Comparing Health Status

Native peoples of Canada, Aborigines of Australia, and Maoris of New Zealand

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During the past three centuries, Canada, Australia, and New Zealand were colonized by European settlers who developed similar policies in dealing with the indigenous peoples of the lands they chose to possess. The indigenous peoples were essentially stripped of their cultures, religions, languages, and lands. Although significant improvements have been achieved in recent years, a gap still exists between the health status of indigenous peoples and the health status of the nonindigenous population in all three countries.

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*Indigenous is used throughout this article to refer to the earliest inhabitants of these lands and their descendants. Native is used to refer to the indigenous peoples of Canada, Aborigine to refer to the indigenous peoples of Australia, and Maori to refer to the indigenous peoples of New Zealand. Status Indians is used to refer to Natives registered with the federal government as Indians according to the terms of the Indian Act, non-Status Indians to refer to Natives not registered with the government, and Metis to refer to descendants of Natives and French settlers.

An historical perspective
To understand the health status of the indigenous peoples of these three countries, it is necessary to examine the historical significance of colonization and postcolonial administrative policies. Colonization resulted in the systematic destruction of indigenous peoples and the displacement of survivors. All indigenous groups experienced dispossession, deprivation, and demographic decline as a result of contact with European settlers.

Once colonies had been established in New Zealand and Canada, several treaties were signed between the British Crown and indigenous groups. These treaties were generally understood to mean that, in exchange for relinquishing rights to certain lands, indigenous peoples would be guaranteed rights to a variety of services, such as education and health care, as well as protection by the British Crown.

In 1840, the Treaty of Waitangi was signed with most of the Maori of New Zealand. Implicit within the treaty were the concepts of equity, partnership, and cultural security, all of which contribute significantly to “Hauora” – the Maori term for the spirit of life and health. Poor standards of Maori health could therefore be regarded as the failure to fulfill treaty obligations.

In Canada, several treaties were signed with the various First Nations; however,
Figure 1. AGE COMPOSITION OF INDIGENOUS AND NONINDIGENOUS POPULATIONS IN 1986:
A) Canadian Native and non-Native, B) New Zealand Maori and non-Maori, C) Australian Aboriginal and non-Aboriginal.
Data from Statistics Canada,² Pomare and de Boer,² and Thomson.²
only Treaty No. 6, which was signed with the Crees (who reside in central Alberta and Saskatchewan), contained any specific provisions for health services. This treaty contained "medicine chest" and "pestilence" clauses, which stated that, in the event that the Crees were overtaken by pestilence or famine, the Queen would offer assistance to relieve them from the calamity that had befallen them. No other mention of health services was made in the final text of any subsequent treaty, even though appeals were made to the treaty commissioners by Canada’s Native peoples for the provision of such services.

Much controversy has ensued about the exact interpretation of the medicine chest clause. Did it mean that the Canadian government was responsible for the provision of free medication only or were a whole range of medical services, up to and including hospital care, supposed to be provided free of charge? Universal hospital and medical care insurance were introduced in Canada in the 1960s, and with the release of its new Indian Health Policy in 1979, the Canadian government formally declared that health services for the Native peoples of Canada were part of the Canadian health care system and encouraged Native peoples to participate in it fully. The new policy also stated that professional medical and dental judgment would be relied upon when determining whether or not the cost of certain uninsured health benefits (eg, drugs, eyeglasses, dental care) would be covered for registered Native people.

Unlike the situation in Canada and New Zealand, no formal treaty was signed with the Aborigines of Australia, and several hypotheses have been formulated to explain this. In both Australia and New Zealand, the colonizing forces were ethnically the same, but contact with these forces came later in New Zealand when humanitarian influences from England had a stronger effect on the British settlers. This could explain why the Treaty of Waitangi was signed with the Maoris of New Zealand, while no such treaty was signed with the Aborigines of Australia. Furthermore, the Aborigines were culturally more alien to the British settlers than the Maoris and were therefore less favorably regarded by them. Perhaps more importantly, however, is the fact that the tribe-level social structure of the Aborigines made them less able to resist European domination and exploitation. In New Zealand large-scale organized warfare forced the British settlers to sign treaties with the indigenous people.

The Treaty of Waitangi was ultimately not honored by the settlers who formed their own government and distanced themselves from their treaty obligations. The Maoris had the perception that, when the British Crown transferred power to the colonial governments, treaty obligations were also passed on. The settlers, however, did not perceive these obligations in the same light. The same neglect of treaty obligations was experienced by the Native peoples of Canada, but the situation has improved considerably with the passage of time.

Although the treaties were initially ignored by the governments of Canada and New Zealand, their existence has provided a legal basis for indigenous peoples’ land claims, the provision of universal health care, and the right to self-determination. Moral persuasion, the principles of social justice, and a worldwide consciousness-raising movement to recognize the rights of indigenous peoples have also helped to justify the provision of services, such as health care, for the indigenous inhabitants of all three countries.  

**Demography**

The demographic structures of the indigenous populations of Canada, Australia, and New Zealand share several similarities, the only notable difference being the size of each of the three indigenous groups taken as a proportion of the total population of its respective country. Native peoples of Canada (Status Indians, non–Status Indians, and Métis) make up approximately 4.0% of the total Canadian population, whereas Status Indians, who fit within the policy and program structures of the Department of Indian Affairs, represented approximately 1.5% of the total Canadian population in 1986. Similarly, in Australia, Aborigines made up approximately 1.4% of the total population in 1986. However, the situation in New Zealand is quite different; according to the 1986 census, Maoris represented 12.5% of the total population.
higher visibility in the general population as well as their early representation in the New Zealand parliament, the Maoris have been able to wield considerably more political influence in recent years than have the Aborigines of Australia or the Native peoples of Canada.

As illustrated in Figure 1,2,9 the indigenous populations of all three countries have population pyramids that resemble those found in developing countries, in that most of the population is young. As of 1986, approximately 75% of the Native peoples of Canada were younger than 35 years of age compared with 56.5% of the non-Native population.7 Similarly, in New Zealand, 77.2% of the Maoris were younger than 35 years of age versus 5.8% of the non-Maori population. As well, 77.8% of the Aborigines of Australia were younger than 35 years of age compared with 55.8% of the non-Aboriginal population. In all three countries, indigenous people older than 65 years of age comprised less than 5% of the population (ie, 4.4%, 2.4%, and 2.0% in Canada, Australia, and New Zealand, respectively) as opposed to approximately 11% of the nonindigenous population (ie, 11.0%, 11.6%, and 11.2%, respectively).

In general, the indigenous populations of all three countries have experienced a decline in fertility rates during the past three decades, perhaps as a result of the introduction of birth control methods. Their fertility rates, however, are still higher than those observed in the nonindigenous population. In Canada, the fertility rate for Natives is about twice that of the non-Native population.7 In Australia and New Zealand, the rate is approximately 1.5 times and 1.2 times as large, respectively.2,10 The highest fertility rates are found in women younger than 25 years of age, which is a pattern present in most developing countries.

In 1986, only 32.5% of registered Native bands in Canada were located in or around urban areas. A similar picture exists in Australia, where most of the Aborigines of Australia live in rural and remote areas. In New Zealand, however, there has been a dramatic shift of the Maori population from rural to urban areas. As of 1986, 80.7% of the Maoris lived in an urban setting; hence the geographical isolation that has impeded Maori access to health care services has, for the most part, been eliminated. Cultural barriers still exist, however, and must also be removed.

Mortality

As illustrated in Table 1, the life expectancy at birth for the indigenous peoples in the three countries is 4 to 10 years less than that of the nonindigenous population.7,8,11 Relatively speaking, the gap in life expectancy between the Maoris and the rest of the New Zealand population is narrower than that found between the indigenous peoples and the nonindigenous population of Canada and Australia. It is apparent that indigenous infant mortality rates are 1.4 to 4.0 times higher than rates observed in the nonindigenous population (Table 2,11).8 The Maoris of New Zealand again have the lowest infant mortality rates of the three indigenous groups, with the Aborigines of Australia having by far the highest.

The more favorable life expectancy and infant mortality rates observed in the Maoris are perhaps due to several factors that make the task of improving the health of indigenous populations easier in New Zealand than in Canada and Australia. In New Zealand, the indigenous population speaks only one language and consists of only one culture; the New Zealand government is unitary rather than federal; one treaty applies to all lands rather than a patchwork of treaties or nontreaty areas; there are no reservations in which the indigenous population lives; the indigenous population is highly urbanized; there is a larger proportion and a greater visibility of Maori in the population generally; and the Maori have greater political representation and greater influence at the national level.11

Table 1. LIFE EXPECTANCY AT BIRTH AS OF 1986

<table>
<thead>
<tr>
<th></th>
<th>Canada</th>
<th>Australia</th>
<th>New Zealand</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Total Population</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Men</td>
<td>76.3</td>
<td>73.0</td>
<td>71.2</td>
</tr>
<tr>
<td>Women</td>
<td>80.2</td>
<td>79.0</td>
<td>77.1</td>
</tr>
<tr>
<td><strong>Indigenous Population</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Men</td>
<td>63.8</td>
<td>52.4-60.8</td>
<td>67.4</td>
</tr>
<tr>
<td>Women</td>
<td>71.0</td>
<td>57.8-65.1</td>
<td>71.3</td>
</tr>
</tbody>
</table>

- Australian indigenous population data are usually presented by region. Data from Mus1, Thomson3, and Brunton.11
The age-standardized mortality rates range from about 1.3 times (New Zealand) to 4.0 times (Australia) the rates observed in the nonindigenous population.\textsuperscript{2,13} Diseases of the circulatory system are the leading cause of death for the Native peoples of Canada and for the Maoris of New Zealand, while infectious and parasitic diseases predominate in the Aborigines of Australia (Table 3,\textsuperscript{11} and Figure 2,\textsuperscript{9}). The former observation is likely a reflection of the fact that, of the three indigenous groups, the Maoris and the Native peoples of Canada have been the ones most strongly influenced by the lifestyle and diet of nonindigenous groups, for whom circulatory diseases are also the leading cause of death. It is interesting to note that deaths due to accidents and violence are much more common to the Native peoples of Canada.

**Morbidity**

The morbidity patterns of the indigenous populations in all three countries are essentially a mixture of those observed in both developed and developing countries. In 1984, the leading causes of admission to hospital for the Maoris of New Zealand were complications of pregnancy, childbirth, and puerperium, injuries, poisoning, and diseases of the respiratory and gastrointestinal tracts.\textsuperscript{2} The same pattern of hospitalization was also observed in the Native peoples of Canada\textsuperscript{7} and the Aborigines of Australia.\textsuperscript{14} The indigenous peoples of Canada and New Zealand were almost twice as likely to be admitted to hospital than the nonindigenous population. In Australia, the Aborigines were admitted to hospital as much as three times more frequently than non-Aborigines.

The higher hospitalization rate among indigenous peoples does not mean that they have better access to hospital care. It means rather that indigenous peoples experience a much greater burden of illness than the nonindigenous population and are therefore more likely to require hospital care.

The use of hospital separation data to assess the burden of morbidity in a population tends to underestimate the true burden of illness because usually only severe cases require hospitalization. Although reliable data concerning illnesses not requiring hospitalization are not readily available for indigenous populations, it is generally accepted that diarrhea, chronic otitis media, dental caries, skin infections, and respiratory illnesses (such as tuberculosis and bronchitis), as well as sexually transmitted diseases (such as hepatitis B and gonorrhea) are prevalent in many indigenous communities. Hospital separation data would not necessarily capture this reality.

### Table 2. INFANT MORTALITY RATES PER 1000 LIVE BIRTHS AS OF 1986

<table>
<thead>
<tr>
<th>POPULATION</th>
<th>CANADA</th>
<th>AUSTRALIA\textsuperscript{3}</th>
<th>NEW ZEALAND</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total population</td>
<td>7.9</td>
<td>9.1</td>
<td>11.4</td>
</tr>
<tr>
<td>Indigenous population</td>
<td>17.5</td>
<td>18.2-35.5</td>
<td>15.4</td>
</tr>
</tbody>
</table>

\textsuperscript{3}Australian indigenous population data are usually presented by region. Data from Muir,\textsuperscript{7} Thomson,\textsuperscript{8} and Bruntin.\textsuperscript{11}

During the past two decades, several problems that have been more closely associated with the nonindigenous population have begun to emerge in indigenous communities. The most striking difference between indigenous and nonindigenous hospitalization rates has been in the areas of diabetes, obesity, cardiovascular disease, and hypertension.\textsuperscript{2,15} This is likely the result of the shift from the traditional lifestyle and diet of indigenous peoples to a more Western lifestyle and diet. Given the heavy burden of acute and chronic illnesses in most indigenous communities, it is not surprising to find that the age-specific disability rates for the Native people of Canada are about two to four times greater than those of non-Native people.\textsuperscript{16}

There has also been a notable increase in hospitalizations due to mental disorders, the major contributors being depression, affective psychoses, alcoholism, substance abuse, and family violence. In 1984, Maoris were 1.5 times more likely to be hospitalized for mental disorders than were non-Maoris.\textsuperscript{2} Similarly, in 1986, the Native peoples of Canada were about 1.7 times more likely to be hospitalized for mental illness.\textsuperscript{7} The situation is believed to be even worse in Australia, where requests for resources to address the mental health of indigenous peoples has always been assigned low priority.\textsuperscript{15}

There is a significant lack of culturally appropriate mental health services for
indigenous peoples in all three countries; however, this deficiency has been identified and is being addressed through such measures as the training of mental health workers who themselves are indigenous people and the promotion of traditional healing practices. Perhaps with greater involvement of indigenous people in the planning and delivery of their own health services, similar innovative initiatives will become even more widespread.

**Determinants of health**

The determinants of health, such as adequate housing, sewage treatment, garbage disposal, a clean supply of running water, employment, education, and transportation, are often lacking in the indigenous setting. A significant effort has been made in recent years to improve the living conditions of indigenous peoples. In some communities, water pumps have been installed to ensure a clean supply of running water and houses are being built according to specific standards. Substandard living conditions, however, are such a pervasive problem in many indigenous communities that the funds allocated for improved housing and other initiatives are often not sufficient to address this problem effectively.

Housing for a significant proportion of indigenous peoples lacks the basic amenities, particularly in Canada and Australia. In Australia, Aborigine housing has been linked to the poor state of Aborigine health. There is a substantial housing shortage, and the available housing is often substandard, lacking basic facilities (such as running water, sewage disposal, and electricity). Overcrowding is also a problem and increases the spread of communicable diseases. Similarly, in New Zealand, Maoris suffer from overcrowded, damp housing with inadequate amenities, even though 80% of the Maori population is urban. The housing situation for the Native peoples of Canada is just as deplorable. More than two thirds of the Native population live in remote or rural areas, where their communities lack basic services, such as indoor plumbing, central heating, running water, and sewage and garbage disposal. Urban Natives also suffer from substandard housing and, like the on-reserve population, they are generally in the lowest socio-economic groups. Given these substandard living conditions, it should not be surprising to find that infectious diseases still account for a significant burden of illness in most indigenous communities.

In Canada, Australia, and New Zealand, unemployment rates for indigenous peoples are two to three times the national average. As of 1986 in Australia, 17.1% of Aborigines were unemployed compared with only 5.5% of the non-Aborigine population. In New Zealand, 14.9% of the Maori labor force were unemployed compared with 5.8% of the non-Maori population. According to the federal Auditor General’s report for the 1985 fiscal year, 44% of Canada’s on-reserve Native population was receiving social assistance compared with 8% of all Canadians.
picture is unlikely to be any brighter for the off-reserve Native population. In addition to a high level of unemployment, school drop-out rates are also high, with as much as 65% of the indigenous population not having a high school diploma.2,15 The high unemployment rates have had a significant impact on the incidence of mental health problems, such as alcoholism, family violence, depression, and suicide.

Transportation, which is crucial for the provision of food and health care services, is inadequate in most indigenous communities. Because many communities are quite isolated, food prices tend to be very high, forcing a significant number of individuals to make unhealthy food choices. Food items rich in starch tend to be the most affordable. Wherever possible, indigenous communities should be encouraged to produce some of their own food and to return to a more traditional type of diet. In some communities, food co-operatives have been established, which have resulted in lower food prices and greater input by community members into the selection of food items that are to be sold by the co-operative. This is a positive initiative and should be encouraged in all indigenous communities, particularly those that are remote and isolated.

**Lifestyle factors**

As a result of colonization, the traditional lifestyle of indigenous peoples, particularly those living in or around urban areas, has undergone many changes and now more closely resembles that of the nonindigenous population. More specifically, activities like cigarette smoking, alcoholism, substance abuse, and the consumption of a more Western type of diet have become more prevalent in most indigenous communities during the past three decades.

The available data indicate that the prevalence of cigarette smoking among the indigenous groups of Canada, Australia, and New Zealand is about 60% to 70% compared with 30% in the nonindigenous population.2,15 Similarly, poor nutrition leading to obesity has also become a significant problem, with more than 40% of the indigenous population having a body mass index (BMI) greater than 30. With the loss of land and the right to hunt and fish, indigenous peoples have lost their traditional habit of food gathering, which has resulted in an increased reliance on government subsidies for day-to-day sustenance and the development of a sedentary lifestyle. They rely heavily on store-bought, starchy Western foods and have generally abandoned their own traditional diets. In addition to an increased incidence of obesity, there has also been a concomitant increase in the incidence of hypertension, diabetes, and cardiovascular diseases. While data on alcohol consumption and substance abuse are not readily available for the indigenous population, it is generally known that in many indigenous communities alcoholism and substance abuse (eg, gasoline sniffing) are quite prevalent.2,15

**Health care services**

The health care systems are distinctly different in all three countries; however, they do share several similarities, perhaps the most important being, from an indigenous perspective, that there are not enough health care providers who are indigenous people. As well, the services provided are often culturally insensitive and are generally not under the control of the indigenous peoples. In several urban communities, however, positive steps have been taken in recent years to improve this situation. Health centers have been established where health and social services and traditional healing practices are integrated and services are provided in a culturally appropriate manner. The planning and delivery of services in these centers is under the control of the indigenous peoples, and these centers have proved to be successful. This concept of health centers for indigenous peoples should be promoted not only in urban centers with a large indigenous population but also in remote communities where such an approach could have a positive impact on health status.

Because many indigenous communities are remote, particularly in Canada and Australia and in some parts of New Zealand, many primary medical services are provided by health workers who are indigenous. Services taken for granted by the nonindigenous population are absent in many indigenous communities. These would include vital services developed specifically for the elderly, the disabled, and those with mental health problems.
In remote communities, it is difficult to attract individuals with advanced medical training; hence the role of indigenous workers is crucial in this setting. Although it might be ideal to increase the number of indigenous physicians, nurses, and allied professionals, this will likely not happen in the near future. Adequate funding should, therefore, be provided for the standardized training of indigenous health workers who will continue to be pivotal in indigenous health services delivery. As well, the recruitment of indigenous peoples into health-related training programs (eg, medicine, nursing, nutrition, physiotherapy) should also become a priority, as it has in several universities in all three countries.

A more global approach to indigenous health care is required, in that much emphasis is currently being placed on ensuring an adequate supply of physicians, nurses, and medicines and not enough attention is being paid to other relevant issues, such as employment, sanitation, and the provision of adequate housing and a clean supply of running water. The multi-disciplinary approach to health care, practised in the indigenous health centers mentioned earlier, is one that should be encouraged in all indigenous settings be they urban, rural, or remote. Health is not merely the absence of disease but a state of complete physical, mental, spiritual, and social well-being. There needs to be much more involvement of indigenous peoples in the setting of priorities and the development and implementation of health care policies. Health to indigenous peoples is a matter of dignity, of community self-esteem, of justice, and of self-determination (including control over their physical environment). It is not merely a matter of the provision of physicians, hospitals, and medicines, or the absence of disease and incapacity.

The role of family physicians
What can family physicians do to improve the health status of indigenous peoples? At a personal level, if there are indigenous patients in their practices, physicians should learn to communicate effectively in a cross-cultural setting. They can do this by reading about cross-cultural issues and by insisting that these issues be included in medical and nursing school curricula. Many health care providers have a rather negative stereotypical image of indigenous peoples. In order to shed their preconceived notions, these providers should make an effort to gain experience in an indigenous setting, perhaps by doing a locum tenens in a remote indigenous community. This would expose them to the most com-
mon patterns of morbidity encountered in indigenous communities and allow them to deal with indigenous peoples on an individual basis, which would be an invaluable learning experience in cross-cultural communication.

Training programs for family physicians and undergraduate medical students have specific responsibilities to indigenous health. They should try to recruit indigenous trainees who could eventually provide health care services to their people, and in a more culturally appropriate manner than a nonindigenous physician might. This is already happening on a small scale in several universities. It would certainly be worthwhile to promote this initiative on a larger scale. Training programs should also provide information about the common patterns of morbidity and mortality found in indigenous communities and examine the social determinants of health in an indigenous setting.

In addition to the clinical aspects of medicine, training should also emphasize health promotion and disease prevention, with particular attention to such issues as immunization, prenatal care, nutritional counseling, hygiene, and the prevention of alcohol and substance abuse. At a more practical level, trainees should be exposed to settings where a significant proportion of the patient population comprises indigenous peoples. They should be provided with opportunities to work in remote indigenous communities in Canada and Australia and in the indigenous health centers of New Zealand. This could be either an elective or a required component of their training. Several universities, particularly in Canada and New Zealand, have established successful training programs that provide such an exposure. It is hoped that this will become more widespread.

Practical experience in an indigenous setting would enable students to appreciate that not all solutions to health problems lie in the health care sector and that collaboration with other sectors, such as housing, employment, and education, is necessary for the improvement of indigenous health. The students would also become more aware of the skills required to communicate in a cross-cultural setting. Some trainees might actually become motivated to practice in remote areas after graduation or to work for organizations that provide health care services to indigenous communities.

As a by-product of these practical training programs, family physicians might become more sensitive to the needs of indigenous peoples and could in turn pressure government officials to continue to implement healthy public policies in indigenous communities. For example, physicians could use preprinted postcards to notify their members of parliament of each case of a potentially preventable disease that was encountered in an indigenous individual and that was due to substandard living conditions. In other words, family physicians can play a vital role as advocates of indigenous health and the right to self-determination.

Where do we go from here?
The political will to reduce inequities and social injustices among indigenous peoples has been lacking until very recently in all three countries. For many years, there have been royal commissions, public inquiries, and task forces dealing with the deplorable conditions of indigenous peoples. While there has been much rhetoric, little action has actually been taken until now, when considerable media coverage has drawn the attention of the nonindigenous population to the plight of indigenous peoples. Several policy options have been proposed to address this plight.

The concept of a more global approach to indigenous health care, which would involve sectors other than health (e.g., housing, employment, education), has frequently been cited as being a necessary first step. The need for greater recruitment of indigenous peoples into health care professions has also been emphasized. In addition, public health measures, such as better housing, proper sewage and garbage disposal, and the provision of a clean supply of running water have been recognized and are gradually being implemented. While these activities might improve their health status, further gains will be achieved only when indigenous peoples obtain their right to self-determination and land claims are settled.

The future of indigenous health care will require significant changes to the current system. Indigenous peoples must obtain a more active and dominant role in the planning and delivery of health care services if further improvement in their health status
is to be achieved. Health cannot be imposed on a community but must develop in an acceptable manner from within, in response to problems perceived at a local level. In Canada, Australia, and New Zealand, policy decisions on indigenous health care are still made by, for the most part, nonindigenous individuals. This situation is fortunately changing in New Zealand, where the government recently established the Ministry of Maori Affairs, which will monitor the responsiveness of government departments in meeting Maori needs. It is expected that Maoris will now have greater input into health policy development through more visible representation on health boards and through the formation of Maori tribal councils, which help to determine the needs of Maoris. It will be interesting to see what impact this recent reorganization will have on the health status of Maoris.

In Canada and Australia, progressive steps such as those recently implemented in New Zealand are gradually gaining acceptance. The Canadian government is currently reviewing elements of the Canadian Constitution, and it is hoped that at the end of this process, the right of the Native peoples of Canada to self-determination will finally be recognized. In April 1986, an initiative was introduced by the Canadian government allowing certain indigenous communities to enter a negotiation process that could result in the transfer of the control of health programs to these communities. This Health Program Transfer initiative is viewed by many to be a definite step in the right direction, but it does not address such crucial issues as indigenous land claims and the right to self-determination. Similarly, in Australia in December 1987, the National Aboriginal Health Strategy Working Party was established to develop strategies for achieving improvements in the health status of the Aborigines in the short- and long-term. Strategies were also to be developed to maximize the involvement of Aborigines in their own health care. The report of the Working Party was submitted in March 1989, and it is hoped that significant policy changes will be implemented in the near future. It is quite clear that the indigenous peoples of all three countries desire a new system of health care that is more responsive to their own needs and that will be administered by them. Indigenous peoples must be able to determine their own health needs and priorities and must also be the ultimate deliverers of their own services.

At a more political level, the issue of indigenous land claims needs to be settled in order to provide an economic base with which indigenous peoples can regain their self-esteem and independence. There needs to be a definite shift from dependent, government-subsidized indigenous communities to more independent, self-sustaining communities.

During the process of colonization, European settlers systematically denounced, discouraged, demoralized, and displaced the indigenous peoples they encountered. This has resulted in a generation of individuals who are depressed, discouraged, and lacking in self-esteem. The right of indigenous peoples to maintain their own cultural heritage, religion, languages, and rituals, and to control their own destiny must be recognized. Self-determination is the vehicle through which indigenous peoples will be empowered to take control of factors that influence their physical, mental, spiritual, and social well-being, while negotiating the constitutional changes necessary for governments to recognize their inherent right to control their own destiny. The role of family physicians at this level is that of advocacy, and it is hoped that more and more physicians will participate.

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References


**Anaprox® DS 550 mg**

(naproxen sodium)

**Indications:**
Relief of mild to moderately severe pain, accompanied by inflammation such as muscular-skeletal trauma, post-dental extraction, relief of post-partum cramping and dysmenorrhea.

**Contraindications:**
Anaprox and Anaprox DS (naproxen sodium) are contraindicated in patients with active ulcers or active inflammatory diseases of the gastrointestinal tract. They are also contraindicated in patients who have shown hypersensitivity to it or to naproxen. Since cross-sensitivity has been demonstrated, Anaprox or Anaprox DS should not be given to patients in whom ASA or other non-steroidal anti-inflammatory drugs induce the syndrome of asthma, rhinitis, or urticaria. Sometimes severe and occasionally fatal anaphylactic reactions have occurred in such individuals.

**Warnings:**
Pepitic ulceration, perforation and gastrointestinal bleeding, sometimes severe and occasionally fatal, have been reported during therapy with non-steroidal anti-inflammatory drugs. NSAID is including Anaprox and Anaprox DS. Anaprox and Anaprox DS should be given under close medical supervision to patients prone to gastrointestinal tract irritation particularly those with a history of peptic ulcer, diverticulosis or other inflammatory diseases of the gastrointestinal tract.

Patients taking any NSAID including this drug should be instructed to contact a physician immediately if they experience symptoms or signs suggestive of peptic ulceration or gastrointestinal bleeding. These reactions can occur without warning at any time during the treatment. Elderly, frail and debilitated patients appear to be at higher risk from a variety of adverse reactions from NSAIDs. For such patients, consideration should be given to a starting dose lower than usual. The safety of Anaprox and Anaprox DS in pregnancy and lactation has not been established and its use is therefore not recommended.

**Precautions:**
Anaprox or Anaprox DS (naproxen sodium) should not be used concomitantly with the related drug Naprosyn® (naproxen) since they circulate in plasma as the naproxen anion.

**G.I. system:** If peptic ulceration is suspected or confirmed, or if gastrointestinal bleeding or perforation occurs Anaprox or Anaprox DS should be discontinued, and appropriate treatment instituted. **Renal effects:** Patients with impaired renal function, extracellular volume depletion, sodium restrictions, heart failure, liver dysfunction, those taking diuretics, and the elderly, are at greater risk of developing overt renal decompensation. Assessment of renal function in these patients before and during therapy is recommended. Naproxen sodium and its metabolites are eliminated primarily by the kidneys, and therefore, a reduction in daily dosage should be anticipated to avoid the possibility of drug accumulation in patients with significantly impaired renal function. Naproxen sodium should not be used chronically in patients having baseline creatinine clearance less than 20 ml/minute.

Peripheral edema has been observed, consequently, patients with compromised cardiac function should be kept under observation when taking Anaprox or Anaprox DS. Each tablet contains approximately 25 mg of sodium and each Anaprox DS tablet contains approximately 50 mg of sodium. This should be considered in patients whose overall intake of sodium must be markedly restricted. As with other drugs used in the elderly or those with impaired liver function it is prudent to use the lowest effective dose. Severe hepatic reactions including jaundice and cases of fatal hepatitis have been reported with NSAIDs. The prescriber should be alerted to the fact that the anti-inflammatory, analgesic and antipyretic effects of Anaprox or Anaprox DS (naproxen sodium) may mask the usual signs of infection. Periodic liver function tests and ophthalmic studies are recommended for patients on chronic therapy. Caution should be exercised by patients whose activities require alertness if they experience drowsiness, dizziness, vertigo or depression during therapy with the drug. The naproxen anion may displace other albumin-bound drugs from their binding sites and may lead to drug interactions or interfere with certain laboratory tests. See product monograph for specific examples. The safety and efficacy of this drug in children has not been established and its use in children is therefore not recommended.

**Adverse reactions:**
Adverse reactions which occur in >1% of patients include:
- **G.I.:** Heartburn, constipation, abdominal pain, nausea, diarrhea, dyspepsia, stomatitis and diverticulitis.
- **CNS:** Headache, dizziness, drowsiness, light-headedness, vertigo, depression and fatigue.
- **Skin:** Pruitus, ecchymoses, skin eruptions, sweating and purpura.
- **CVS:** Dyspnea, peripheral edema and palpitations.

**Special Senses:** Tinnitus and hearing disturbances.

Others: thirst.

For additional adverse reactions please refer to the product monograph.

**Availability:**
Anaprox® DS is available in OVAL-SHAPED, BLUE film-coated tablets of 275 mg in bottles of 100, 500 and 1000 tablets.

**Dosage:**
Anaprox® DS is available in OVAL-SHAPED, BLUE film-coated tablets of 550 mg in bottles of 100 tablets.

**Contact**
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