, Community A, because over 80% of its population live on reserve 
compared to less than 50% for Tribal Council B, has a far smaller per capita allocation.

Figure 9 provides a per capita comparison for both communities. With respect to NIHB per 
capita costs which have been calculated using the total population, Tribal Council B at $558.89 
per person is 6.2% higher than Community A, and most likely is attributed to the increased costs 
seen in a rural population which has poorer access to health providers and higher medical 
transportation expenditures. The economies of scale achievable with a larger community which
is not spread out over seven separate reserves are seen in the per capita calculation for the non-NIHBP program expenditures as Community A expenditures were less than half of Tribal Council B’s ($425.73 versus $907.75).

2. **Province of Ontario**

Figures 8 and 9 provide community comparisons for the main program areas funded by the province of Ontario, by gross expenditures and per capita expenditures. These expenditures are described below.

*Aboriginal Healing and Wellness Strategy*

The expenditures provided in Figures 8 and 9 encompass all operational dollars under the AHWS, including one-time grants. Capital expenditures have been excluded. Both communities have been funded for Community Health Access Centres under the Aboriginal Healing and Wellness Strategy and operate with $1 million in annual funding. Tribal Council B’s Health Access Centre is a partnership with a neighbouring Friendship Centre and provides services to both on and off reserve Aboriginal people. It provides holistic treatment, health promotion and prevention services at several community-based health stations or at the homes of clients who have difficulty traveling. Community A’s Health Access Centre serves the community residents and those members living off-reserve in neighbouring urban centres. It employs a dentist, registered nurse, practical nurse, dietician/nutritionist, medical records clerk, outreach worker and a program manager. Physicians and specialists serve the community on a rotating basis. To support this activity, lab services, physiotherapy, occupational therapy and speech therapy are offered on a part-time basis.

Apart from the Access Centre, Tribal Council B is funded by the AHWS for community prevention and health promotion workers through the Association of Iroquois and Allied Indians and the Union of Ontario Indians. Community A receives funding from the AHWS for its Expanded Shelter Project. The shelter facility contains 5 three bedroom units and is staffed by two outreach and child care workers who provide counseling to the community.

Overall, the AHWS expenditures are similar for both communities at approximately $1.4 million, however when calculated on a per capita basis using the on reserve population, a difference is apparent similarly to that seen with the MSB expenditures above. Community A’s per capita expenditures are roughly half ($184.10) of that calculated for Tribal Council B ($377.51). This per capita calculation may be inaccurate, given that both communities’ Health Access Centre
serve off reserve residents, and in the case of Tribal Council B, all Aboriginal people in the catchment area. However, if the total member population in a per capita calculation is used, a more comparable expenditure level of $152.70 for Community A, and $162.64 for Tribal Council B is obtained.

**OHIP and Acute Separations**

Figures 8 and 9 show a sizable difference between both communities regarding physician and hospital expenditures, both in gross and per capita illustrations. It might be expected that Tribal Council B would have increased medical costs as ruralness in Northern Ontario is generally associated with lower socio-economic circumstances and this is often accompanied by poor health status. The submitted expenditures show that Community A expended $56.83 per capita on OHIP\(^a\) and $69.68 per capita on acute care hospitalization, with Tribal Council B posting expenditures of $245.10 and $197.01 respectively.

**Health Programs**

A different spectrum of health programs (outside of the AHWS) are funded for each community by the Ontario government. In Community A, this funding is primarily for nursing services in its residential care facility, with a lesser amount for emergency services (ambulance). Tribal Council B receives funds for a pilot project “Best Start” (prenatal and infant care to ensure children and families and pregnant women have a nutritionally balanced lifestyle), for the Northern Diabetes Network, and for community support services to Elders (such as meals on wheels, day programs, respite care, home help etc.). In addition, Tribal Council B homemaker and nursing services are provided by MCSS under the 1965 Agreement, with the majority of these expenditures reimbursed from the federal government.

Overall, the province of Ontario’s per capita calculations show that Community A’s expenditure at $362.12 is 33% of that seen with Tribal Council B ($1,102.16). If the alternate per capita calculation for AHWS funds are used (see above), Community A’s total provincial expenditure is $330.72 which is 37% of the Tribal Council B’s per capita expenditure of $887.29.

\(^a\) Community A’s total physician costs, including expenditures for residents residing in Quebec were $110.68 per capita. This additional amount includes payments to Ontario physicians for services to persons covered under the Quebec provincial insurance plan and the differential costs (between the Ontario reimbursement rate and the lesser Quebec rate) which were paid out of the NIHB Program.
3. **DIAND**

Most of the DIAND expenditures are paid directly to MCSS, nursing homes or PTOs, and therefore no categorization of expenditures by community is possible. For descriptive purposes in Figure 8, a straight allocation based on population has been provided, with the exception of Adult Home Care where community breakdowns were available, the expenditures for the residential care institution (adult and child care components) and an emergency shelter in Community A, and a direct allocation for family violence services in Tribal Council B. Because of this, the DIAND gross and per capita expenditures provided in Figures 8 and 9 should be viewed with caution, as hypothetical not actual. Expenditure estimates to the two communities reviewed here which were received from DIAND include the following:

- $1,008,400 residential care - adult Community A
- $206,800 emergency shelter Community A
- $179,799 institutional care - child Community A
- $651,800 adult home care Community A
- $296,100 adult home care Tribal Council B
- $12,600 family violence Tribal Council B

Community allocations based on population were calculated for MCSS home care funding, MCSS and PTO child and family services, adult institutional care (other than Community A) and PTO family violence services, and were integrated in Figure 9 with the expenditure estimates detailed above.

The allocation which is presented shows Community A as receiving higher expenditures from DIAND than Tribal Council B. This is likely a reality, due to the presence of its residential care institution which is funded entirely by DIAND (with the exception of some Ontario funded nursing services mentioned above), and the funding of an emergency shelter.

**Combined Expenditure Scenarios**

Figures 10 and 11 look at the total resources available on a per capita basis for two scenarios of an integrated funding model: combining the health expenditures of MSB and the province of Ontario or secondly combining all health and health-related expenditures by the addition of DIAND. Regarding the first scenario, $1,314.04 per capita would be available for inclusion in an integrated health funding model for Community A, and $2,568.80 for Tribal Council B. On a gross expenditure basis, Community A’s envelope would be $10.4 million with $12.5 million
available for Tribal Council B. The increased expenditure base of Tribal Council B can be attributed to its geographic location (a consideration in MSB formula based allocations), the small community sizes, and the amalgamation of several communities with health clinics and separate fixed costs in each. Also the increased costs are likely related to demonstrated health needs which will have (at least to a limited extent) driven the scope of health services provided and which may explain the large difference seen in OHIP and acute hospitalization expenditures. The second scenario which incorporates DIAND resources has presented hypothetical DIAND allocations as much of the health related resources from DIAND is paid directly to MCSS (for 1965 Agreement services), PTOs or nursing homes and is not available on a per community basis. The presence of institutional facilities (adult care, child care and emergency shelter) in Community A is resource intensive and contributes $1.4 million in identifiable resources. In this scenario, Community A would receive $15.6 million or $2,013 per capita and Tribal Council B would receive $14.3 million or $3,081 per capita.

For both scenarios, administration costs which have not been itemized in the above analysis would be an additional component to the community envelopes. Costs which are not present in the expenditures provided are those relating to the administration of the DIAND programs, and the non-AHWS provincial programs. The role and size of the funder departments in an integrated health funding system will influence the amount of resources to be retained for administration in each of these organizations.
Community Structures and Requirements

Economies of Scale and Purchasing

A community’s desire for self-determination in health services must be tempered with the realities of the system’s fiscal limitations. This has already been seen in Health Transfer, where small communities are partnered under a common Health Authority umbrella. By avoiding duplication of administration and by sharing health professional resources, fiscal efficiencies are achieved. A minimum population size will need to be established to ensure the viability of an integrated health funding arrangement. This is not without precedent among First Nations and Inuit. The optimal child population for Indian Child and Family Service Agencies has been established at 1,000 to qualify for funding from DIAND, and generally agencies with less than 250 children will not be considered. Exceptions are permitted, and include isolation and remoteness of bands that would negate any efficiencies sought through economies of scale, cultural differences that would not lead to effective working relationships, and existing groupings whereby certain bands are already linked in the administration and delivery of other programs.52

The NIHB Program is one area where it is essential to have a sufficient client base to adequately manage risk. Risk refers to the possibility of funds being depleted at a faster rate than expected due to unanticipated major illness or catastrophic events, such as an epidemic. Risk can be accommodated in a number of ways:

- increasing the population pool so that on average, low utilization clients will even out with the costs of the portion of the population requiring increased services. The optimum minimum population to adequately handle risk in the NIHB program must be assessed.
- maintaining a centralized purchasing function at a regional level. This will provide drugs and other supplies at a lower cost than could be negotiated on a community-by-community basis.
- arranging group contracts for health professionals, such as dentists, optometrists, physiotherapists and other visiting health professionals. (One of the benefits of devolving the NIHB funds to communities is the opportunity which is generated to substitute FFS reimbursement with contracting or salaried positions.) Not only will small communities be able to access contractual services they otherwise could not, health professionals will have a guarantee of more work, and the convenience of negotiating with only one administrative body.
- setting aside a pool of funds at a regional or national level to deal with
catastrophic emergencies. As the US experience has shown, it will be important to establish an adequate level at the outset, to avoid this fund from running out of money before the end of a fiscal period.

An optimal size for NIHB administration (including contract positions) may be larger than the size of most existing partnerships which have been forged through Health Transfer. One option for consideration to limit risk and create economies of scale would be to use networks of health centres, which partner for certain services. This is often seen in health systems, where autonomous organizations create centralized bodies for laboratory services, laundry and food preparation, and realize substantial savings. In this case, a representative from each governing authority would sit on a common board. The benefits of health networks may extend past achieving fiscal economies of scale, to include shared ventures in research and information collection, standard setting, advocacy, and knowledge dissemination.

The Maori of New Zealand have demonstrated success in the purchasing of health services for their communities. In 1991, the government of New Zealand introduced health reforms, which separated the roles of purchasers and providers of services. Four regional purchasing authorities were created in the country as a whole, which were charged with the responsibility of purchasing services from appropriate providers on behalf of the community. Maoris’ involvement in health services was bolstered by two policy directives from the government to the health authorities which emphasized Maori health as a priority and which instructed the health authorities to contract with Maori health providers and organizations. This has allowed Maori organizations to be involved in budget holding. For example in Wanganui, where Maori are dispersed throughout the urban area, the Maori organization has capitation contracts with physicians to provide primary care to people enrolled in the organization. Other organizations are holding funds for secondary care, which allow Maori services to contract with specialists and hospitals on a performance contract basis. Other examples of budget holding include pharmacies, pathology services, disability services, community nursing services, and traditional healers.53

Part of the Maoris’ success in this area was facilitated by New Zealand’s health structure of one health department (they do not have a federal system), and the commitment of the government to make Maori budget holding work. This example provides a model for consideration in the Canadian context, where First Nations would contract with regional health authorities for purchase of services, rather than deal directly with individual hospitals, home care organizations and the like. These authorities could also provide assistance with program planning and evaluation.
Governing Body

Governance is another area where the realities of small communities dictate a flexibility in terms of structures and models. Optimally, there should be distance between the political system and the health care delivery system. In the ultimate expression of integrated financing, such as the James Bay and Northern Quebec self-government agreement, a separate Health Board controls and operates the health system. A ‘neutral’ governing body is seen as providing a buffer so that health care does not become a political commodity, and to provide a non-political rationale for decision making. The provinces have provided nine examples of provincial governments creating regional structures to distance political decisions from operational, health service decisions.

In small communities, existing capacity may mean that a band council official may provide the representation on a common body that is administering the health funds on behalf of several communities. In larger tribal councils such as those which have undergone Health Transfer, an established body already exists. Ultimately, the entity controlling and administering these resources has to demonstrate accountability to both the funders and the community. It must incorporate a structure which will reassure the political First Nations and Inuit leaders that communities have adequate representation and voice, and must satisfy financial, reporting, and performance requirements of the government funders.

Capacity

The previous section alludes to accountability requirements of First Nations and Inuit in an integrated health system environment. Accountability relates directly to the capacity of a community to successfully handle the devolution of these resources. Currently, 220 communities have undergone transfer (representing 114 separate agreements). These communities have demonstrated administrative capacity in the transfer environment and will be the most appropriate candidates for to pilot an integrated health funding model in the first instance. As well, these communities have overcome their concerns voiced about transfer – including treaty right infringement, reductions in federal fiduciary responsibility, and inadequacy of the resources available. It is likely that these issues will also be directed to a integrated health model of financing.

Integration of health funds may be seen as a natural continuation of the transfer process, and may serve as the precursor to a full transfer of integrated health and social services resources. Its successful implementation will require capacity building in a number of areas:
transitional management strategies: Implementing an integrated health funding arrangement will require a close relationship between communities and funders in order to ensure that the appropriate education and training occurs prior to the integration and for a period thereafter. For example, transfer of the NIHB program may be best accomplished in phases (vision, pharmaceutical, dental etc.), so that monitoring and administrative mechanisms which are now used by the third party managers are in place one-by-one, and are operational. This process should be transparent to the users in that minimal or no disruption of service occurs. Consulting services in government department will be needed for some time after transfer, so that First Nations and Inuit have ready access to expertise and advice on a real-time basis.

information systems: The Advisory Council on Health Info-structure in its interim report has identified three strategic thrusts which will guide its recommendations on an health information highway. Although the Council’s scope is broader than the First Nations and Inuit environment, these thrusts are informative to this discussion:

i) Empowering the public. The information system should provide public access to the information needed to make health decisions and provide a single window of timely and credible information.

ii) Strengthen and integrate health care services. A client based system where the collection and management of clinical data and health services are organized and linked to meet patient needs, privacy safeguards and administrative objectives in a seamless system.

iii) Creating information sources for accountability. An info-structure which will contribute to achieving accountability within the health care sector by gathering, analyzing and disseminating new information.54

In an Aboriginal context, the physical presence of a health information system will only be as useful as the ability of the community to gather, analyze and disseminate health information, and therefore human resource capacity building must go hand-in-hand with infrastructure development. Not only will an internal system be necessary to link various programs and services, an external infostructure will be needed to communicate with other communities. This external link may serve a variety of functions, including comparisons of health status gains among communities, a mechanism to share clinical data and thereby serve client needs in an integrated system, access to external health services and expertise, and accountability to the community and funders. Economies of scale will dictate that small communities will need to collaborate or partner in many health programs.
and services, and communication links will be essential to transfer client information in an effective and efficient manner.

For First Nations and Inuit who operate in an integrated health system, there may not be access to the same variety of administrative supports now provided by federal government departments. For discussion in the development of an integrated model will be the continuation of the traditional federal role in information collection on health status and service utilization.

**focus on evaluation and health outcomes**: A principle of a reformed First Nation and Inuit health system should be that it uses evidence in its policy and management decisions, and that it empowers community members to be more knowledgeable about evidence and actively involved in the decision making which occurs. These activities require ongoing information on health outcomes, health status, operational efficiencies, and community satisfaction. Information, planning and evaluation systems which will provide autonomy from centralized structures should be designed. For example, the Health Information System (HIS) developed in Ontario Region and now being adapted for other regions is an epidemiological database which provides evidence for case management, for the establishment of community based program priorities, and for the planning and evaluation of programs. As well, MSB, or a national body such as the Aboriginal Health Institute, could provide a clearing house function for communities concerning pertinent findings from the research and knowledge sector, and could also play a role in the continuing education of First Nations and Inuit personnel.

**development of First Nations and Inuit resources.** The development of administrative and clinical capacity in First Nations and Inuit health systems is a long term process. An integrated health funding system should include the flexibility to devote resources to nurturing and supporting community members who have indicated their desire to proceed in a health related career. In the short term, capacity building may realistically relate to strategies to recruit and retain external people to work in the health care system. This may involve innovative approaches between communities and educational institutions, for example, co-op arrangements with students who have indicated on application to the educational program, that they are interested in working in a First Nations and Inuit environment.
Requirements and Principles

The transfer of block funds in a form which will totally devolve health services to First Nations and Inuit, will require the establishment of principles or conditions. Provinces have conditions for receipt of the Canada Health and Social Transfer which are encoded in the *Canada Health Act*. Any devolution of health funds from provinces to First Nations and Inuit for insured services will require adherence to these five principles of comprehensiveness, accessibility, universality, portability and public administration. Universality of coverage to all community members is essential, and will require that for provincial purposes at least, the transfer of funds will be provided to all persons in the community regardless of registration under the *Indian Act*. Public administration may need to be interpreted in a sense that will allow a variety of entities to govern the health system, including band councils. As well, development of a principle of portability of benefits will need to address the reality of back and forth migration of community members on and off reserve.

MSB and DIAND will also have defining principles for the transfer of funds, but these should be couched in broad terms concerning the provision of community care, the attention to the holistic needs of a community, the inclusion of services to meet child care requirements, adult care, addictions, mental health, primary nursing care, among others. These principles should also be aligned with the present federal policy of providing NIHBs to all First Nations and Inuit regardless of residence in Canada. A fundamental characteristic of an integrated health system is the freedom for communities to design programs and services which will best address health needs, to avoid this financing model from being a mirror image of Health Transfer with additional funding sources thrown in.

An annual report should be a requirement, and designed in the manner of a performance score card, similarly to the concept now being discussed at the provincial level. This annual report, in addition to showing financial accountability, should include health outcome measures, utilization and costs of services. The requirements of an annual report will depend on the information capability of the First Nations and Inuit health systems. In this respect, these requirements may be evolutionary, and a plan should be devised between First Nations and Inuit, and the government funders, which will set out the expected progress in addressing specific reporting criteria. One of the features of an integrated financial system should be a reduction in the number and frequency of required reports, and efforts should be made to design a single annual report which is acceptable to all parties concerned.
Legislative Environment

The devolution of provincial resources for hospital and physician health services to First Nations and Inuit control in a non-self government environment has no precedent. Provinces, such as Manitoba and Ontario, have entered into contractual arrangements with the federal government to provide insured services to First Nations, and more recently in a tripartite form, with First Nations and the federal government (e.g. Moose Factory). Provinces also routinely devolve resources to regional health authorities. A similar process could be developed for First Nations and Inuit, eliminating the need for legislative amendment.

Although a legal analysis would be necessary to substantiate the following statement, it does not appear that a transfer of funds for health services directly to First Nations and Inuit, in an agreement which clearly spells out provincial expectations and requirements, would contravene existing provincial/federal arrangements for financing of health services. However, a scenario where the federal government directly transfers to First Nations their share of the Canada Health and Social Transfer (without going to the province initially), would likely require legislative and parliamentary approval.

Pilots

Effective health system planning requires a knowledge and certainty of funding levels past the current fiscal year. The Health Transfer process operates on a five year funding period, after which transfer agreements are reviewed and new agreements negotiated. An integrated health funding arrangement should initially be explored on a 5 year pilot basis to those transferred communities who have indicated a desire to move to a more autonomous integrated form of health services delivery. Restricting the pilots to transferred communities will limit the amount of capacity building which will be required to implement a new financing model. These communities will have completed a fairly recent community needs assessment, which can be used as a starting point for a more comprehensive planning project. However, an option may be to devolve existing services in a fairly intact form, and then let the communities involved initiate changes to the health system in a measured, controllable fashion.

A fundamental issue in the development of pilots will be whether to base funding allocations on historical costs or on a needs-based per capita formula. Historical cost allocation has the advantage that it is relatively easy to calculate and will not create any “winners or losers” in a re-allocation process. However, it will not address the stated desires of First Nations to determine
funding levels based on community need. A per capita allocation process will require extensive consultation, evaluation and research into appropriate equity-based indicators and will undoubtedly result in some communities receiving less money and others requiring more. There are two options which may be considered feasible, and which have already been utilized in First Nations and Inuit program funding:

1. Retain historical costs and utilize the needs-based formula for new resources entering the system. A similar situation occurred with the regional HIV/AIDS funding, when a new formula (AFN-MBF) was implemented in an established funding process. The decision was to utilize the formula to allocate new funds expected in 1997/98, and to leave the historical funding levels untouched.

2. Implement the needs-based per capita formula immediately, but phase in any financial adjustments over a period of 3-4 years. During this time, over-funded communities would be gradually reduced to their formula-established funding levels and under-funded communities would be similarly increased. This process was implemented by DIAND when a new funding formula was developed for the ICFS Agencies. Some established agencies which had been established in the early days of the initiative at generous funding levels saw a gradual reduction of funding to the formula level over a five year period. For organizations which were funded at a rate which was lower than that calculated by the new formula, a phase in period of 4 years was established, with the organizations receiving 75% of the formula in the first year, 85% in the second year, 95% in the third year, and full funding in the fourth year.
Observations

1. The movement to an integrated health funding arrangement is a natural progression of the health system development in First Nations and Inuit communities. This observation is supported by the activities now occurring in indigenous communities, both in Canada and internationally, who are integrating resources, often within the confines of separate funding systems in their efforts to provide a holistic approach to health and social needs.

2. Jurisdictional boundaries will disappear when opportunities arise and make collaborative partnerships worthwhile. The Aboriginal Healing and Wellness Strategy has a pan-Aboriginal approach to funding of health services, and does not recognize on and off reserve splits. For example the Health Access Centre funded for Tribal Council B is a collaborative effort with a Friendship Centre, and all Aboriginal people in the communities encompassed by the Tribal Council and the Friendship Centre may access services.

3. Providing an integrated envelope of resources close to the service delivery level makes sense, and has been seen in a variety of situations, from regional health authorities in Canada, to Maori control of health services in New Zealand, to GP fundholding practices in Britain, just to name a few. These experiences have shown the importance of flexibility in what services to be included in an envelope, as jurisdictions may wish to handle only primary care, secondary care or all levels of the health care system.

4. Despite many fears about cost-shifting from the provincial government to First Nations, in the NIHB Program at least, there are few examples in Ontario of costs which have been off loaded. The most visible example is the implementation of copayment fees in the ODB Program in 1996. Nonetheless, anxiety exists about future delisting, particularly in the pharmaceutical program and ambulance services. A more significant cost-driver may be the hospital restructuring in Ontario which is reducing hospital beds, and encouraging earlier discharge. There is no easy way to quantify cost-shifting arising from restructuring, and in the absence of a collaborative relationship between MSB and the Ontario Hospital Restructuring Commission which could proactively address future impacts on the First Nations health system, First Nations must take a patient wait-and-see position.
5. The two communities profiled show a significant difference in the type of health services in the community, per capita expenditures, utilization of provincial services, and achievable economies of scale. For the two communities studied, it appears that for current services offered, on a per capita basis, it is at least two times more costly to run a multi-site health system in a mixed rural-urban location than a single-site urban system, even when population numbers are fairly high by First Nations standards. Community A is able to absorb the costs of a residential facility and emergency shelter in its budget and still be substantially lower in per capita costs.

6. This analysis did not look at health status or socio-economic indicators for the two communities which were profiled. Conclusions are not possible regarding the sufficiency of the present funds to meet health needs or if the differences in expenditures between the two communities can be related to equity of resource allocation. A detailed analysis of actual services, health status, and socio-economic characteristics of both communities will be necessary to understand more fully the range of expenditures seen.

7. In theory and based on Canadian and international experiences, a First Nations and Inuit approach to integrated health resources is achievable and has a high likelihood of creating a health system that is more accessible, cost-effective, and where a holistic approach to responding to community needs is nurtured. The most challenging component to integration of funds will be the development of an resource allocation mechanism which is premised on and which provides equity of health care. Some operational issues raised in this report which should form part of a First Nations and Inuit consultation on the topic of an integrated health funding arrangement include:

- How can a fair and equitable distribution of adult care institutional resources and home care resources be developed? What will be the continued role of MCSS in the provision of adult and child care?
- Will community collaborations follow existing tribal council and agency affiliations or will larger groupings be possible to effectively manage NIHB resources?
- What will be the future relationship between PTOs and communities regarding health resources now directed to PTOs?
- How can communities function independently but form strategic alliances to maximize limited funds (e.g. family violence monies and other special projects), to ensure cost-efficiencies (e.g. NIHB Program) or to negotiate with providers (e.g. physicians, hospitals, or other providers)?
- On what basis should hospital and physician resources be transferred – historical
costs or needs-based? The latter is recommended (see #10 below) but will mean a broader provincial discussion will be required as resources may be directed from the general population to First Nations’ health services.

> How will the on and off migration of community members be factored into a resource agreement?

8. The analysis of two communities has shown that the inclusion of province of Ontario health expenditures and DIAND health-related expenditures with total MSB expenditures will easily triple or quadruple an existing Health Transfer budget. Province wide, the combination of MSB, province of Ontario and DIAND expenditures in 1997/98 are estimated at a total of $319 million or $3,890 per capita. Despite the variation in per capita expenditures seen between Community A and Tribal Council B ($2,013 and $3,080 respectively), they are both well under this provincial per capita average, and illustrate the range of economies of scale possible even for small communities which are grouped under a common authority.

9. Primary care reform must include physician services as they make up a significant proportion of primary care resources, and therefore it will be important to include physician resources an integrated system. Physician buy-in will be crucial to its successful development, and their support should be sought early in the development process.

10. Equitable access to health care will mean a redistribution of resources not only within the environment of First Nations and Inuit communities, but also within the larger provincial system. The substantially lower OHIP and acute separation expenditures seen among First Nations in Ontario compared to the rest of the population, cannot be set aside without redress in the development of an integrated health funding arrangement, given the poorer health indicators seen among First Nations.

11. Not all communities will be ready to assume the challenges of an integrated health funding system, and Health Transfer should remain as an intermediary step or a permanent strategy for First Nations in their quest to achieve greater self-determination and control of health services. Simply put, integration will not be for the faint of heart, and only those communities which have demonstrated successful approaches to management of resources and community involvement/accountability should be eligible for this new funding strategy.
12. The development of an integrated health funding model should embrace evidence-based decision making and continuous quality improvement as integral to its design. Information systems must be available to monitor performance, provide data for planning and program delivery, and serve accountability and reporting functions.

13. This paper is presented as a starting point for discussion between First Nations and Inuit and the three funding bodies, in the following areas:

a) The development of a needs-based funding formula which addresses equity in access to services. Variables for discussion include:

*Base equal per capita allocation, adjusted for:*
- health status indicator (e.g. mortality rate);
- demographic structure: age and gender
- socio-economic factor
- geographic location
- community size

*Capacity-building equal per capita allocation, adjusted for:*
- geographic location
- community size

b) The base population to incorporate in a needs-based formula. Options are:
- population based on *Indian Act* registration
- band membership
- community membership for non-NIHBS, *Indian Act* registration for NIHBs

Also for discussion: mechanisms to adjust for projected growth in the First Nations and Inuit population.

c) The appropriate population size for the effective management of an integrated health funding arrangement:
- minimum size for non-NIHBS to limit risk and incorporate economies of scale
- the minimum size for a NIHB program to limit risk
- creation of health networks for purchasing, shared services, standard setting etc.
d) The models for governance in an integrated health system:
   - flexible design based on community size, geographic location
   - minimize direct political involvement

e) Capacity development strategies:
   - transitional management strategies between communities and funders
   - information systems to support the delivery of health care, link communities which share services, access to external health services and expertise, provide information for accountability purposes
   - focus on evaluation and health outcomes, and development of systems to support this information collection
   - development of First Nations and Inuit resources: long term plan to develop administrative and clinical capacity

f) Requirements and principles:
   - establishment of principles compatible with Canada Health Act, and which reflect a holistic approach to meeting the health needs of a community
   - development of criteria for an annual report which will be acceptable to all parties. Report to include financial accountability, health outcome measures, utilization, costs of services

g) Legislative Environment:
   - development of a provincial transfer process which is comparable to other provincial transfers, for example, to regional health authorities

h) Pilots:
   - development of a 5 year pilot process
   - selection of participants based on successful performance in transfer environment
   - decision on the use of historical costs versus a needs-based per capita funding allocation
ENDNOTES


3. NIHB program increases have also been ascribed to population growth, effect of Bill C-31 re-instatements and registration, increasing cost of technology, and a higher utilization of health services.


8. Interview with Ida Campbell, Manager, NIHB Program, MSB Ontario Region, October 1, 1998.

9. See note 5.

10. Interview with Debbie Tattrie, Manager Benefit Management, NIHB Program, Medical Services Branch Headquarters, October 18, 1998.

11. see note 8.

12. Ibid.


15. Interview with Abu Nazier, Director, Health Funding Arrangements, Medical Services Branch. September 24, 1998, Ottawa.


26. In particular, Ontario is interested in developing integrated health systems which are capitation based, and has recently announced four pilot projects in this area. British Columbia, Alberta, and Saskatchewan have joined with Ontario in researching the benefits of capitation and integrated health systems, including the formula for calculating capitation rates and governance authorities in such a system.

27. Interview with Ms. Rachel Cull, Director of Nursing, Weenebayko Hospital, November 5, 1998.

29. See note 27.

30. For example, there may be cross over between family and child services, and mental health workers both who may go into the home to provide counseling to a family. In some cases, even nurses will become involved in counseling.


33. Concerns have been summarized from the following reports published by the National Indian Health Board and posted on its web site: Southwest Regional Forum on Health Care, Scottsdale, Arizona, June 14-16, 1995; Minneapolis Regional Forum, Bloomington, Minnesota, May 31 - June 2, 1995; Aberdeen Regional Forum, Bismark, North Dakota, July 19 - 21, 1995.

34. National Indian Health Board. South and Eastern Forum on American Indian Health Care, Nashville, Tennessee, July 31 - August 2, 1995. (see note 28)

35. National Indian Health Board. (see note 28).


37. The federal government is proceeding with a five-year transitional approach to transfer of the NIHB program.


40. *Ibid*.

41. The 30% difference in acute and chronic hospital expenditures between Aboriginal people and Ontario residents is based on an analysis of 1991/92 expenditures by the Aboriginal Health Office, Ministry of Health, Toronto, Ontario.


45. As cited in the reference in note 44.


47. Information was obtained from the Research and Analysis Directorate, DIAND, and is based on an synopsis of one of the directorate’s research projects: *A First Nations Typology: Patterns of Socio-Economic Well-Being*.


49. Correspondence from Mr. Alan Rock, Minister of Health Canada, to Mr. Phil Fontaine, National Chief, Assembly of First Nations, June 17, 1998.

50. The 1997/98 provincial acute separation costs for the entire population were not available for this analysis, however a 1991/92 analysis by the Aboriginal Health Office of the Ontario Ministry of Health found that acute and chronic hospitalization for First Nations on reserve cost $553 per person, which was 32% less than the $808 seen in the rest of the population.

51. Descriptions of the services funded by the Aboriginal Healing and Wellness Strategy was obtained from its 1996/97 Annual Report.


