### STATE OF KNOWLEDGE - WHAT IS HAPPENING?

A very brief overview of the state of knowledge with respect to Human Health and Community Wellness in the Mackenzie Valley is presented below. This overview is preliminary. It is not intended to be exhaustive.

Data is currently collected for more than 60 measures by various agencies and/or monitoring programs in the NWT.

Most of the data gathered is statistical information focused on human health indicators, including some looking at broader factors contributing to individuals' state of health. Most of the data is collected through government agencies, for monitoring and identifying demographic and other population and social trends.

A few community wellness monitoring programs have been initiated recently in the Mackenzie Valley. One of these is a community based research and monitoring program (initiated by the community of Lutsel K'e) looking at broader issues of community wellness, as opposed to individual health statistics. Two others (lead by BHP Diamonds Inc and Diavik Diamond Mines Inc) focus on a selected number of health indicators to assess overall community wellness. No baseline data has been determined for these monitoring programs.

The GNWT Department of Health and Social Services is currently engaged in a process to develop a framework and a comprehensive list of indicators that will be used to monitor population health and well being. This framework is expected to be completed in the next 12 – 18 months.

At the present, however, there is no common approach to measuring human health and community wellness in the NWT. Much of the data currently collected is not easily linked in any cause and effect

#### KEY MONITORING INDICATORS

#### TO BE DETERMINED

manner. Measures are influenced by the actions and choices of individuals. Therefore, the patterns can change over time as a result of various program interventions (which may not be long lived) and by shifting societal norms and individual choices. This makes prediction and, more importantly, evaluation, of human health and community wellness problematic.

A number of monitoring challenges have been identified for determining Human Health and Community Wellness VECs under the MVCIMP. These include:

- Developing a conceptual framework and acceptable approach to researching, monitoring and reporting on human health and community wellness in the NWT;
- Identifying ways to deal with the lack of baseline data, in particular for data on community wellness;
- Dealing with inconsistencies in definitions of various human health indicators, as well as variance among agencies in terms of what is collected and how the data is interpreted;
- Accurately measuring data that may be affected by population mobility between communities within the NWT;
- Aggregating several indicators into fewer, useful measurements;
- Dealing with issues of confidentiality, in particular in the smaller communities of the NWT, and in terms of sharing information between organizations, agencies, and other interested parties;
- Dealing with annual variability in certain data, which may be reflected disproportionately in the smaller communities;
- Managing discrepancies between statistical results of e.g. a human health indicator, and the *perceptions* among a population of the particular health issue;

 Determining the monitoring scope, in terms of the breadth and/or depth of data collection.

In addition, it is important to be aware that in order to determine whether or not an observed trend is considered to be having an effect – either positive or negative – it is necessary to have a set of goals against which to assess the trends. Goal statements need to be described by and for the communities and their residents. Some of these goals may conflict with one another.

By way of example, if increased financial stability through wage economic activity were one goal, a decrease in the numbers of employed would be seen as negative. If another goal were the preservation of traditional activities, increased practice of traditional activities such as hunting, fishing and trapping would be seen as positive. However, if the increased traditional activity is due to decreased wage employment, are the observed trends considered together assessed as positive or negative? How does one decide?

The challenges described above are made particularly complex given the socio-economic and cultural context of the Mackenzie Valley, in particular:

- Cultural diversity and traditional knowledge issues, brining a range of different values and perceptions to the question of what constitutes human health and community wellness
- Rapid economic development, leading to rapid social, economic, and cultural changes.

Many of the indicators used to assess human health have different characteristics from the indicators used for community wellness. The human health indicators are largely individually focused; the community wellness indicators are collectively focused. Although the human health and community wellness indicators are partly connected, for the purposes of the contribution to the MVCIMP, there is good reason to separate them into two distinct categories.

### **CURRENT MONITORING**

A number of ongoing monitoring programs with respect to human health and community wellness in the Mackenzie Valley are identified below. This is an initial list only.

- ► Traditional Knowledge Study on Community Health: Community Based Monitoring (Lutsel K'e Dene First Nation, since 1997)
  Information was gathered from community members to aid in developing indicators of community health. Traditional knowledge from Dene elders was also gathered about past community health. The information is being used to monitor changes in community health as development in the Slave Geological Province moves forward. Data was gathered on indicators such as community perceptions of the effects of mining developments, incidences of cancer and tuberculosis, quality of community services, traditional food consumption, youth participation in the community, and youth goals for employment. This research is contributing to the West Kitkimeot Slave Study.
- ► BHP Diamonds Inc. Annual Report on Community Health and Well Being
  - A series of 14 socio-economic indicators are monitored for 9 communities potentially affected by the BHP Ekati diamond mine. An annual report has been published since 1999. Beginning in 2000, information from public data sources is being supplemented by an employee survey.
- ► BHP Diamonds Inc. Archeological Site Investigations (since 1997)

Surveys of archeological sites with First nations members are part of the ongoing environmental monitoring program at the Ekati mine.

▶ Diavik Diamond Mines Inc. Socio-economic Monitoring The territorial government monitors a series of 18 socioeconomic indicators supplemented by an employee survey. Aboriginal governments report perceived impacts and effects separately. A multi-party Board will begin publishing a consolidated annual report in 2002.

Several agencies and organizations are involved in gathering information related to human health and community wellness. These are not monitoring programs, and are primarily set up by the Government of the Northwest Territories for administrative functions. Some are separate collections of data. Some of the information in the databases is confidential and cannot be released.

► Employment and unemployment estimates (Bureau of Statistics since 1984)

Community labour force surveys were conducted in 1984, 1989, 1994, and 1999, in conjunction with national censuses of 1981, 1986, 1991, and 1996. Trend information on employment (e.g. hours worked, industry, occupation) is provided. For those not working, information on type of work wanted and training requirements are collected. Data may be tabulated by age, gender, ethnic group and education levels.

▶ NWT Health Status Report 1999 (NWT Department of Health and Social Services, Population Health Division)

The NWT Health Status Report 1999 examines major determinants of health in the NWT, such as education, employment, income and housing. It is the first comprehensive report on health status in the NWT since 1990.

Beaufort Region Cumulative Monitoring Indicator Catalogue (Energy, Mines and Resources Secretariat, 1986) The catalogue is a comprehensive listing of various indicators by which to measure cumulative impacts of resource development. A number of these are of potential relevance to human health and community wellness.

► NWT family violence data base (Department of Health and Social Services since 1987)

Trends in shelter use in the Northwest Territories, as well as experience and characteristics of women using shelters, are tracked in this database. Data collected includes martial status, age range, with or without children, children's ages, ethnic origin, language spoken, reason for admission, departure plans, referred from where, reason for admission if the client is from another region, admittance community, women's support group, community awareness-raising events, and crisis line.

► NWT suicide database (NWT Department of Health and Social Services)

Suicide deaths in the NWT are recorded in this database. Parameters noted are date of birth, death, age at suicide, name, gender, community, method of suicide, family, work situation, ethnicity, and marital status.

- ► NWT crime and justice estimates (NWT Bureau of Statistics)

  Police reported crimes and offences cleared by charge are
  available by the type of crime. Aggregate community crime
  statistics are currently being developed. (These statistics
  are primarily generated from an RCMP database.)
- National Population Health Survey (NWT Bureau of Statistics/ Statistics Canada)

The National Population Health Survey (NPHS) and the National Longitudinal Survey of Children and Youth (NLSCY) are two major Canadian surveys completed by Statistics

Canada that began in 1994/95. The National Population Health Survey is the first national longitudinal survey on the health of Canadians and will collect health information over a 20-year period for selected individuals, including from the NWT. Information from the survey includes: general health, preventative health practices and health care utilization; chronic conditions, injuries and restriction on activities; tobacco, alcohol and drug use; physical activities; mental health, sense of coherence and social support; age, sex, income and employment.

#### GAPS AND RECOMMENDATIONS FOR MONITORING

At this initial stage of the process, gaps – in terms of research needed to monitor or measure VECs – cannot be determined, since the VECs have not been identified. Before gaps can be identified, some preliminary issues must be clarified. Three issues are described below. Recommendations for a process to manage these issues are also proposed below.

### Gaps

- ❖ Is the purpose of the MVCIMP simply to monitor change, or are there specifically identified goals that we are trying to achieve?
- Need to understand the scope and parameters of the data to be collected.
- Need to re-structure the approach so that human health and community wellness indicators are separated. This will permit the relevant parties to more effectively identify key indicators.

#### Recommendations

- Separate Human Health and Community Wellness. Establish two distinct sub-committees to focus on separate substantive areas for monitoring within the MVCIMP.
- Implement a work plan that works toward identification of key indicators (at least conceptually) within each area: Human Health and Community Wellness.
- Once each sub-committee identifies their key indicator, have a joint meeting to identify overlaps, if any, to ensure efficiency and effectiveness of subsequent data gathering.

### REFERENCES

Relevant monitoring reports, past monitoring programs, research documents, and scientific publications are found below.

BHP Diamonds Inc (2000). **Annual Report on Community Health and Well Being.** 

BHP Diamonds Inc. (since 1997). **Archeological Site Investigations.** 

INAC. Nunavut General Monitoring Program (<a href="http://npc.nunavut.ca/eng/monitor/eng/home.htm">http://npc.nunavut.ca/eng/monitor/eng/home.htm</a>).

International Institute for Sustainable Development. **Measurements** and Indicators for Sustainable Development (<a href="http://iisd1.iisd.ca/measure/faqcriteria.htm">http://iisd1.iisd.ca/measure/faqcriteria.htm</a>).

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