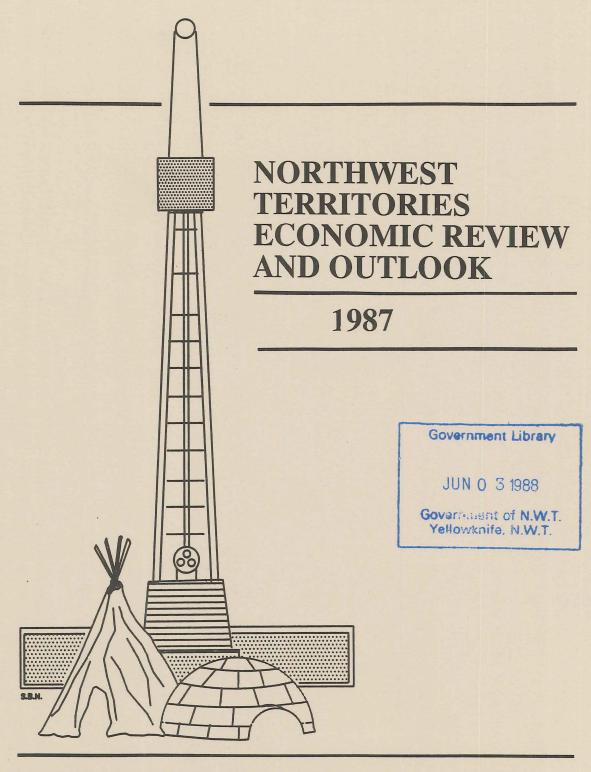
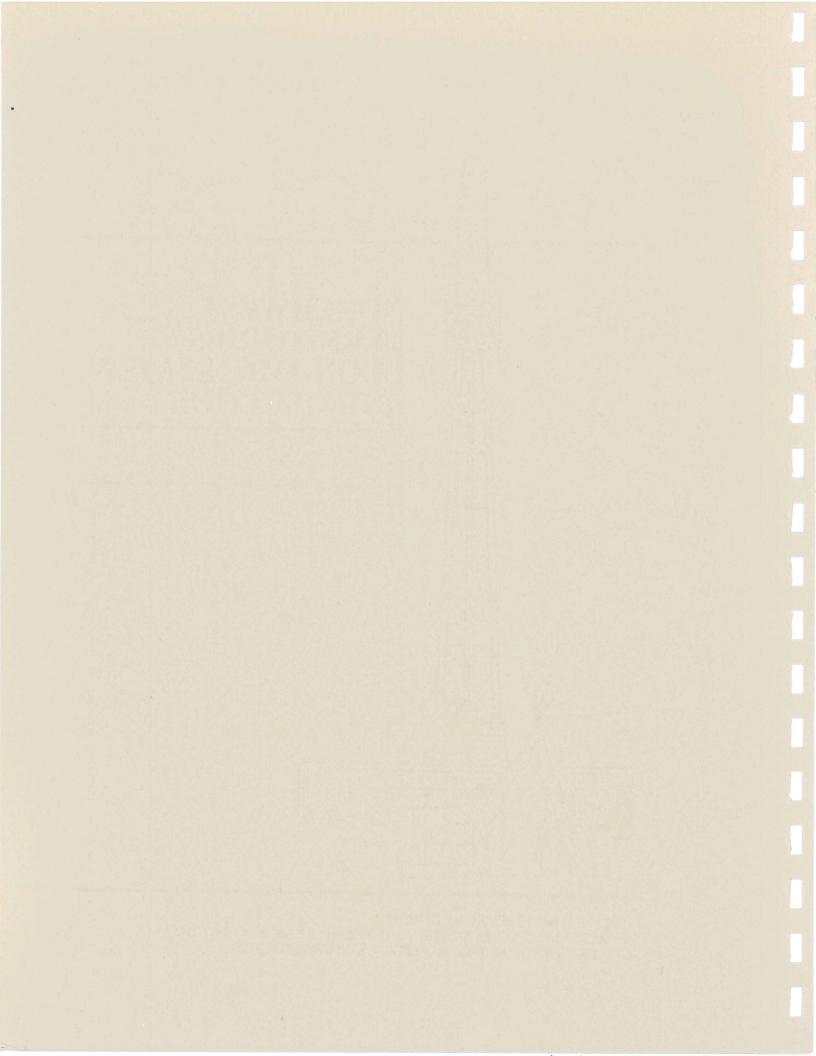
MAR 20 1987



POLICY AND PLANNING DIVISION
DEPARTMENT OF ECONOMIC DEVELOPMENT AND TOURISM
GOVERNMENT OF THE NORTHWEST TERRITORIES

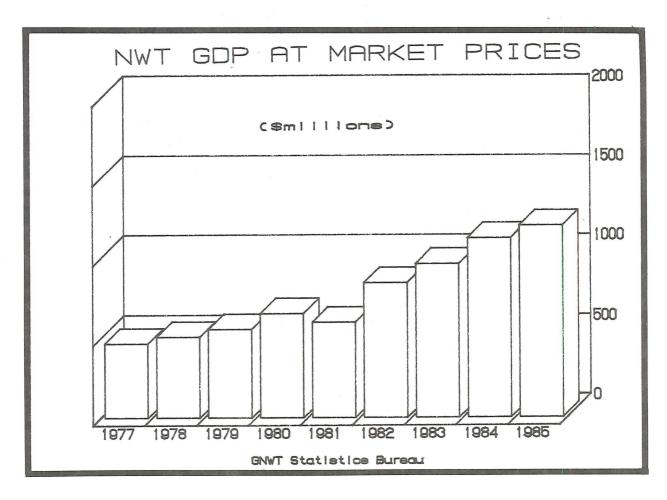


# INTRODUCTION

Territorial Gross Domestic Product grew tremendously in 15 years prior to 1985, from about \$130in 1970 to an estimated million \$1.1-billion in 1985. While most of country suffered recession in the early eighties, territorial continued to post real gains. In 1982, for example, territorial salaries and supplementary income climbed by 22%, from \$425 million to \$519 million, far surpassing the Canadian rate of 7%.

However much of that growth occurred only recently, between 1981 and 1984, as a result of some large and extraordinary expenditures, including those related to construction of the Norman Wells pipeline and the Polaris Mine at Little Cornwallis Island, and as a result of the multimillion Petroleum Incentive Program (PIP), which pumped \$400-500 million annually into the territorial economy between 1981 and 1984. Viewed over a longer time, the NWT economy exhibited a more steady rate of growth, with reported total personal income increasing by 136%, from \$225 million to \$530 million, between 1977 and 1984—i.e. at an annual average rate of 13%, roughly paralleling the Canadian experience for the same period.

Nor did the recent boom in activity affect everyone equally. Beginning in 1982, many of the smaller com-



# APPROXIMATE EXPORT & IMPORT REPLACEMENT VALUES BY SECTOR (\$million, 1984-85)

Fur	3.3
Commercial Fishing	1.7
Forestry (1)	1.0
Other Renewable (2)	45.0
Arts & Crafts	6.0
Tourism	44.0
Subtotal Non-Industrial	<u>101.0</u>
Mining	600.0
Oil & Gas	220.0
Subtotal Industrial	800.0
Total	921.0

- (1) Import Replacements (products which would otherwise have to be imported).
- (2) See related chart under Renewable Resources on page 18.

munities fell victim to anti-trapping and sealing campaigns. In the Eastern Arctic, especially, a number of local hunting economies experienced severe recession. More recently, slumping for base metals began eroding profitablity of several 1984, net mining revenues mines. In 48% over 1983, and net increased by profits rose from \$18 million to in 1985 revenues \$54 million, but fell by 19%, and the industry as a whole suffered a net loss. December of 1985 dealt the final blow, as the world oil prices suddenly dropped from \$US32 to \$US10 a barrel.

Although figures are not yet available to precisely measure the damage, 1986 was definitely one of the worst years on record for territorial industries. In the Beaufort, Dome, Esso and Gulf had finished the exploratory drilling required by their leases and had mothballed their rigs by the end of the year. Meanwhile the Canadian Armed Forces had moved all of its staff out of Inuvik. In the southwest, Canada Tungsten Mines closed its operations in mid-year, while Pine Point cut back production prior to an announcement early this year that it would stop mining in mid-1987. In the East, the

Nanisivik and Polaris lead-zinc mines were also feeling the pinch of depressed prices, and the market for sealskins was virtually non-existent.

Fortunately the economy appears to be headed for better times, at least in some parts of the Territories. and its partners have indicated a desire to resume drilling the rich Amauligak field, pending successful negotiations with the federal government. Esso is at least examining the possibility of resurrecting plans for a pipeline down the Mackenzie Valley. Chevron is negotiating with the community of Fort Good Hope on a \$41 million seismic plan. bility work is proceeding on a scheme that could see Panarctic supply crude oil to High Arctic communities through a newly-formed Inuit development corporation. Prices for many furs are on the rise, and, though Giant's Salmita mine will probably there are several potential close, active considernew mines under ation.

### BACKGROUND

The Northwest Territories covers an area of 3.3 million square kilometers and constitutes roughly one—third of Canada's land mass. With the exception of a few islands in Hudson Bay, the entire territory is located above the 60th parallel, and most is above the Arctic Circle, a location which poses some severe economic constraints, including distance from prime North American markets, small, scattered populations, longer winters, higher utility and other business costs.

Overall, the economy is poorly integrated; linkages among industries are weak and diversification has been largely limited to the development of service businesses which depend on government, primarily, as well as large industry. Apart from minerals and hydrocarbons, very little is exported from the NWT. Mineral concentrates and ores are exported for further processing to southern Canada and Europe, and manufacturing is confined for the most part to "cottage" industries producing artistic goods for small local markets and limited export.

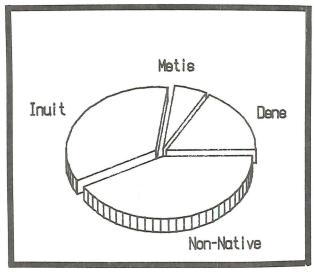
At first glance, the Northwest Territories would appear to comparatively well off. Average personal income was \$25,000 in 1984, or about 4% greater than the Canadian average. But then the of living in the NWT is approximately higher than it is in southern Moreover a look at the distribution of that income reveals considerable imbalance across the Territories. At \$26,700 in the Fort Smith Region, it was 35% higher than the Keewatin Region it was in (\$19,700); and Yellowknife alone, with an average of \$28,300 and only 20% of total population, accounted for

36% of total personal income. In general, the top 30% of the population earned more than half the total income.

Thus the NWT economy is best seen as two quite distinct economies: Most of the non-native population live in major centers whose economies are dominated by government and/or resource-extraction activities. Average incomes are typically very high, unemployment very low and future prospects relatively bright.

Conversely, most of the 29,500 people of Inuit, Dene or Metis ancestry (almost 60% of the total population) live in small, widely scattered villages, where traditional harvesting activities dominate a fragile economic base and where there are few prospects for growth. Average incomes are generally low, unemployment high and social assistance a fact of everyday life.

Unemployment reaches 50% in some of these communities and can no longer be readily dismissed as a native preference for traditional, non-wage pursuits. Hunting, fishing and trapping



suits. Hunting, fishing and trapping as a full-time occupation is no longer the preferred option for most native young people -- who are fast comprising the majority of the population -- if only because they can't earn sufficient income to purchase the material goods the modern economy provides.

# Community Infrastructure

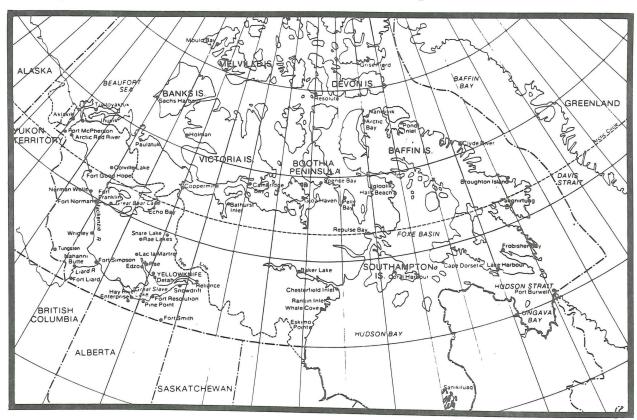
There are five major centers in the NWT with populations exceeding 2000: the City of Yellowknife and the Towns of Fort Smith, Hay River (all in the Fort Smith Region), Iqaluit (in the Baffin Region) and Inuvik. Yellowknife is the capital and by far the largest center, with a population of 11,000, or 22% of the NWT population. The balance -- comprising more than half the population -- lives in isolated communities whose populations rarely exceed 1000 and typically between 300 and 800.

The major centers enjoy municipal infrastructures and services that are on a par with small communities in

southern Canada; those in the smaller communities, while steadily improving, are still generally limited and rudimentary, with, typically, a Co-op and/or Bay general store, a small hotel/restaurant and a diesel generator. Virtually all communities have modern satellite telephone services, CBC radio and a variety of television services. Most provide education facilities for kindergarten to Grades 7, 9 or 10; Yellowknife, Iqaluit, Inuvik, Fort Smith, Hay River and Pine Point have complete high schools, i.e. up to Grade 12.

Most housing in the NWT is government owned and maintained, but recent government incentive programs have had considerable success in promoting broader home ownership.

Yellowknife and other communities around Great Slave Iake are linked to one another and southern Canada by the Mackenzie and Liard Highways. Inuvik and other communities in the Delta are similarly linked by the Dempster Highway. With the exception of a few winter ice roads, the rest of the NWT is serviced by air and, in summer, by water transport.

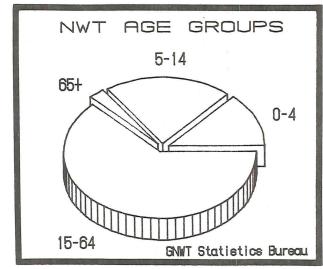


# Population

The NWT's 51,000 residents are unevenly distributed among five GNWT administrative regions (see chart below).

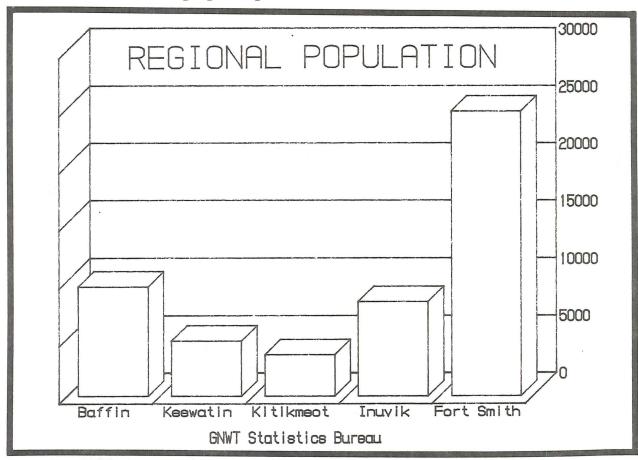
NWT population growth has been and still is extraordinarily rapid. The growth rate among native people is 3% annually — about three times the national average. Total population is forecasted to grow at a compound annual rate of 1.9% to 57,000 by 1991, one important implication of which is that there will be 600 potential entrants to the labour force every year for the next decade. Net outmigration was 68 in 1985, but the total flow was a staggering 3,785 migrants in and 3,853 out.

Native people comprise about 58% of the total NWI population, which is 17% Dene, 6% Metis, 35% Inuit and 42% nonnative. However Inuit people represent



about 86% of the population in the Eastern and Central Arctic regions, whereas there is a slight native minority of Dene, Metis and Inuvialuit (Inuit) in the Western (Fort Smith and Inuvik) Regions.

Approximately 45% of the population are under 20 years of age, with only about 2% over 65.



## Labour Force

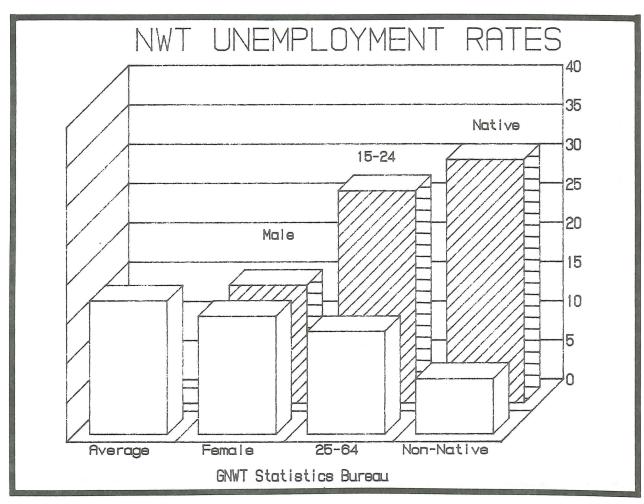
About 63% of total population, or 32,000 people, were of working age (15-64) at the beginning of 1985. Of these, 68%, or 21,300 people were in the labour force (i.e. either employed or unemployed and looking for work). Although 5700 people had worked at some time during the year, 3500 others wanting to work were unable to find yielding an average unemployment rate of 17% -- about seven points higher than the national average.

In addition there were 2600 "discouraged workers", i.e. people who wanted jobs but who saw no point in looking for work. Adjusting the average unemployment rate to include this "hidden unemployment" would yield an effective unemployment rate of 26%.

The native participation rate (54%) was much lower than that for non-natives (84%), and the native unemployment rate was more than four times higher than for non-natives: 31% versus 7% respectively.

Young people 15-24 years of age had a participation rate of 52%, compared to 76% for those 25-64, and youth unemployment was 27% -- 14 percentage points higher than the rate for those 25-64. The male participation rate was 76%, versus 60% for women, and women had a somewhat lower unemploymeant rate than men -- 15% versus 17%.

Although exact figures on seasonal unemployment are not available, the numbers of employees in most industries remain fairly constant throughout the year. The exceptions would be such obviously seasonal activities as tourism, commercial fishing and forestry.



# Education

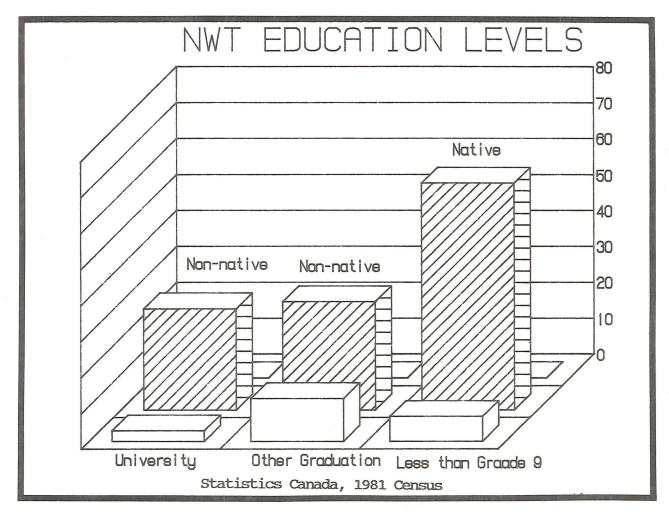
One of the main reasons for the high unemployment is the low level of education in the NWT, which is generally low by Canadian standards and particularly low among native residents. Of all residents over 15, 10,600, or 36%, have less than Grade 9 education -- 16 points higher than the equivalent Canadian percentage. Among native people the figure is 63%, and at the higher end of the scale, only 2% of people have attended university, compared with 28% of nonnatives.

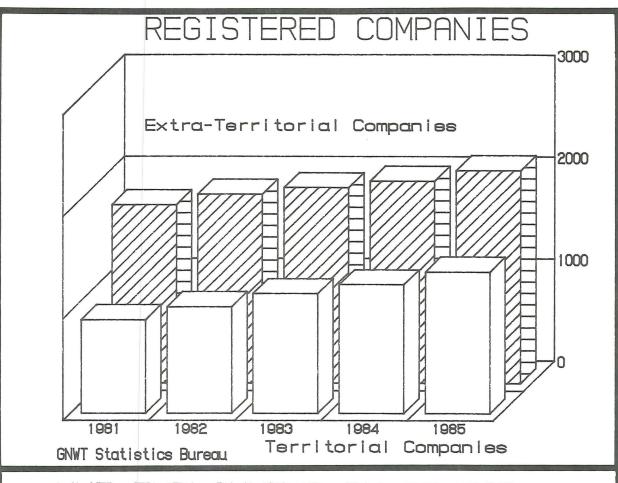
School attendance has picked up in recent years, but the drop-out and failure rates are still high, particularly among native people. Less than

40% of all students enrolled in Grade 10 actually graduate.

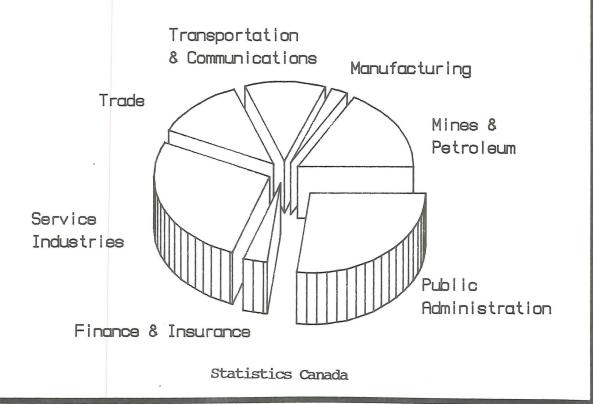
Grade 10 is crucial because it is the minimum requirement for entry into virtually all trades. Yet it is at this stage that most young people quit school because most are reluctant to leave their home communities to attend high schools in one of the major centers.

There are two NWT adult vocational training facilities — one in Fort Smith and one in Iqaluit — as well a third under development in Inuvik. There are adult educators in most communities, but demand already far exceeds the government's capacity to deliver needed training, and that demand is bound to increase with the predicted burgeoning labour force.





# NWT EMPLOYMENT BY SECTOR



# Income Levels

Income and employment in the public sector, traditionally the NWT's largest employer, has grown annually since 1979. In 1985 all levels of government (including municipal) paid more than 7000 people some \$247 million in wages and salaries — roughly 40% of the labour force and 40% of total NWT wages and salaries.

In the private sector, mines as a group, are the NWT's largest single private-sector employer, biggest exporter and biggest contributor to corporate profits. Mineral industry employment, wages and salaries have shown steady growth over the years, and with average wages over \$40,000,

miners are the NWT's highest-paid employee group. In 1985 mines paid some 2500 miners, including about 1659 permanent NWT residents, over \$100million in wages and salaries, accounting for 14% of territorial employment and 18% of wages and salar-In addition, the industry spent \$35 million, or about 13.6% of its total expenditures, on the purchase of NWT goods and services annually.

Oil and gas companies have also had considerable impact on territorial income in recent years, particularly in the Beaufort and Mackenzie Delta, where Dome Petroleum, Esso Resources and Gulf Oil paid about 1500 northern employees more than \$20 million in 1984, and at Norman Wells, where Esso and Interprovincial Pipelines paid northern workers \$33 million to com-

			Wagge Cale	ari og
	<b>Employees</b>	_%	Wages & Sala \$million	_%
Mining, Oil & Gas	3,000	16	125	23
Manufacturing	400	2	14	3
Transport & Communications	2,000	11	62	11
Trade	2,200	12	35	6
Finance & Insurance	600	3	14	3
Community, Business &				
Personal Service Industries	4,700	26	117	22
Public Administration	4,700	26	154	28
<u>Industrial Aggregate</u>	18,300	100	543	100

Note: Industrial Aggregate includes forestry and construction. Public Administration does not represent the actual number of government employees as some government-owned establishments are assigned to industries. Some people employed in the mining, oil & gas sector would be included under other sectors, and some NWT residents employed by these industries, but paid from Alberta, might not be included here. Moreover, total employees does not agree with the labour force figures above because of different collection methods.

Source: Statistics Canada, GNWT Bureau of Statistics (1985 est.)

plete a pipeline to Zama Lake, Alberta. In the High Arctic, Panarctic paid another 62 employees \$717,000 in 1984.

Individually, the retail trade, transport and communications, finance and insurance and other service businesses do not comprise a large component of total employment and wages, but combined as a slightly more than 50% of employment and 40% of wages and salaries. NWT retailers, in general, have fared well in the eighties, with sales growing by 87%, from \$131 million to \$245 million between 1979 and 1985.

construction association The NWT estimates that the total value of construction all territorial was about \$300 million in 1985 \$160 million for all levels of government, \$40 million for large industry and \$100 million for private contractors.

The total value of construction for tax-based municipalities alone rose by 65% from \$34 million in 1983 to \$56 million in 1984, more than half of which was generated by the private sector. Of the total, commercial and industrial expansion accounted for \$31 million or 55%, residential construction accounted for slightly more

struction accounted for slightly more than \$18 million or 32%, while institutional building contributed the balance.

In Inuvik, housing, airport terminal and road construction was valued at \$15.7 million in 1984. In Yellowknife, residential and industrial construction was valued at \$16 million -an almost 500% increase over the equivalent 1980 figure -- and in Iqaluit construction increased by from \$5.7 million to about \$18 mil-Residential construction alone lion. accounted for slightly more than \$4million in Igaluit, largely because of the dramatic rise in home ownership

The above income statistics mainly reflect relatively bullish economies in the prosperous government centers and single-industry resource towns, where business and investment activity has been climbing.

The situation in the smaller communities, to reiterate, is vastly different. With the exception of resident government employees and the few who commute to rotational shifts at industrial sites, the major sources of income are government transfer payments coupled with proportionately

# PUBLIC SECTOR EMPLOYMENT AND WAGES (No. in thousands; Payroll in \$millions)

	Fede No.	e <u>ral</u> Payroll	GNWI No.	Payroll	<u>Muni</u> No.	<u>cipal</u> Payroll	<u>Tota</u> No.	l Payroll
1980 1981 1982 1983 1984 1985	2.6 2.7 2.8 2.8 2.8 2.6	34.8 39.3 48.2 50.3 73.2 68.8	3.1 3.2 3.5 3.5 3.5 3.9	58.2 63.8 81.6 93.3 137.5 158.4	 .7 .8 .8	11.7 15.9 18.1 19.6	5.7 5.9 7.0 7.1 7.1	93.0 103.1 141.5 159.5 228.8 246.8

Source: GNWT Bureau of Statistics, Statistics Canada, 1985.

much less subsistence income and some cash from hunting, fishing and trapping, arts and crafts, etc.

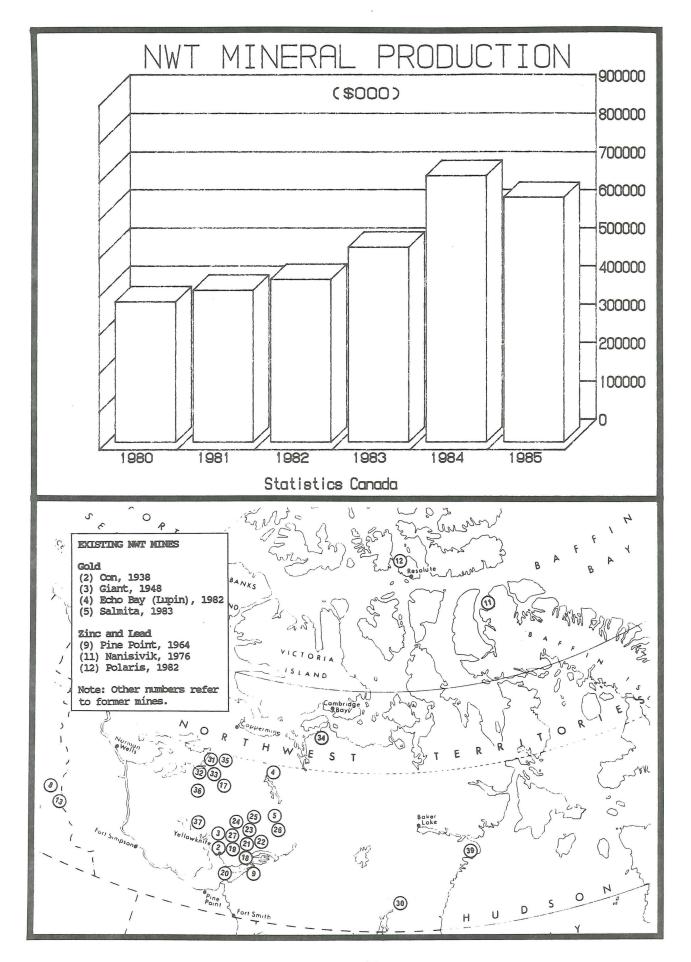
Given that the total gross value of those activities, (including an imputed monetary value for game), is an estimated \$50-60 million, it is not surprising that native people's average incomes are roughly half those of non-natives.

That situation appears to be changing, however, as regional and community native development corporations become increasingly involved in higher-revenue generating activities. The

Inuit Development Corporation, for example, has extensive real estate is involved in several holdings, businesses, including Atco-Equtak Drilling Limited, has shares in a number of diverse companies recently joined the Eastern Arctic Inuit's Nunasi Corporation in purchase of the Northern Transporta-Company Limited (NTCL). tion Metis and Denendeh Development Corpare active partners orations Shehtah Drilling, a joint venture with Esso. All of these activities are likely to generate much higher incomes than renewable resource harvesting can

GNWT	DEPARIMENTAL	EXPENDITURES		
(1984–85)				

	(\$,000) <u>O&amp;M</u>	(\$,000) <u>Capital</u>
Education	89,694	16,716
Public Works	83,384	16,359
Health	58,358	2,495
Local Government	36,656	26,937
NWT Housing Corporation	32,346	14,703
Social Services	33,431	5,899
Justice and Public Services	26,826	707
Economic Development and Tourism	17,159	1,474
Renewable Resources	10,357	654
Subtotal Program Departments	388,211	85,944
P	10.005	0.054
Personnel	13,206	3,874
Government Services	10,958	6,004
Executive	10,920	156
Finance	8,179	0.4
Legislative Assembly	3,706	94
Information	3,132	339
Financial Management Secretariat	1,062	
Subtotal Service Departments	51,163	10,467
TOTAL	439,374	96,411
Source: GNWT 1985 Territorial Accounts		



# NON-RENEWABLE RESOURCES

There is an abundance of non-renewable resources in the NWT. Covering a vast expanse of geologically favourable Canadian land, mineral potential is significant for a wide range of metals including zinc, lead, copper, gold,

silver, barite, tungsten, uranium, iron and high-tech minerals. Estimated oil and gas reserves are substantial and have the potential to make a significant contribution to Canadian petroleum self-sufficiency.

		IL cu. metres		AS cu. metres
<u>Dis</u>	covered	<u>Potential</u>	Discovered	<u>Potential</u>
Beaufort Sea/Mackenzie Delta Mainland NWT Arctic Islands/ Eastern Arctic Offshore	183.1 51.0 65.7	1464.0 95.0 873.0	284.2 21.4 415.7	2151.0 312.0 3156.0
Total	299.8 COGLA,	2432.0 1985	721.3	5619.0

# Mining

The NWT mining industry is at an early stage of development, with a substantial known inventory of major mineral deposits which could be developed under favourable economic conditions. Despite much higher development and operating costs for labour, power and transportation, a combination of other factors have allowed northern compete effectively with their southern counterparts. In the case of base metal mines, the NWT has larger, richer ore bodies with more favourable mining and concentration characteristics, or other advantages, such as proximity to tidewater. In the case of precious metal mines, comparative advantage stems bigger deposits of higher ore grade Lupin) or from the lower (e.g. associated with old estabcosts

lished operations (e.g. Giant-Yellow-knife).

As a whole, territorial mines have done relatively well until recently. Following a period of rapid expansthe 70s and early ion in 80s, the industry's share of Canadian metallic prodmineral uction climbed to 7.2% in It slipped to 6.8% in 1985 but the NWT maintained its ranking as the country's fifth largest metallic mineral producer, supplying all of Canada's tungsten, 29.5% of its lead, 26% of its zinc, 15% of its gold and 3% of its silver. Within the territories, lead-zinc has comprised about 63% of total NWT production, gold 30% and others (mainly tungsten and silver) 7%.

The total value of mineral production in 1985 was estimated by Statistics Canada (Value of Production, Metals plus Other Minerals) to be \$640 million. This represents a drop over 1984, primarily accounted for by indefinite suspension that year of Cullaton Lake's gold mine and Terra's Camsell River silver operations. Canada Tungsten's mine at Tungsten, NWT, suspended its operations in 1986. By the time Pine Point and Salmita end mining operations this year, about 1000 jobs will have been lost over the past few years.

The value for 1986 is expected to be slightly higher, owing largely to price increases that year for gold, lead and zinc.

Nanisivik (lead-zinc, silver 1976): Exploration efforts to extend ore have been unsuccessful to reserves present reserves and are expected to last until about 1990, although mine officials are still that current hopeful aggressive exploratory work will pay off. Unlike other NWT lead-zinc mines, this one earns additional income from silver. Approximate employment: 180.

Pine-Point (lead-zinc, 1964): The largest mine in the NWT, it plans to end mining in July and milling at the end of the year, although sales of concentrate will continue for up to three more years. Approximate employment: 425.

Polaris (lead-zinc, 1982):
Published reserves are sufficient to last until the mid-1990's, provided prices remain stable. Approximate employment: 250.

Con (gold, 1938):

Recent shaft deepening has extended reserves to 10 years or more. Approximate employment: 350. This mine was sold recently to Nerco Minerals, which has undertaken to improve mining efficiency and expand exploration with a view to increasing the productive life of the mine.

Expenditures for off-property mineral exploration -- most of which occurs within 500-mile radius a Yellowknife -- declined from \$35-50 million in the early 1980s to \$20 million in 1983, but picked up again to about \$30-40 million in 1984-85 and remained roughly the same in Total area held under claims 1985-6. and leases have decreased steadily for a number of years, but increased slightly in 1986.

Following is a synopsis of existing NWT mines (bracketed dates represent the mines' first year of operation):

Giant Yellowknife (gold, silver 1948): for about Reserves are sufficient three years and have been throughout most of the history. Exploration has kept ahead of production, however recent profit levels have been very Approximate employment: 310. Giant was recently sold to Pamour Inc., which is examining the feasibility of a \$20 million tailing facility Yellowknife.

Giant Salmita (gold, silver 1983): This small satellite mine is expected to close early this year. Approximate employment: 90.

Lupin (gold, 1982):

Reserves were sufficient for about six years, however recent shaft deepening doubled reserves. Approximate employment: 330.

In addition to the above, there are two small gold operations -- Terra's Bullmoose (50 miles east of Yellow-knife) and Treminco's Thom (on the outskirts of Yellowknife) -- which are operating at low levels of production.

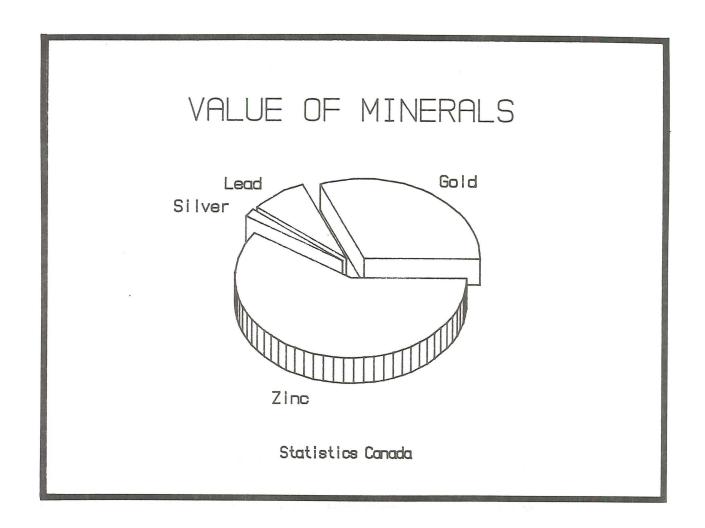
## Oil and Gas

With completion of Esso's Norman Wells pipeline down the Mackenzie Valley to Zama Lake in 1984 (64 years after the initial discovery of oil in 1920) NWT is now exporting about \$200 million in crude oil to southern Canada. Esso is currently engaged in an \$18 million expansion program at the Wells which, completed this spring, is expected to increase its production by about 5%, or 1500 barrels per day).

Amoco Canada's Pointed Mountain gas field in the southwest corner of the Territories was discovered in 1967 and

a gas plant constructed in 1972 with a daily capacity of 5.4 million cubic metres. The field is contributing about \$22 million annually to territorial exports.

There are large petroleum reserves in the High Arctic, where Panarctic Oil has discovered some 12 gas fields, two oil fields and four fields containing Small-scale production underway in 1985 with an experiment first shipment of 100,000 barrels of crude oil from the Bent Horn field on Island to refineries Cameron Montreal; the shipment was repeated in 1986. The company has been studying the feasibility of using icebreaking tankers in the eventual development of several hundred million barrels of

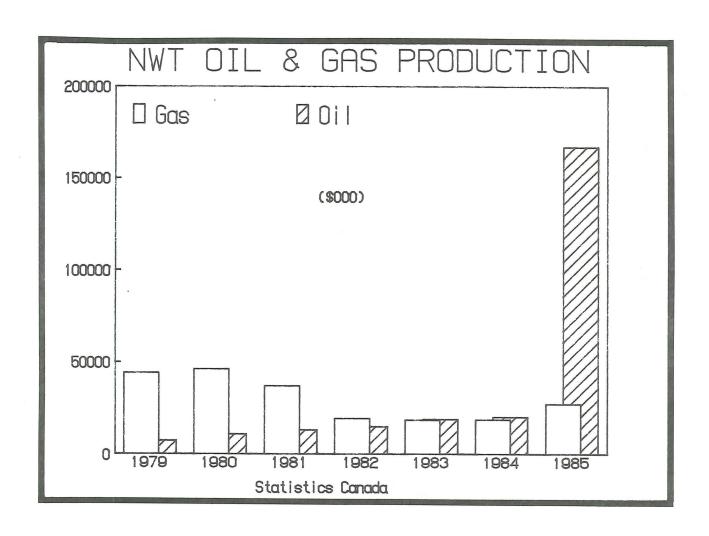


oil contained in three fields around Lougheed Island. It is also studying the feasibility of supplying fuel oil to local northern communities in conjunction with an Inuit company, as the oil can be burned without further refinement in community diesel generators.

In the Beaufort and Mackenzie Delta exploratory drilling confirmed presence of the very large quantities of oil. Gulf's Amauligak structure, for example, has estimated recoverable reserves of 775 million barrels, which is of the same magnitude as Hibernia, and the

equivalent of about 14% of Canada's remaining conventional crude oil reserves (5,763 million barrels in 1985). Flow rates of 16,000 barrels per day from Amauligak in 1986 are believed to be the highest ever recorded by a single Canadian well. Gulf shipped 300,000 barrels from the well to Japan in 1986.

Neither Esso nor Dome has found nearly so massive a structure as Gulf's, but both made encouraging discoveries in 1986. Esso's most recent confirmed find was at its Arnak well, where flows ranged from 400-1300 b/d; Dome's Havik well flowed at about 775 b/d.

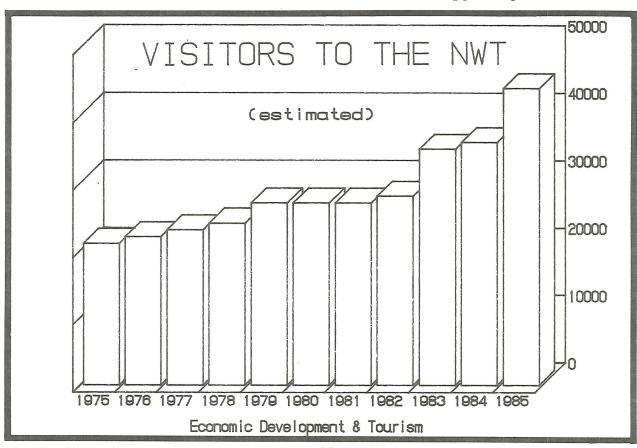


From a marketing perspective, the NWT's exotic "top of the world" location has some distinct advantages, for it offers precisely the kind of geological, historical, cultural, archaeological and wildlife resources which attract a new breed of affluent and educated "adventure traveller" whom international tourism analysts predict will soon be the dominant customer in a rapidly-growing world tourism market.

Tourism in the NWT has grown rapidly since the early sixties, when the industry consisted almost entirely of general camping or remote fly-in fishing lodges. Summer visitation has since more than quadrupled to an estimated 44,000 summer visitors who spend a total of \$40-50 million a year, and leave an estimated \$18 million in real value-added to the Territories. Be-

tween 1978 and 1983, the total number of hotels, camps, campgrounds and outfitters increased by 13% from 85 to 96, while travel facility receipts grew from \$22 million to \$32 million, accounting for 1500 full-time and 2100 part-time workers, a total of 3600, of whom 57% were northerners.

Moderate expenditure forecasts, based on national industry standards adjusted for the relative immaturity of the NWT industry, predict revenues will increase by approximately \$38-million over a period of five years, to generate approximately 2500 new person-years of employment and about \$12 million in gross tax revenues. Additional benefits will accrue from direct public and private expenditures on tourism infrastructure construction and upgrading.



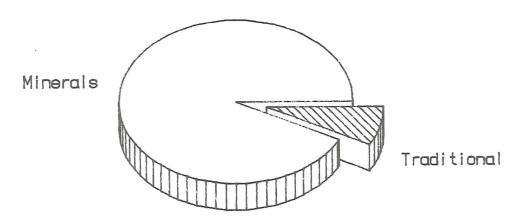
# COMMERCIAL RENEWABLE RESOURCES 1984-85

Exports Fisheries Fur Other Subtotal Exports	1,700,000 3,300,000 1,000,000 6,000,000
Domestic Consumption Fisheries and Marine Mammals Wildlife Domestic Milled Lumber Round Logs for Homes	12,000,000 27,500,000 1,500,000 1,000,000
Fuel Wood Subtotal Domestic TOTAL	2,000,000 <u>44,000,000</u> \$50,000,000

Source: GNWT Renewable Resources, Economic Development & Tourism

Note: Domestic wildlife harvest data are not readily available for all regions or sectors; the above figures are extrapolated from available Baffin Region data to provide rough value estimates for these resources. Fuelwood figures are based on data provided in a study of Mackenzie Region communities. Round log figures are based on information provided by the N.W.T. Housing Corporation. The milled lumber figure are actual values supplied by Economic Development and Tourism.

# VALUE OF PRODUCTION MINERALS & TRADITIONAL



Statistics Canada. GNWT Renewable Resources

# RENEWABLE RESOURCE DEVELOPMENT

Recession in the oil industry and the need to strengthen other areas of the prospect of several mines closing before the end of the decade make the

economy all the more urgent.

	<u>Hectares</u>	Sawtimber Volume Cubic Metres
Lower Liard Valley Cameron Hills, east slopes Lower Slave River Valley	73,100 2,900 11,300	10,519,000 295,900 887,550
	87,300	11,702,450

Sawtimber is defined as white spruce only, with a minimum diameter at breast height of 35.4cm (10"). Another 30,000 to 40,000 Hectares of potential harvest area exists in selected areas close to communities in the Mackenzie River Valley.

### Forestry

Northwest Territories has 15,094,000 hectares of productive forest land, about 2% of the Canadian total, containing an estimated 443,160,000 cubic metres wood fibre. Although most of this is unsuitable for commercial forestry, it still represents a significant potential harvest area, as the table above indicates:

There are four small-scale commercial sawmills in Fort Smith, Fort Resolution, Fort Simpson and Hay River employing about 45 mostly-seasonal workers. There are also a number of community mills which cut rough lumber for such local uses as boardwalks, building repairs, etc.

Territorial output has hovered around four million board feet, or \$1 mil-

annually in recent years, and lion, is expected to rise to six million board feet and \$1.5 million in 1987. While there is little scope for lumber exports, a new GNWT forestry assist-ance policy should help the industry put a bigger dent in current lumber imports. Studies have shown there is sufficient raw material in the Liard Valley to allow an annual cut of 15million board-feet per year, which could service about three-quarters of the Western Arctic's estimated softwood demand of 22 million board feet annually for the next decade. Further import replacement might be achieved through local manufacture of wood products.

Fuelwood is growing in importance as a domestic and commercial commodity in the Inuvik and Fort Smith Regions. recent report indicates considerable potential for conversion to wood from fossil fuels.

# Fur Harvesting

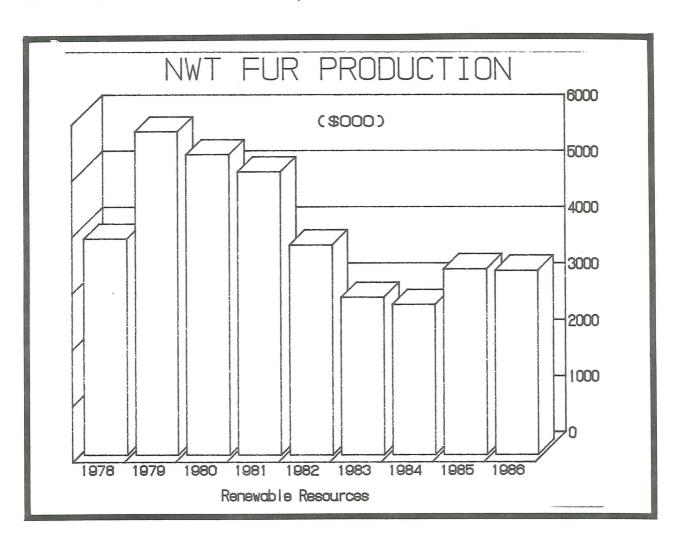
Total fur exports declined dramatically from a peak of \$5.7 million in 1978-79 to a low of \$2.7 million in 1982-83 and 1983-84 owing partly to national recession but primarily to the successful efforts of various anti-harvesting groups to curb demand in the best European markets.

However, fur exports rose again to \$3.3 million in 1984-85, and there are some encouraging signs in the international fur market. Sales of Canadian furs in 1985 were up 12% over 1984, and while exports of Canadian undressed wild furs have been dropping since 1979, exports of fur garments to the United States increased from \$46-

million in 1982 to \$107 million in 1984, more than offsetting sales declines in Europe and other countries.

There are two fox fur farm projects underway in the NWT -- one funded under the Economic Development Agreement at Hay River and one funded by the GNWT at Eskimo Point. Though it is too early to gauge the success of these projects, preliminary indications are very positive and there is definitely a growing market for farmbred fur in the United States, at least.

Sealskin sales have yet to recover from the effects of the anti-fur lobbies' European campaign, but pilot projects to open new markets for sealskin leather products have met with initial success.



# Agriculture

Exceptionally high production costs and a short growing season, among other constraints, have confined NWT agriculture to small-scale market gardening and dairy operations on private, municipal and Commissioner's lands near Hay River and Yellowknife.

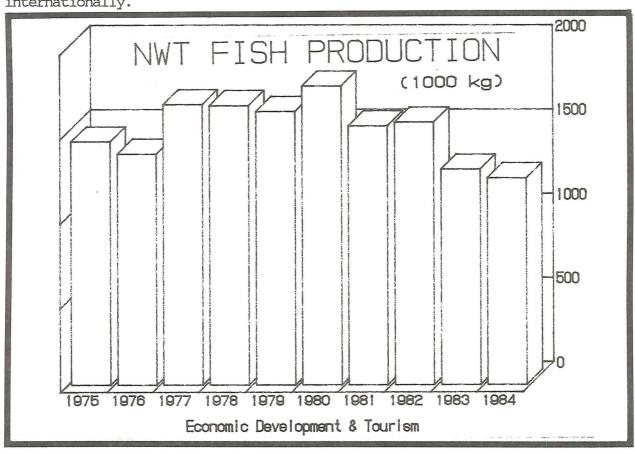
There is nonetheless considerable scope for small-scale commercial agriculture to serve local NWT markets. Studies in the South Mackenzie District, for example, have demonstrated such potentially viable projects as poultry and egg production, and hog farms.

At present the NWT's only major ranching company is the Mackenzie Delta's Canadian Reindeer Ltd., a private concern employing 30-40 seasonal herdsman in the management of 15,000 head. The meat and byproducts are sold very profitably throughout Canada and internationally.

# Commercial Fishing

Great Slave Lake whitefish comprised 75-85% of the estimated \$1.65 million industry output in the 1984-85 season, with Baffin, Keewatin and Kitikmeot arctic char contributing about 10-20%.

Like their colleagues everywhere in Canada, the NWT's 100-200 mostlyseasonal commercial fishermen have been plagued lately by sluggish prices The NWT situation and rising costs. is now exacerbated by competition from a revitalized whitefish industry in Ontario. However, the new GNWT fisheries assistance policy should help to put NWT fishermen on a competitive footing with their southern counterparts by offsetting some of the high cost of production and freight in the north; it should be especially helpful for char fisheries, although existing quotas put an upper limit on production of about \$3.5 million annually.



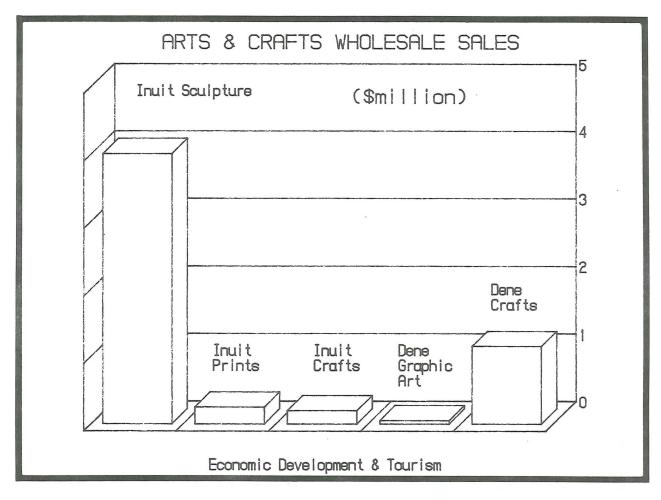
### ARTS AND CRAFTS

Precise figures are not available to accurately measure the economic importance of the arts and crafts industry in the Territories, but it is estimated that approximately native people derive at least a portion of their income from the production of fine arts (including soapstone sculpture and carvings, fine prints, original paintings, drawings and tapestries) or hand-made or smallscale "cottage" industry crafts (including beaded work, parkas, jewelry, moosehair tuftings, artifacts, etc.). The total value of these products is \$6 million wholesale, or about \$15million retail.

Although sales of top-quality Inuit

art remained strong even during the recession in the early 80s, sales of arts and crafts in general have since suffered marked declines. Business volume has recovered somewhat recently, but it still does not match the 1980-81 peak, largely because the supply of quality work is far below demand.

Nonetheless, studies have demonstrated that more arts and crafts could be sold in northern and southern Canada and other parts of the world, provided there is adequate marketing and product distribution, both of which are specifically addressed by new programs expected under the new Economic Development Agreement.



Market forces have not been kind to the mining industry worldwide over the past decade, as the suspensions at Terra silver, Canada Tungsten and Pine Point attest.

On the demand side, economic growth in the industrialized world slowed considerably over the previous decade, leading to a reduced rate of growth in mineral consumption. oil crisis, with its attendant downsizing of automobiles and imposition of government regulations leaded fuels, made matters worse, as has increasing substitution of plastics for metal in many products. On the supply side, a number of new metal producers have emerged in the less developed countries (e.g. Brazil). Many of them are largescale, low-cost and state-owned, and many continue to produce and export regardless of selling price, putting foreign exchange acquisition social considerations ahead of commercial objectives. The result is a considerable worldwide excess capacity and depressed prices for base metals.

Taking the NWT's minerals in turn, lead consumption fell abruptly during the 1981-1982 recession. The reduction of lead additives in gasoline, the growing number of cars requiring lead-free gas and the development of lighter, longer-lasting car batteries brought prices to one of their lowest levels in the post-war period.

Zinc is used primarily for galvanizing in the transportation industry, so the downsizing of automobiles and the substitution of other materials for zinc has had a negative impact on consumption in recent years. Galvan-

izing is expected to remain the dominant use for zinc, and some growth in demand is indicated by the expected growth in the use of a new electrolytically-galvanized steel in the body skins of trucks and cars. Lead and zinc are found together, so lead will be mined as long as zinc prices make production economical. Prices for both metals rose substantially in early 1986, but this was largely due to supply constraints caused by strikes in Australia, and the United States. Now that the strikes are over, prices have returned to lower levels. In general, growth consumption is projected remain much flatter than it was between 1950 and 1979, and in the case of lead, may be stagnant, over the next few years.

Gold prices topped the psychological \$US400 mark in 1986, but slipped below it again early this year and are now hovering around \$400. With the exception of Salmita, existing mines can be expected to hold their own over the next couple of years, provided prices don't slip below \$US300, in which case there will be some closures. Gold prices have been quite volatile of late, but the medium-term outlook is for steady production and probably (as we'll see) some new mines in the NWT.

Increasing demand for photographic film and electronic equipment spurred growth in world silver consumption over the past few years, but there is currently a large oversupply situation. As silver is a co-product of other mineral production, output is usually determined by the production levels of the co-product, thus any increases in NWT silver output will likely only occur as a result of

increased production of zinc at Nanisivik, unless prices rise sufficiently to bring Terra's Camsell River property back on stream.

Overall, barring unexpected large upswings in ore prices, NWT mineral production will decline in 1988 with the closure of the Pine Point and Salmita mines, and possibly again in 1990 or 1991 with the expected closure of Nanisivik. The demise of the Salmita Mine may place financial constraints on Giant's Yellowknife operations, which then may be forced to close if the price of gold declines.

On the other hand, exploration is up. Fewer permits were issued this year, but intense drilling activity (fueled largely by flow-through share tax incentives) is underway on previously-issued claims.

The major focus of exploration is gold. Noranda Exploration and Getty Resources are at work on their Tundra property 130 miles northeast Yellowknife, and results point to potential for a very large-tonnage operation. Several companies are doing extensive exploration in the Indin Lake area, where prospects are good for the development of one or more Resources gold deposits. Neptune is exploring possibilities on Colomac Dyke property 137 miles north of Yellowknife. And work is underway on a new gold belt north of Baker Lake.

Among the non-gold prospects is the Thor Lake beryllium and rare earth deposit 50 miles southeast of Yellowknife. This 50:50 joint venture between Highwood Resources and Hecla Mining seems likely to go into production within the next three years. The companies are considering establishment of a refinery in Hay River, among other places. The project might provide about 50 full-time jobs. (Beryllium alloys are used in the

nuclear, aerospace and electronics industries.)

Urangegesellschaft is aggressively examining its Lone Gull uranium deposits in the Keewatin. The property has good development potential, but cancellation and delays in planned nuclear power programs have caused a considerable amount of uncertainty in the uranium market. Prices plummeted from \$US50 per pound in 1979 to about \$US15 a few years later, and have since stayed at about \$US17. analysts believe the current price stability is a base for gradual increases in the near future, but that prognosis is overshadowed by possibility of U.S. embargo on all foreign uranium imports.

Canada Tungsten was a principal North American producer, and its MacTung deposit is massive, but prices are expected to prohibit development in the foreseeable future.

Platinum was found recently near Rankin Inlet and Coppermine. Predictions on development potential are premature, but the price of platinum, at about \$US600, will likely maintain a high level of prospector interest.

The only active prospect for new mineral development in the Baffin is Borealis's iron and gold deposit on Melville Peninsula.

If overall economic activity remains strong, excess mineral capacity should gradually disappear and prices will begin to firm up, but future growth of the industry will still depend very much on the ability of mines to continue achieving the productivity gains that have been crucial to profitability in recent years.

Mining operations are already much leaner now than they were five years ago, and raising productivity, by definition, will mean fewer jobs for a given level of output. Moreover, the technologies needed to boost productivity will create a growing demand for a more educated and more technically skilled workforce, at a time when many NWT residents are already having difficulty achieving skill levels needed to work in today's mines.

Both Gulf and Esso appeared to be gearing up for early 1990s production in the Beaufort until oil prices plummeted in late 1985. The question now is not whether, but when, development will proceed.

With cancellation of the federal petroleum incentive program (PIP) grants in 1985, completion of most exploration agreements in 1986, offshore exploration work came to virtually a complete stop in late 1986, and was expected to stay that way for several years.

But with oil prices back up around \$US18 a barrel early this year, Gulf surprised everyone by announcing tentative plans for a \$120 million drilling program this summer. The plans must still clear regulatory hurdles and final go-ahead may well depend on favourable financial concessions from Ottawa, but the size and productivity of Amauligak and expected shortages of domestic supply in the 1990s are cause for optimism among workers and businesses in the Delta.

So were February press reports that Esso is considering a billion-dollar gas pipeline down the valley. The company was quick to issue a statement that discussions are at a very early stage, but again, the fact that Esso's Taglu field is one of the largest ever discovered in Canada, and the fact that shortages of natural gas are expected in the United States within the next few years bode well for an early resumption of activity in the territorial petroleum industry.

Just how the world petroleum industry will evolve in the longer term is difficult to predict. But whatever happens worldwide, one thing is certain: conventional Canadian oil supplies are quickly running out and the shortages are expected to push domestic prices higher in the 1990s.

Likewise, it appears certain that the huge natural gas bubble in the United States will burst within the next few years. and Canadian producers would then be in a good position to service American markets.

Travel industry experts say the Territories have the potential to supply a wide and attractive range of tourism products in the wilderness and adventure markets, one of the most rapidly expanding tourism markets in North America. These include the traditional products of sport fishing and big game hunting as well as newer experiences built around native culture and unique vacation/pleasure experiences which hold strong appeal among young and affluent travellers.

In terms of economic development, the industry offers a number of particularly attractive benefits for the NWT. It is relatively labour intensive in areas, like guiding, for example, which are compatible with many existing native skills. It offers substantial spin-off benefits for related resident industries, including native arts and crafts, commercial art advertising. Small firms can enter the industry with comparatively little capital and remain small but profitable. Finally, it is one of the few sectors in which an exotic northerly location is as much a benefit as a hindrance to development.

In the renewable resource sector new technologies and new markets are increasing opportunities for commercial development. New markets for fish, for example, could make new

fisheries feasible for halibut and other species in Cumberland Sound near Pangnirtung; for char at Nettling Lake (South Central Baffin) and the west coast of Hudson Bay; for shrimp in Hudson Strait; and for Pacific herring in the Beaufort Sea.

Similarly, new and growing markets for reindeer meat and byproducts in Europe and the Pacific Rim countries could lead to expansion in animal husbandry; and improved greenhouse and related technology could generate welcome food import replacements in many northern communities.

The fur industry can also see better times ahead. Prices for martin, beaver and polar bear have risen 30-40% in the last couple of years. Although muskrat wolf and fox prices remain depressed, linx prices have remained high. At \$15-18/pelt, sealskin prices remain low, but there has even been some movement through select markets. The federal government's commitment of \$4 million to finding new markets for sealskin products over the next few years should further strengthen the industry.

## CONCLUSION

The temporary departure of the oil companies and sluggishness in the mineral industry has created hardship in parts of the NWT, but that hardship has been localized. Most Territorial residents are unaffected by events in the industrial sector. Furthermore, there are a number of new developments which could at least partially offset the losses and/or generate new economic opportunities.

Installation of the \$650 million North Warning System, for example, is expected to generate millions of dollars in local business purchases at

44 sites across the NWT, of which several will be in the Inuvik Region.

At the same time, government will be playing its characteristic stabilizing role in the northern economy. The federal government is transferring more and more of its personnel to the Territories and the territorial government is attempting to relocate some of its agencies from regional centers to more remote communities. Both of these initiatives, as well as, eventually, greater transfer of federal authorities to the GNWT, can be expected to create further income and employment opportunities in the private sector.

Further business opportunities can also be expected to arise from the new GNWT policy to transfer delivery of many of its programs and services to the private sector. Although this privatization policy will not create any new jobs in the short term, in the long term it will strengthen many territorial businesses, making them better able to compete with southern companies and therefore better able to hire more northerners.

Similarly, the GNWT's local purchase policy to give NWT businesses a competitive advantage over southern firms will also mean greater growth and employment potential for the territorial private sector.

Yet more business opportunities are bound to arise from a new study currently underway to thoroughly examine all possibilities for replacing territorial imports.

Worries about the short-term future of the territorial economy are certainly justified, particularly among people in the Beaufort, among miners, and among young people in general who will be looking for work over the next few years. But the current situation brings to mind a popular, yet

erroneous, myth about the Northwest Territories -- the so-called "boom and bust" syndrome.

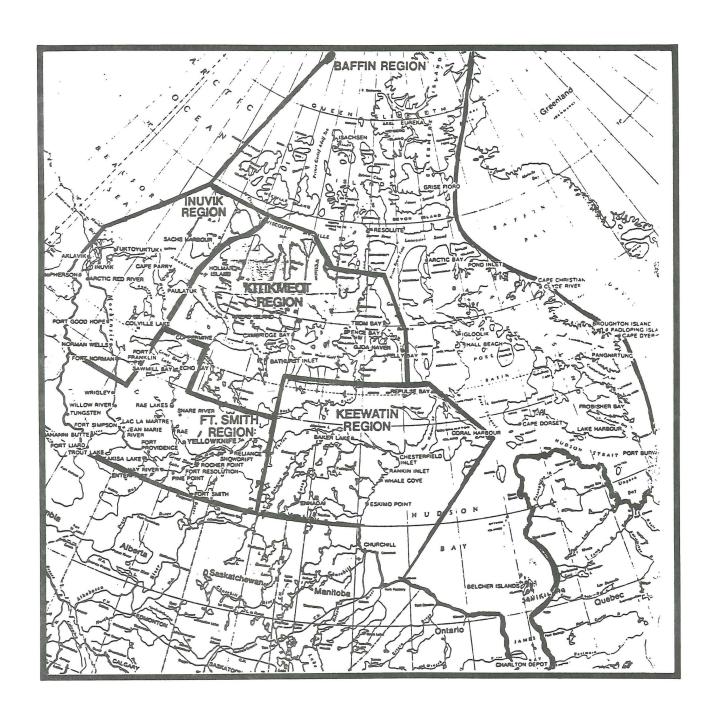
history tells a different Actual story. Yes, there have been localized and periodic downturns, but they have been very short-lived. generally When the whaling industry collapsed early in this century, for example, mining and the fur trade filled the gap. When the fur trade took a dive in the fifties, it wasn't long before government arrived on the Mackenzie And when the Valley pipeline was shelved in the seventies, it spelled hard times for some, but it was by no means the depression many predicted.

At least as far as the large industries are concerned, there has never been a depression in the Territories, and there is no reason to believe we're in for one now. Witness Gulf's planned return to the Beaufort, Esso's "early" deliberations on a Valley pipeline, and Chevron's intentions for a \$41 million exploration program in

the Mackenzie Basin. Viewed in the context of impending oil and gas shortages in North America all of these ventures appear to support the contention that our current recession will be short-lived.

So does the recent introduction of the long-awaited federal policy on northern mineral development. The policy was well received by the industry for its proclamation of the economic value of the industry and its commitment to "improved geoscientific, infrastructure and other services; modernizing the legislative base; maintenance of existing royalty regimes; protection third party interests in context of claims; program transfers and conservation; a more open an efficient regulatory system; and better communications among governments, industry and northerners".

That policy and recent federal concessions on the land claims issue are sure to rejuvenate economic activity in the NWT over the next few years.



### BAFFIN REGION

A recent economic survey indicates the Baffin has passed a tough four years. Regional personal income has risen by only 13% between 1982 and 1986, i.e. at less than the average inflation rate. Regional earned income dropped by almost 50%, from \$4.7 to \$2.9 million, in the mining sector, and from \$1 million to nil in the oil and gas sector, while income from the fur industry was one-tenth what it was in 1982.

At the same time, the tourism industry has experienced rapid growth since 1982. Visitors to the region increased by a 130% from 2074 in 1982 to 4700 in 1986, as a result of improved hotel facilities in almost every community, better attractions in the high traffic communities, the establishment of a new national park on Ellesmere Island, and three years of outfitter/guide training.

The arts and crafts industry has also grown steadily since the national recession in the early 80s, and income stands at at an all-time high of \$10 million.

With no signs of relief in sealskin markets, the region has turned its attention to marine fisheries for shrimp, halibut, and scallop on the east coast. In conjunction with the Northern Quebec Makivik Corporation and the Labrador Inuit Association, the local Qiqitaluk Corporation fished 850 tons of shrimp in record time last summer.

The construction industry offers a great deal of potential for recapturing income lost to imported labour from southern Canada, and the region hopes to improve the levels of training and local hiring associated with government construction contracts over the next few years.

### KEEWATIN REGION

Greater commercial viability and selfsufficiency are key longterm goals for the Keewatin these days as the region strives for less reliance on the public sector for employment opportunities.

Although adequate government support for training and basic capital infrastructure are still critical to successful economic development, privatization has made significant progress in the region.

The past year saw the establishment of three new real-estate development corporations, giving local shareholders ownership and control over several residential and commercial properties in the Keewatin's three largest communities.

Individual private homeownership also increased as the Department of Economic Development and Tourism helped 26 residents to purchase homes through the NWT Housing Corporation HAP Program. Similar advances in private homeownership have been forecasted for the next five years.

Keewatin offers a experience for the adventure traveller conjunction with the traditional sport fishing and hunting activities. Effective marketing and development generated a 17% increase in visitors to the region 1986, providing jobs approximately 160 people. Ongoing guide, outfitter and hospitality training can be expected to encourage even more residents to take advantage of tourism-related employment opportunities in the region over the next few years.

As Expo '86 has shown, the Keewatin has a wide assortment of marketable arts and crafts, and the region has

taken a radical but sensitive approach to the development of arts and crafts. In keeping with the spirit of privatization, and to foster growth in cottage industries, GNWT-owned enterprises have been sold or closed. This strategy has stimulated the interest of producers and the business community.

In Renewable Resource Development, a privately-owned fish processing facility is scheduled to replace the GNWT plant in Rankin Inlet. And more processing facilities are planned, where resources warrant, for northern Keewatin communities to further enhance intersettlement trade and take advantage of existing and future commercial quotas.

Four mineral exploration companies are continuing to work with local support services in the Keewatin. The region has significant mineral potential and mining is expected to play a greater role in the economy in future years.

Twelve students are completing their final year of a training program intended to reduce high staff turnover by encouraging local residents to assume responsible positions in the public and private sectors.

In close consultation with the private sector and community organizations, the Department of Economic Development and Tourism is developing a database to ensure that economic opportunities are clearly identified. It is anticipated that the aggressive and expanding private sector will take full advantage of initiatives in every sector.

# KITIKMEOT REGION

The Kitikmeot economy has remained relatively stable over the past year. Employment in Coppermine and Holman Island has been affected by the downturn in the Beaufort, but some former petroleum workers have found jobs at the Lupin mine.

Construction contractors have seen steady work in housing and community facilities, and as a result of the growth in government infrastructure since the creation of the Kitikmeot Region in 1981.

Transportation and freight costs remain the major obstacles to economic development in this most remote NWT region, but there has been some progress in renewable resources, and prospects are good for the establishment of a meat processing plant and a small tannery as well as char fisheries, greenhouses and poultry operations which will service local needs at first and perhaps export markets later on.

The fledgling tourism industry is also on the rise. Some local people have become partners in the famous Bathurst Inlet naturalist lodge, several Hunters and Trappers Associations are developing world class sports hunts, and more people are securing outfitter licenses. The industry can be expected to continue growing as more communities come to recognize the employment and income benefits it affords.

### INUVIK REGION

The Inuvik Region has received three major blows recently.

The petroleum industry has played an increasingly active role in the economy of the Region over the past 10 years. According to industry reports, the oil companies operating in the Sea and Mackenzie Beaufort Delta generated \$13 million in wages and spent \$84 million on local purchases The drop in oil prices, in 1985. of PIP grants cancellation and expiration of lease agreements culminated in a considerable contraction of the the Beaufort Sea and Mackenzie Delta economies.

A second blow to the economy was delivered last year by closure of the Canadian Forces Station in Inuvik, which after 25 years had become technologically obsolete. The closure drained 800 people and \$6.5-million in wages from the town's economy, with an estimated loss of \$2-million to local businesses and another \$1 million to Pacific Western Airlines.

Further disruption was caused by the failure of EXCO Resources Ltd., an oil exploration company whose bankruptcy left about 55 local businesses holding \$50 million in worthless accounts receivable.

Hundreds of jobs have been lost as a result of these impacts, and many businesses are struggling under dangerously tight cash flows. Some businesses have closed down, some have moved, and some have gone into receivership.

Others businesses are attempting to diversify their services and consolidate their operations. Given extremely high unemployment and consequent low levels of disposable income, this is far from easy, nevertheless certain sectors of the business community have reacted positively by diverting their energies to new services. Interest is now focused on tourism, renewable resources, arts and crafts and construction.

All of these sectors exhibit good growth potential, but commercial lenders in Inuvik and Norman Wells are predictably less confident in future Credit applications for prospects. diversification, expansion, solidation and normal operating requirements that used to be positively received are now rejected, when coupled with government program The Department of Economic funds. Development and Tourism has moved to fill the gap, and last year financed approximately \$4 million in applications from some 90 businesses through various government programs. This has generated another \$5-\$6 million worth of equity from other sources.

The Government of the NWT has also initiated various activities to help create employment, generate business and improve the quality of life in the and a federal-territorial "Action Force on Arctic Initiatives" was established both to develop broad economic strategies for the NWT and to initiate short-term and site-specific projects in response to the downturn in the oil and gas industry. Last December, the Action Force announced various initiatives in this regard, including approval of a \$9 natural gas project in Tuktoyaktuk, funding increased for trapper education, a project to remove metal waste products in the Mackenzie Delta area, plus a number of federal capital projects worth about \$30 million. Also announced was the designation of the Inuvik Region as a "Community Futures Area" under a CEIC program intended to help individuals groups create permanent jobs.

But the best news yet has come from

Gulf and Esso announcements of renewed interest in the Beaufort. If the two go ahead with development, the Inuvik Region would experience another 10-year "boom" period, but given recent experiences, one wonders how many Northerners will want to go along for the ride.

# FORT SMITH REGION

The pending closure of the Pine Point mine and the reduced barging activity on the Mackenzie River caused by the downturn in the oil and gas industry are playing havoc with the Ft. Smith economy in general and that of Hay River especially.

The mine accounts for up to 30% of retail/wholesale sales and approximately 20 direct jobs in Hay River. Although one business has already

failed, the town has recently obtained approval for a CEIC Community Futures program designed to stimulate small business and employment creation. It is hoped this injection of funds will help local banks to overcome their current reluctance to advance commercial loans.

The Town of Pine Point will be devastated by the mine closure, which will cause a loss of more than 400 jobs. It is not yet known whether the community will survive.

The North Slave and West MacKenzie remain relatively stable and should not be significantly affected by either the Beaufort or the Pine Point Mine closure.

On a brighter note, economic opportunities exist in the tourism/service and renewable resource sectors, and agriculture is gradually emerging as a prime candidate for future development.

