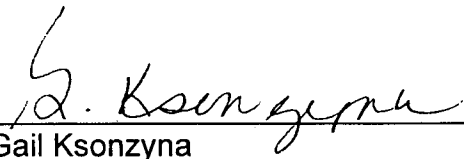


CERTIFICATION

Pursuant to Section 86, Indian Act R.S.C. 1985 C.1-5 and amendments thereto, I certify that the attached copy of the Westbank First Nation Tsinstikeptum IR #9 Capital Expenditure By-Law No. 00-TX-02 dated March 29, 2000 is a true copy of the said by-law.



Gail Ksonzyna
Lands and Trust Services,
a superintendent as defined in
Section 2(1) Indian Act RSC 1985

Minister of Indian Affairs
and Northern Development



Ministre des Affaires
indiennes et du Nord canadien

Ottawa, Canada K1A 0H4

I, the Minister of Indian Affairs and Northern Development, HEREBY
APPROVE, pursuant to section 83 of the *Indian Act*, the following bylaw
made by the Westbank First Nation, in the Province of British
Columbia, at a meeting held on the 28th day of March 2000.

- **Westbank First Nation Tsinstikeptum IR #9
Capital Expenditure Bylaw No. 00-TX-02**

A handwritten signature in black ink, appearing to read "Robert Paul".

Dated at Ottawa, Ontario this 27th day of May 2000.

Canada



**WESTBANK FIRST NATION
TSINSTIKEPTUM IR #9**

**CAPITAL EXPENDITURE
Bylaw No: 00-TX-02**

JANUARY 2000



Westbank First Nation

Tsinstikeptum IR#9 Capital Expenditure Bylaw No. 00-TX-02

Westbank First Nation

Tsinstikeptum IR#9 Capital Expenditure Bylaw No. 00-TX-02

To authorize the expenditure of up to Nine Hundred Nineteen Thousand, Nine Hundred Eighty (\$919,980.00) Dollars from moneys raised pursuant to Section 83(1) of the Indian Act for the purpose of implementing the IR#9 Servicing Strategy.

WHEREAS:

- A. Pursuant to Section 83(1) of the Indian Act and the Westbank First Nation's inherent right of self-government, the Westbank First Nation has enacted Westbank First Nation Property Taxation Bylaw, 95-TX-08;
- B. The Westbank First Nation has established a plan for the extension and development of water, sewer, road and drainage systems within Tsinstikeptum Indian Reserve No. 9 as described in the IR#9 Servicing Strategy dated January, 2000 prepared by Urban Systems Ltd., a copy of which is attached hereto as Schedule A (the "IR#9 Servicing Strategy");
- C. The Westbank First Nation proposes to expend a sum not exceeding Nine Hundred Nineteen Thousand, Nine Hundred Eighty (\$919,980.00) Dollars, which amount shall be expended on the projects detailed in Schedule B attached hereto, for the purpose of implementing the IR#9 Servicing Strategy;
- D. Pursuant to Section 83(2) of the Indian Act and Section 12(4) of the Westbank First Nation Property Taxation Bylaw, 95-TX-08, any expenditure of moneys collected pursuant to the Westbank First Nation Property Taxation Bylaw, 95-TX-08 must be approved by bylaw;

NOW THEREFORE, the Council of the Westbank First Nation, pursuant to Section 83(2) of the Indian Act and Section 12(4) of Westbank First Nation Property Taxation Bylaw, 95-TX-08, enacts as a bylaw the following:

Short Title

1. This bylaw may be cited for all purposes as the Tsinstikeptum IR#9 Capital Expenditure Bylaw No. 00-TX-02.

Expenditure Authorization

2. The Westbank First Nation is hereby empowered and authorized to expend a sum not exceeding Nine Hundred Nineteen Thousand, Nine Hundred Eighty (\$919,980.00) Dollars, which amount shall be expended on the projects detailed in Schedule B attached hereto, from moneys raised pursuant to Westbank First Nation Property Taxation Bylaw, 95-TX-08 for the extension and development of water, sewer, road and drainage systems within Tsinstikeptum Indian Reserve No. 9 as described in the IR#9 Servicing Strategy.

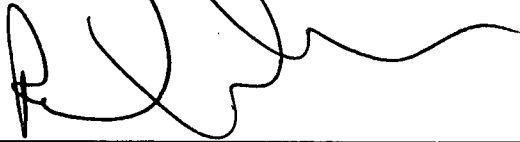
Other Authorities

3. The Westbank First Nation is hereby authorized to expend all or a portion of the monies identified in section 2 herein to acquire all such lands, easements, rights-of-way, licences, rights or authorities as may be requisite or desirable for or in connection with the construction of the improvements as described herein.

Coming Into Force

4. This bylaw shall come into full force and effect upon approval by the Minister of the Department of Indian Affairs and Northern Development.

PASSED AND APPROVED by the Council of the Westbank First Nation at a duly convened meeting of the Council held at the Westbank First Nation Administration Offices, Kelowna, British Columbia, this 28th day of March, 2000.



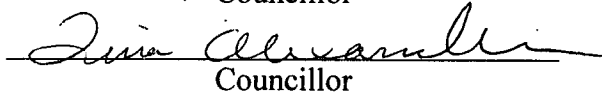
Chief



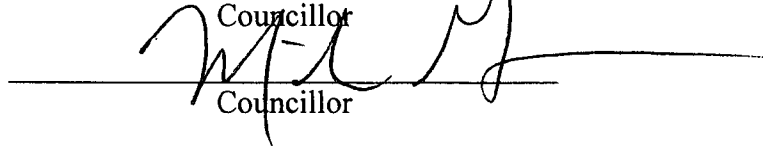
Councillor



Councillor



Councillor

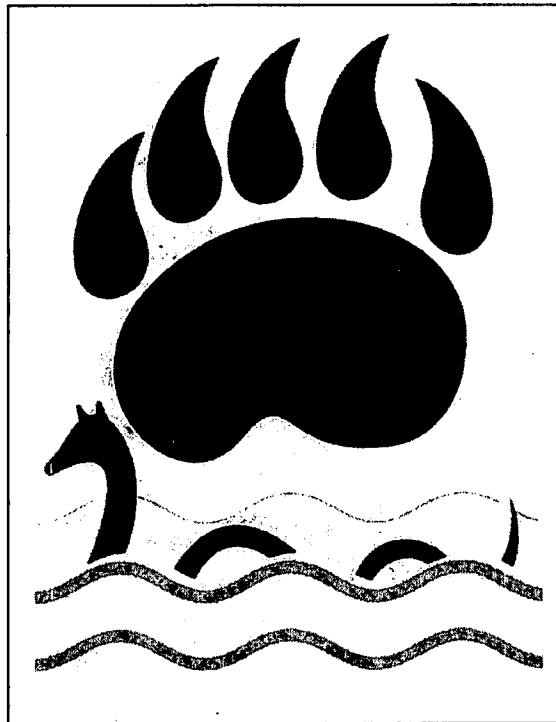


Councillor

SCHEDULE A SERVICING STRATEGY

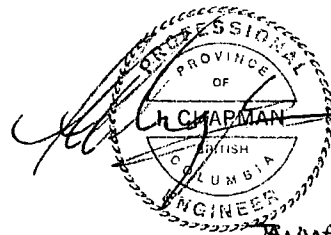
**WESTBANK FIRST NATION
TSINSTIKEPTUM IR #9
CAPITAL EXPENDITURE
Bylaw No: 00-TX-02**

JANUARY 2000



WESTBANK FIRST NATION

TSINSTIKEPTUM IR #9



JANUARY 19, 2000

This report is prepared for the sole use of the Westbank First Nation. No representations of any kind are made by Urban Systems Ltd. or its employees to any party with whom Urban Systems Ltd. does not have a contract.

URBAN SYSTEMS®

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Our File: 1070427.1
Date: January, 2000

TABLE OF CONTENTS

1.0 Introduction

2.0 General Assumptions

3.0 I.R. #9 Infrastructure Servicing Requirements

3.1 I.R. #9 - Sewer

3.1.1 Assumptions

3.1.2 Sewer Current Preliminary Budgetary Capital Costs and Timing

3.1.3 Sewer DCCs

3.2 I.R. #9 – Water Distribution

3.2.1 Assumptions

3.2.2 Water Distribution Current Preliminary Capital Costs and Timing

3.2.3 Water Distribution DCCs

3.3 I.R. #9 – Water Treatment

3.3.1 Water Treatment Assumptions

3.3.2 Water Treatment Current Preliminary Capital Costs and Timing

3.3.3 Water Treatment DCCs

3.3.4 Water Treatment DCC Financial Impact

3.4 I.R. #9 – Roads

3.4.1 Assumptions

3.4.2 Road Capital Costs and Timing

3.4.3 Road DCCs

3.4.4 Road DCC Financial Impact

3.5 I.R. #9 - Drainage

3.5.1 Assumptions

3.5.2 Drainage Capital Costs and Timing

3.5.3 Drainage DCCs

3.6 I.R. #9 – DCC Impact Summary

1.0 Introduction

This brief has been prepared to provide an overview of the current budgetary costs for infrastructure associated with new development on I.R. #9. The purpose of this brief is to:

- Provide an overview of the current budgetary capital costs, timing and budget requirements for infrastructure development attributable to Westbank First Nation (WFN) on I.R. #9.

2.0 General Assumptions

Several general assumptions have been made in the conceptual design and costing of the infrastructure required to service I.R. #9. These assumptions are as follows:

- For projects that are expected to be partially funded by INAC, only the proportional cost attributable to new development has been included in the capital cost tables. These costs and allocations must be confirmed on a project specific basis through submission and negotiation with INAC.
- Infrastructure design and related budgetary capital costs are based on the draft Westbank First Nation Conceptual Land Use Plan completed in October, 1999.
- No geotechnical investigations or detailed survey work has been conducted in support of these conceptual designs. Hence an engineering design and contingency allowance of 35% has been added to all budgetary construction cost estimates
- Mapping necessary to facilitate detailed design work will be available early in year 2000.
- Information on existing infrastructure is based on limited as-built information.
- Costs do not include land acquisition costs to obtain rights of way for infrastructure.
- Orderly development where neighbouring property owners cooperate to facilitate practical and economical servicing layouts is assumed.

3.0 I.R. #9 Infrastructure Servicing Requirements

The following section provides an overview of the assumptions made to develop preliminary budgetary capital costs, timing and cost recovery strategies for the infrastructure required to service development on I.R. #9.

3.1 I.R. #9 - Sewer

3.1.1 Assumptions

A number of assumptions have been made in order to develop preliminary current budgetary capital costs for the further extension of sewer service to I.R. #9. These assumptions are as follows:

- The capital costs detailed in the summary spreadsheet represent the capital commitment required to provide sanitary sewer service to I.R. #9.
- The sewer system conceptual development is based on the "Westbank First Nation Conceptual Land Use Plan" prepared in October, 1999.
- The current budgetary cost figures outlined in the summary spreadsheet represent the gross cost for the sewer from the connection to the existing system.
- Relevant latecomer and other RDCO DCC charges will apply.
- It is understood that the RDCO intends to allocate any future downstream transmission system upgrade costs equally on a per unit basis to new development located both on and off reserve.
- It is assumed that, as in the past, the core infrastructure developed by Westbank First Nation will include that necessary to allow developers to extend infrastructure at their cost to service their developments.
- Developers will be responsible for constructing sewer infrastructure required to service their developments to WFN standards.

3.1.2 Sewer Current Preliminary Budgetary Capital Costs and Timing

Capital costs and timing for sewer projects required to service I.R. #9 are included on the following page. The project costs are colour coded to correspond with the sanitary sewer project map for I.R. #9.

- Capital costs in pink will be incurred in 2000.
- Capital costs in blue will be incurred beyond 2000.

Cost Estimate Summary S

Project	Total Project Cost	2000	2001	2002	2003	2004	2005	2006
ON RESERVE SYSTEM								
TR-9	\$ 138,500							
TR-10 (Red Cloud Way)	\$ 175,500							
TR-11 Predesign in Progress (Emergency Works)	\$ 166,000							
TR-17 McDougall Creek	\$ 721,000							
TR-3	\$ 179,000							
TR-12	\$ 194,500							
TR-13	\$ 200,000							
TR-14	\$ 529,000							
TR-15 (Cut Off Lands)	\$ 220,500							
TR-16	\$ 189,500							
TR-1	\$ 283,000							
TR-2	\$ 40,500							
TR-7	\$ 116,000							
TR-8	\$ 145,000							
TOTALS	\$ 3,298,000							
TR-4								
Lift Station #1								
FM-1								
TR-5								
FM-2								
FM-3								
TR-6								
TOTALS								

FIRST NATION
Vegetary Costs (IR #9)

Summary Sheet

25	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	Non-DCC Works	Anticipated INAC Funding	Additional Works Required If TR-17 is not Built
												\$ 166,000	
											\$ 97,250		
											\$ 100,000		
												\$ 165,270	
												\$ 189,500	
											\$ 283,000		
											\$ 40,500		
											\$ 116,000		
											\$ 145,000		
											\$ 781,750	\$ 520,770	\$ -
													\$ 214,000
													\$ 223,000
													\$ 49,000
													\$ 216,000
													\$ 120,000
													\$ 44,500
													\$ 371,000
											\$ -	\$ -	\$ 1,237,500

Project costs for sewer extensions to provide service to specific developments will be developer driven. As such, developers will be required to pay the cost of these extensions. INAC funding participation has been deducted from the capital costs to be used for DCC calculation purposes.

The total current budgetary cost for sewer upgrades required to service I.R. #9 is approximately \$3.3 million. The *net current budgetary cost attributable to WFN* (net cost being the total current budgetary cost less contributions from INAC, RDCO, developers, existing development and other sources) is **\$2.0 million**.

In addition to the projects to be constructed by the WFN sewer utility, there are works which developers will be required to construct. Following construction completion, these works would be turned over to the WFN sewer utility. These works could result in additional Latecomer Charges for other developments that would benefit from the specific works.

3.1.3 Sewer DCCs

DCCs are developed on an equivalent unit (EU) basis. An equivalent unit is equal to the impact on infrastructure created by a single family dwelling.

Based on a net capital cost of \$2.0 million attributable to WFN for the extension of sewer service to I.R. #9, the following DCC per unit results:

- $\$1,995,480 / 5,867$ Equivalent Units = **\$340 per equivalent unit sewer DCC**

The Regional District of Central Okanagan (RDCO) also levies a DCC of \$2,145 for sewer for development contributing to sewage to the RDCO sewage treatment plant.

For preliminary analysis purposes, the DCC for sewer for development on I.R. #9 would be as follows:

- WFN Sewer DCC: \$ 340 per equivalent unit
- RDCO Sewer DCC: \$2,145 per equivalent unit*
- **Total Sewer DCC: \$2,485 per equivalent unit**

*Some areas will also be charged applicable latecomer agreement costs.

3.2 I.R. #9 – Water Distribution

3.2.1 Assumptions

A number of assumptions have been made in order to develop current preliminary budgetary capital costs for the upgrade of water distribution for I.R. #9. These assumptions are as follows:

- The conceptual development of the water system is based on the draft Westbank First Nation Conceptual Land Use Plan prepared in October, 1999.
- It is assumed that the core infrastructure developed by Westbank First Nation will include that necessary to allow developers to extend infrastructure at their cost to service their developments.
- Developers will be responsible for constructing water infrastructure to WFN standards to serve their developments.
- The assumption has been made (yet to be verified) that the water system can be activated using adequate chlorine dosage contact time together with an ongoing real time water turbidity monitoring program as acceptable treatment.
- Total water distribution costs to WFN do not include water treatment facility costs. Water treatment is discussed as a separate item in Section 3.3.
- Initial projects to be completed in 2000 include:
 - Completion of the installation of the unit sub station.
 - Initial activities to install a 500 kw pump motor.
 - Investigation of system control, information and operation.
 - Watermain extension design.

3.2.2 Water Distribution Current Preliminary Capital Costs and Timing

Capital costs and timing for water projects required to service I.R. #9 are included on the following page. The project costs are colour coded to correspond with the water project map for I.R. #9.

- Capital costs in pink will be incurred in 2000.
- Capital costs in blue will be incurred beyond 2000.

Project costs for water extensions to provide service to specific developments will be developer driven. As such, developers will be required to pay the cost of these extensions.

WESTBANK FIRST NA
Water Upgrades - Current Budget

Cost Estimate Summary

Project	Total Project Cost	2000	2001	2002	2003	2004	2005	2006
Water Pump Station 1 - Phase 1 Upgrade	\$ 364,500		\$ 364,500					
Review System Control Information and Operation	\$ 150,000		\$ 150,000					
Standby Power	\$ 189,000							
Utility Operating Cost Review	\$ 20,000							
Watermain 1 (Cut Off Lands)	\$ 534,500		\$ 534,500					
Watermain 2	\$ 100,500						\$ 100,500	
Watermain 3	\$ 55,500							
Watermain 4	\$ 168,500							
Watermain 5	\$ 189,000							
Tank 1	\$ 1,816,000							
Tank 2 - Phase 2	\$ 1,330,000			\$ 1,330,000	\$ 1,330,000			
Tank 2 - Ultimate	\$ 1,215,000							
Water Pump Station 2	\$ 439,000					\$ 439,000	\$ 439,000	
Water Pump Station 3	\$ 304,000							
Water Pump Station 4	\$ 400,000							
Watermain A	\$ 140,500							
Watermain B	\$ 248,000							
Watermain C	\$ 258,500							
TOTALS - WATER UPGRADES	\$ 7,922,500		\$ 2,213,500	\$ 1,330,000	\$ 1,330,000	\$ 439,000	\$ 439,000	\$ 100,500

STATION
Secondary Costs (IR #9)

Summary Sheet

2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	Non-DCC Works	Anticipated INAC Funding
											\$ 274,032
										\$ 140,500	
										\$ 248,000	
										\$ 258,500	
										\$ 647,000	\$ 274,032

The total current budgetary cost for water upgrades required to service I.R. #9 (not including potential costs for water treatment facilities) is approximately \$7.9 million. The *net current budgetary cost attributable to WFN* (net cost being the total current budgetary cost less contributions from INAC, developers, existing development and other sources) is approximately **\$7.0 million**.

In addition to the projects to be constructed by the WFN water utility, there are works which developers will be required to construct. Following construction completion, these works would be turned over to the WFN water utility. These works could result in additional Latecomer Charges for other developments that would benefit from the specific works.

3.2.3 Water Distribution DCCs

DCCs are developed on an equivalent unit (EU) basis. An equivalent unit is equal to the impact on infrastructure created by a single family dwelling.

Based on a net capital cost of \$7.0 million attributable to WFN for upgraded water service to I.R. #9, the following DCC per unit results:

- $\$7,001,468 / 5,380 \text{ Equivalent Units} = \$1,301 \text{ per EU water DCC}$

For preliminary analysis purposes, the DCC for water distribution on I.R. #9 would be \$1,301 per EU.

3.3 I.R. #9 – Water Treatment

3.3.1 Water Treatment Assumptions

The assumption has been made (yet to be verified) that the water system can be activated using adequate chlorine dosage contact time together with an ongoing real time water turbidity monitoring program with modification of chlorine dosage to reflect conditions. As such, the preliminary assumption is that this system could constitute acceptable water treatment. Further to this and as a consequence of the current arrangement whereby chlorine contact time is provided within the watermain pipeline rather than through storage reservoirs, it is anticipated that a chlorine contact tank will be required in 2005 at a cost of approximately \$500,000.

The intention is to develop water treatment costs in 2000 based on the latest water treatment technology. If more extensive water treatment is required by Health Canada, the

cost associated with the design and construction of water treatment plants will be recovered through a separate DCC or other cost recovery mechanism.

Based on preliminary data and water servicing requirements it is assumed that water treatment plant facilities could be developed in two stages as required. For the time being it is assumed that the first stage would have a capital cost of approximately \$12 million followed by a second stage upgrade with a capital cost of \$6.3 million.

For preliminary analysis purposes, it is assumed that water treatment to service I.R. #9 would cost in the order of \$0.5 million for the chlorine contact tank plus \$18.3 million for water treatment facilities.

3.3.2 Water Treatment Current Preliminary Capital Costs and Timing

The total current budgetary cost estimate for water treatment facilities to service I.R. #9 is approximately **\$18.8 million**. Sampling and investigations will need to continue through 2000 to confirm the assumption that adequate chlorine dosage contact time together with the real time water turbidity monitoring program with modification of chlorine dosage to reflect conditions will constitute adequate treatment. This program will proceed to identify practical treatment options should more extensive water treatment be required or deemed necessary. These engineering investigations will cost approximately \$50,000. If treatment is required by Health Canada, further engineering investigations will need to be conducted beyond 2000 to determine the capital cost of these facilities. These additional engineering investigations will likely cost approximately \$40,000.

Capital costs and timing for sewer projects required to service I.R. #9 are included on the following page. The project costs are colour coded to correspond with the sanitary sewer project map for I.R. #9.

- Capital costs in pink will be incurred in 2000.
- Capital costs in blue will be incurred beyond 2000.

3.3.3 Water Treatment DCCs

DCCs are developed on an equivalent unit (EU) basis. An equivalent unit is equal to the impact on infrastructure created by a single family dwelling.

Based on a net capital cost of \$18.3 million attributable to WFN for water treatment, the following DCC per unit results:

- $\$18,800,000 / 5,380 \text{ Equivalent Units} = \mathbf{\$3,494 \text{ per EU water treatment DCC}}$

WESTBANK FIRST N
Water Treatment Upgrades - Current

Cost Estimate Summary

Project	Total Project Cost	2000	2001	2002	2003	2004	2005	2006
Water Treatment Pre-Planning	\$ 50,000							
Follow Up Review of Water Treatment Monitoring	\$ 40,000							
Design for Chlorine Contact Tank	\$ 50,000							
Construction of Chlorine Contact Tank	\$ 450,000							
TOTALS - WATER TREATMENT UPGRADES	\$ 590,000							

Thus if water treatment is required for I.R. #9, the DCC per EU would be \$3,494.

Since the need and cost of extensive water treatment are both unknowns at this time and the potential cost per equivalent unit would be significant, it is more practical to consider an initial water treatment DCC to recover the estimated \$50,000 cost of the engineering investigations required to assess the need for water treatment.

It is presently assumed that a chlorine contact tank will need to be designed and constructed in order to provide water for development on I.R. #9. The cost of the design and construction are estimated to be \$500,000.

Thus, if initial engineering investigations and the chlorine contact costs are considered, the DCC per equivalent unit for water treatment would be as follows:

- $\$50,000 / 300$ equivalent units = \$167 per EU for water treatment investigations in the first year
- $\$500,000 / 5,380$ equivalent units = \$93 per EU for the chlorine contact tank
- **$\$93$ per EU + $\$167$ per EU = $\$260$ per EU water treatment DCC in the first year**

3.3.4 Water Treatment DCC Financial Impact

If development proceeds in the first year while water treatment investigations are still underway, the Westbank First Nation would lose the opportunity to collect DCCs to recover the additional cost for full water treatment facilities from developments occurring in the first year of development.

If the 300 units which were developed in the first year (based on data from the Conceptual Land Use Plan) were charged only the initial \$260 DCC, the WFN would lose a DCC revenue opportunity of approximately \$1 million. This loss of revenue would result in a need to increase the water treatment DCC by approximately \$200 per EU for all remaining developments.

Given the cost of the water treatment plant investigations and the cost of the chlorine contact tank, it is recommended that an initial DCC of \$260 per equivalent unit be established for water treatment. If treatment facilities are required, the DCC may be revised in the future to reflect these costs.

3.4 I.R. #9 – Roads

The roads section discussion will include pedestrian trails as well as roads.

3.4.1 Assumptions

The Provincial Government is undertaking a number of transportation initiatives that will have a significant impact on any future road network on I.R. #9. These initiatives include the Okanagan Valley Transportation Plan (OVTP) and the Okanagan Lake Bridge Project. Until the impact of these initiatives is assessed and appropriate overall protocols are concluded the required road network cannot be identified. It is intended that these protocols will be pursued in 2000.

One project is required to proceed regardless of the Provincial road impacts:

- Design of Red Cloud Way. The design is required as Red Cloud Way will serve as a road as well as a route for a future sanitary sewer corridor, part of which must be constructed in 2000.

Other assumptions that have been made in respect to road development are as follows:

- Road upgrades are generally required to bring roads to WFN standards, to improve safety for vehicles and pedestrians or to add extra capacity to accommodate increased traffic flows.
- Developers will be responsible for constructing roads to WFN standards to serve their developments.
- Trails will be developed along the off-road sewer alignments to provide pedestrian access to otherwise isolated areas. The trails will also allow access for sewer main inspection and repair purposes.

3.4.2 Road Capital Costs and Timing

The capital cost budgets have been prepared for work currently identified as required in 2000 only. These projects include:

- Red Cloud Way Design: \$70,000
- Safety Issues Investigation: \$20,000
- **2000 Total Capital Cost: \$90,000**

3.4.3 Road DCCs

DCCs are developed on an equivalent unit (EU) basis. An equivalent unit is equal to the impact on infrastructure created by a single family dwelling.

Since the need and cost for road upgrades are not known at this time, the proposed approach to recover the identified 2000 costs from the equivalent units projected to be constructed on I.R. #9 in 2000. Based on this the following DCC per EU results:

- $\$90,000/300 \text{ EU} = \$300 \text{ DCC per EU for roads and trails in the first year (2000)}$

3.4.4 Road DCC Financial Impact

As the road network requirements are not known at this time, it is not possible to assess the overall DCC impact.

For preliminary analysis purposes, the DCC for road network upgrades for development on I.R. #9 would be \$300 per EU.

3.5 I.R. #9 - Drainage

3.5.1 Assumptions

A number of assumptions have been made in order to develop preliminary budgetary capital costs for drainage upgrades on I.R. #9. These assumptions are as follows:

- Drainage costs have been developed through a review of the RDCO's Westside Master Drainage Plan.
- Drainage upgrades are based on the draft Westbank First Nation Conceptual Land Use Plan prepared in October, 1999.
- Developers will be responsible for the cost of drainage works within their developments.
- The majority of drainage capital costs arise due to impacts created by developments in the RDCO. As such, the majority of the costs associated with drainage upgrades are expected to be recovered from the RDCO.

- A preliminary allocation of drainage works costs has been prepared. This allocation reflects benefits to the Westbank First Nation and the RDCO. The cost allocation and resulting DCC impacts are reflected in the summary table and in the drainage DCC calculation.

3.5.2 Drainage Capital Costs and Timing

Capital costs and timing for drainage projects required to service I.R. #9 are estimated to be in the order of \$0.8 million. However, a significant portion of these costs (\$550,000) should be recovered from the RDCO following negotiations.

As such, the preliminary drainage DCC will be based on an initial capital cost of \$281,200. It is recommended that Westbank First Nation make an allowance of \$25,000 for preliminary work required to complete agreements with the RDCO and to initiate related activities such as surveys, appraisals and land acquisition.

Capital costs and timing for sewer projects required to service I.R. #9 are included on the following page. The project costs are colour coded to correspond with the sanitary sewer project map for I.R. #9.

- Capital costs in pink will be incurred in 2000.
- Capital costs in blue will be incurred beyond 2000.

3.5.3 Drainage DCCs

Drainage works are not directly required as a result of population growth. Rather, they are a function of impervious surface (pavement, buildings, etc) created by new development. Drainage DCCs are calculated on an Equivalent Development Area (EDA) basis. One EDA is equal to the impervious surface coverage created by one acre of single family development. For I.R. #9 the total charge per EDA derived by dividing the capital cost by 802 acres. Based on the total drainage costs allocated to I.R. #9, the drainage DCC per EDA would be:

- $\$306,200/802 = \382 per acre DCC for drainage

Using an average single family development with 5 units per acre, the drainage DCC would be \$76 per equivalent unit.

**WESTBANK FIRST NATION
Sewer Upgrades - Current Budgetary Costs (IR #9)**

Cost Estimate Summary Sheet

Project	Total Project Cost	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	Non-DCC Works	Anticipated INAC Funding	Additional Works Required if TR-17 is not Built
ON RESERVE SYSTEM																				
TR-9	\$ 138,500																			
TR-10 (Red Cloud Way)	\$ 175,500																			
TR-11 Predesign in Progress (Emergency Works)	\$ 166,000																		\$ 166,000	
TR-17 McDougall Creek	\$ 721,000																			
TR-3	\$ 179,000																			
TR-12	\$ 194,500																	\$ 97,250		
TR-13	\$ 200,000																	\$ 100,000		
TR-14	\$ 529,000																			
TR-15 (Cut Off Lands)	\$ 220,500																		\$ 165,270	
TR-16	\$ 189,500																		\$ 189,500	
TR-1	\$ 283,000																	\$ 283,000		
TR-2	\$ 40,500																	\$ 40,500		
TR-7	\$ 116,000																	\$ 116,000		
TR-8	\$ 145,000																	\$ 145,000		
TOTALS	\$ 3,298,000																	\$ 781,750	\$ 520,770	\$ -
TR-4																				\$ 214,000
Lift Station #1																				\$ 223,000
FM-1																				\$ 49,000
TR-5																				\$ 216,000
FM-2																				\$ 120,000
FM-3																				\$ 44,500
TR-6																				\$ 371,000
TOTALS																		\$ -	\$ -	\$ 1,237,500

**WESTBANK FIRST NATION
Water Upgrades - Current Budgetary Costs (IR #9)**

Cost Estimate Summary Sheet

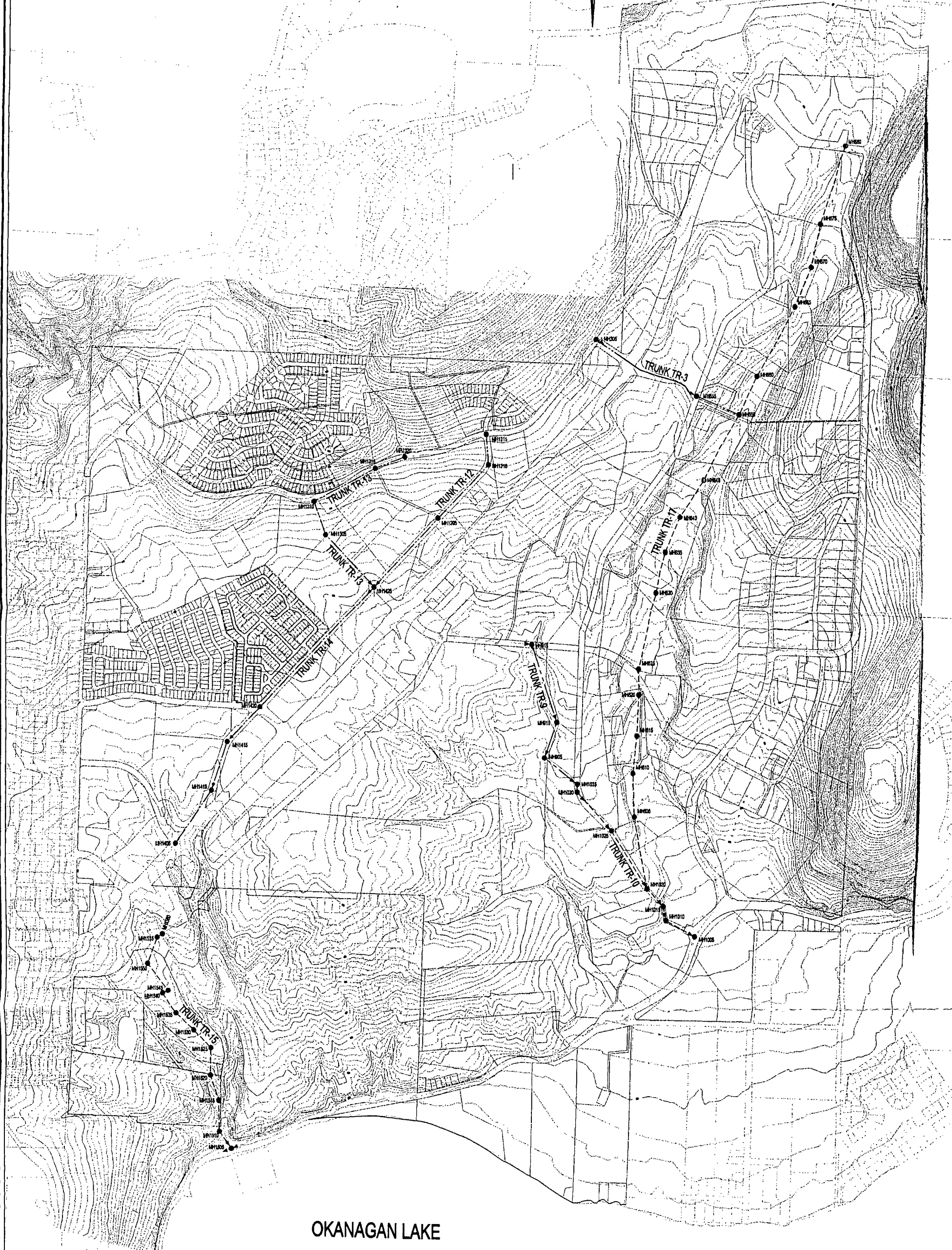
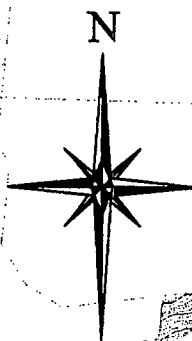
Project	Total Project Cost	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	Non-DCC Works	Anticipated INAC Funding
Water Pump Station 1 - Phase 1 Upgrade	\$ 364,500																		
Review System Control Information and Operation	\$ 150,000																		
Standby Power	\$ 189,000																		
Utility Operating Cost Review	\$ 20,000																		
Watermain 1 (Cut Off Lands)	\$ 534,500																		\$ 274,032
Watermain 2	\$ 100,500																		
Watermain 3	\$ 55,500																		
Watermain 4	\$ 168,500																		
Watermain 5	\$ 189,000																		
Tank 1	\$ 1,816,000																		
Tank 2 - Phase 2	\$ 1,330,000																		
Tank 2 - Ultimate	\$ 1,215,000																		
Water Pump Station 2	\$ 439,000																		
Water Pump Station 3	\$ 304,000																		
Water Pump Station 4	\$ 400,000																		
Watermain A	\$ 140,500																	\$ 140,500	
Watermain B	\$ 248,000																	\$ 248,000	
Watermain C	\$ 258,500																	\$ 258,500	
TOTALS - WATER UPGRADES	\$ 7,922,500																	\$ 647,000	\$ 274,032

WESTBANK FIRST NATION
Drainage Upgrades - Current Budgetary Costs (IR #9)
Cost Estimate Summary Sheet

Project	Total Project Cost	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	Anticipated	Non-DCC	Anticipated
																		RDCO Funding	Works	INAC Funding
A3 - Smith Creek - Old MacDonald's Farm	\$ 128,500																	\$ 91,600		
A4 - Smith Creek Downstream of Old Okanagan Highway	\$ 135,000																	\$ 96,200	\$ 38,800	
C1 - Drainage Route Downstream of Boucherie Road	\$ 18,000																	\$ 600		
C2 - Central IR #9 Detention Pond	\$ 205,500																	\$ 6,750	\$ 198,750	
C3 - Ravine Protection Between Elk and Boucherie Roads	\$ 96,500																	\$ 3,150	\$ 93,350	
C4 - Elk Road Culvert	\$ 5,000																	\$ 150		
C5 - Culvert 50 on Louie Road	\$ 6,500																	\$ 200		
C6 - Culverts 57 on Louie Road and 56 on Highway 97	\$ 7,000																	\$ 200		
C7 - Grizzly Road Diversion	\$ 115,000																	\$ 3,800		
C8 - Marlow Spring	\$ 98,000																	\$ 3,000		
E2 - East Boucherie Road North of Daimler Road	\$ 13,500																	\$ 10,750		
TOTALS - DRAINAGE UPGRADES	\$ 828,500	\$ 95,000																\$ 216,400	\$ 330,900	\$ -

LEGEND

- SLS-1 SEWAGE LIFT STATION
- YEAR 2000 DESIGN & CONSTRUCT
- - - YEAR 2000 PRE-DESIGN
- BEYOND 2000 W.F.N.



OKANAGAN LAKE

LEGAL BASE FROM GEOMATICS CANADA REVISED TO SEPTEMBER 29, 1998

CONTOUR INTERVAL = 2m

URBANSYSTEMS



WESTBANK
FIRST NATION

**TSINSTIKEPTUM I.R. No. 9
SANITARY COLLECTION PLAN**

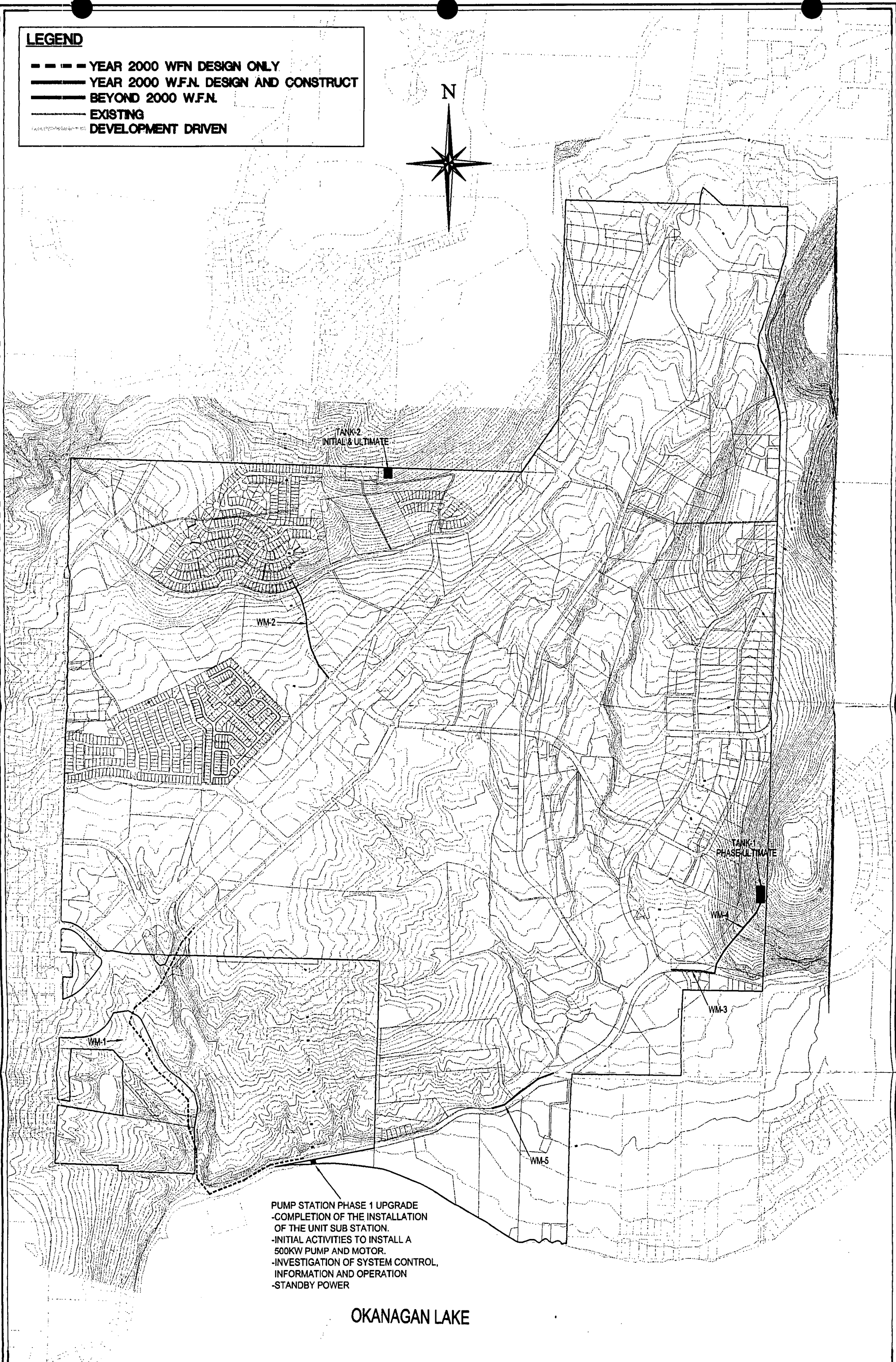
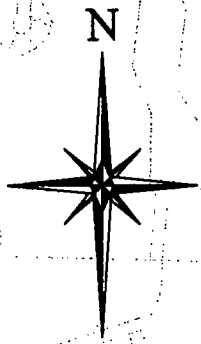
ON RESERVE SYSTEM

Date JAN. 4, 2000 USL Job # 1.0704.29.1

Drawing # 0704-9R.dwg Scale: 1 : 12,500

LEGEND

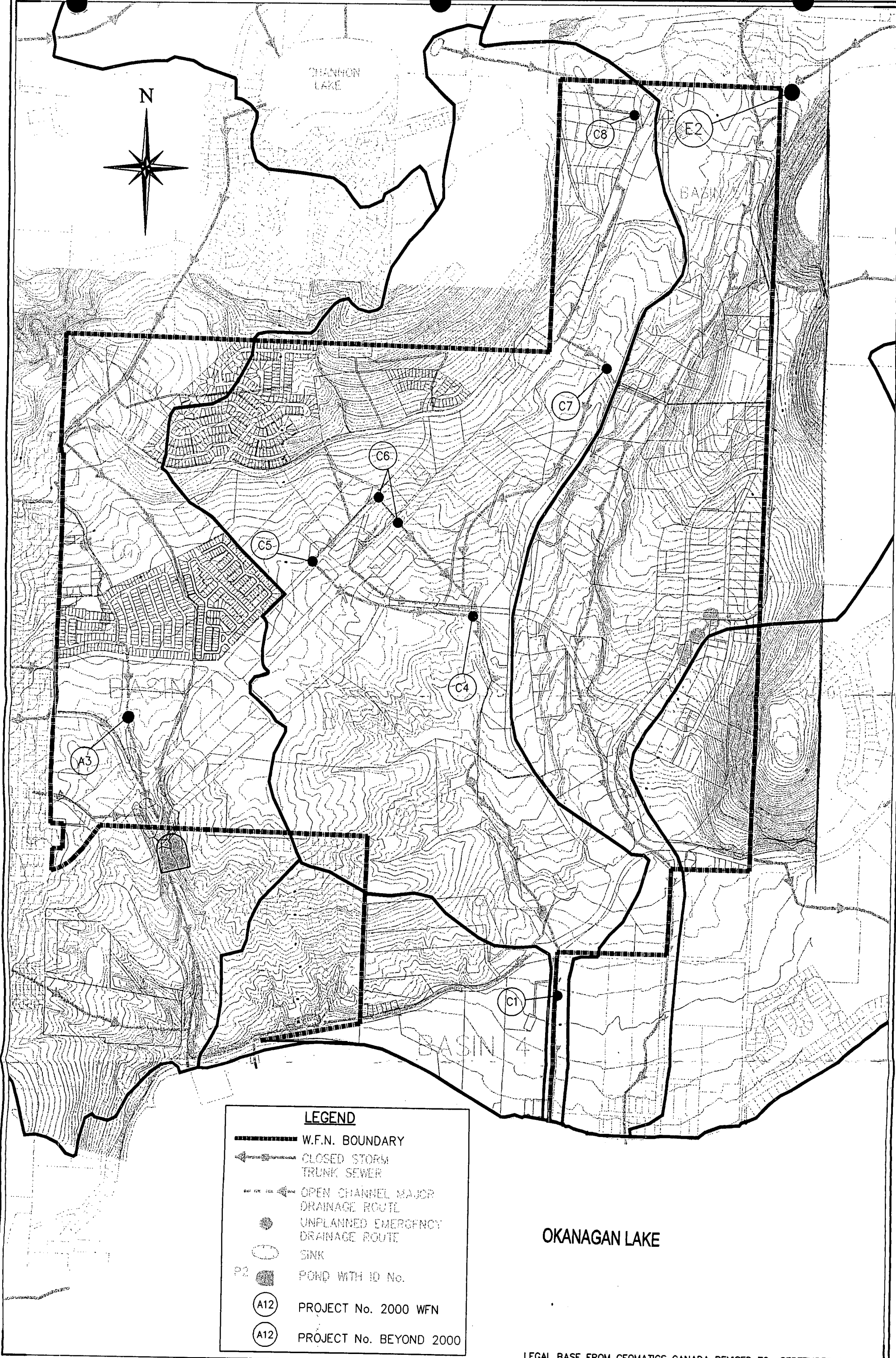
- YEAR 2000 WFN DESIGN ONLY
- YEAR 2000 W.F.N. DESIGN AND CONSTRUCT
- BEYOND 2000 W.F.N.
- EXISTING DEVELOPMENT DRIVEN



PUMP STATION PHASE 1 UPGRADE
 -COMPLETION OF THE INSTALLATION
 OF THE UNIT SUB STATION.
 -INITIAL ACTIVITIES TO INSTALL A
 500KW PUMP AND MOTOR.
 -INVESTIGATION OF SYSTEM CONTROL,
 INFORMATION AND OPERATION
 -STANDBY POWER

OKANAGAN LAKE

LEGAL BASE FROM GEOMATICS CANADA REVISED TO SEPTEMBER 29, 1998



LEGEND

- W.F.N. BOUNDARY
- CLOSED STORM TRUNK SEWER
- OPEN CHANNEL MAJOR DRAINAGE ROUTE
- UNPLANNED EMERGENCY DRAINAGE ROUTE
- SINK
- POND WITH ID No.
- PROJECT No. 2000 WFN
- PROJECT No. BEYOND 2000

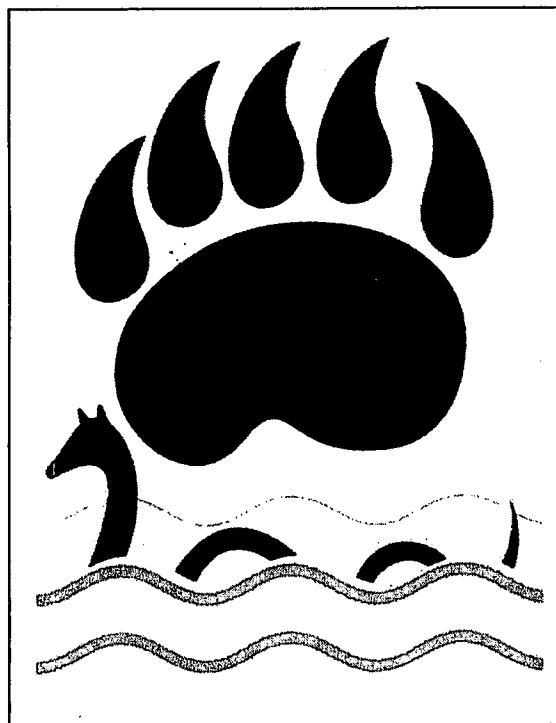
LEGAL BASE FROM GEOMATICS CANADA REVISED TO SEPTEMBER 29, 1998

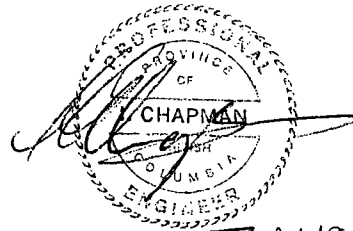


**SCHEDULE B
PROJECT COST ESTIMATES**

**WESTBANK FIRST NATION
TSINSTIKEPTUM IR #9
CAPITAL EXPENDITURE
Bylaw No: 00-TX-02**

JANUARY 2000





Summary Sheet

Infrastructure Type	Project	2000 Project Capital Cost Estimates	Total 2000 Budgetary Capital Cost
Sanitary Sewer			
	TR-9	\$ 138,500	
	TR-10 (Red Cloud Way)	\$ 30,575	
	TR-17 (McDougall Creek)	\$ 45,550	
	TR-15 (Cut Off Lands)	\$ 8,285	
	Subtotal		\$ 222,910
Water System			
	Water Pump Station 1 - Phase 1 Upgrade	\$ 189,000	
	Review System Control Information and Operation	\$ 25,000	
	Standby Power	\$ 189,000	
	Utility Operating Cost Review	\$ 20,000	
	Watermain 1 (Cut Off Lands)	\$ 39,070	
	Subtotal		\$ 462,070
Water Treatment			
	Water Treatment Pre-Planning	\$ 50,000	
	Subtotal		\$ 50,000
Roads			
	Red Cloud Way Design	\$ 70,000	
	Safety Issues Investigation	\$ 20,000	
	Subtotal		\$ 90,000
Drainage			
	C8 - Marlow Spring	\$ 95,000	
	Subtotal		\$ 95,000
TOTAL BUDGETARY CAPITAL COST			\$ 919,980

Note: All Capital Cost Estimates Based on Assumptions Contained In The Schedule A Servicing Strategy Document.

Sanitary Sewer

TR-9

ITEM	DESCRIPTION	UNIT	ESTIMATED QUANTITY	UNIT PRICE	EXTENSION
1	200mmØ SDR-35 PVC Main	l.m.	560	\$ 105.00	\$ 58,800.00
2	Manholes	ea.	11	\$ 3,000.00	\$ 33,000.00
3	Asphalt Removal	m ²	200	\$ 2.25	\$ 450.00
4	Asphalt Installation (75mm)	m ²	200	\$ 10.00	\$ 2,000.00
5	Base 100mm	m ²	200	\$ 2.50	\$ 500.00
6	Subbase 400mm	m ²	200	\$ 6.00	\$ 1,200.00
7	Restoration Fences	l.s.	1	\$ 2,750.00	\$ 2,750.00
	SUBTOTAL				\$ 98,700.00
	ENGINEERING & CONTINGENCY (35%)				\$ 34,545.00
	TOTAL Design and construction				\$ 133,500.00
	Mapping Work allowance				\$ 5,000.00
	TOTAL BUDGETARY CAPITAL COST				\$ 138,500.00
	For work in Year 2000				
	Design and Construct TR-9				\$ 133,500.00
	Mapping Work				\$ 5,000.00
	Total work proposed in year 2000				\$ 138,500.00

Sanitary Sewer

**TR-10
 (Red Cloud Way)**

ITEM	DESCRIPTION	UNIT	ESTIMATED QUANTITY	UNIT PRICE	EXTENSION
1	300mmØ SDR-35 PVC Main	l.m.	680	\$ 140.00	\$ 95,200.00
2	Manholes	ea.	8	\$ 3,000.00	\$ 24,000.00
3	Drop MH	ea.	1	\$ 4,000.00	\$ 4,000.00
4	Connect to RDCO Trunk	ea.	1	\$ 2,000.00	\$ 2,000.00
5	Asphalt Removal	m ²	50	\$ 2.25	\$ 112.50
6	Asphalt Installation (75mm)	m ²	50	\$ 10.00	\$ 500.00
7	Base 100mm	m ²	50	\$ 2.50	\$ 125.00
8	Subbase 400mm	m ²	50	\$ 6.00	\$ 300.00
	SUBTOTAL				\$ 126,237.50
	ENGINEERING & CONTINGENCY (35%)				\$ 44,183.13
	TOTAL Design and construction				\$ 170,500.00
	Mapping Work allowance				\$ 5,000.00
	TOTAL BUDGETARY CAPITAL COST				\$ 175,500.00
	For work in Year 2000				
	Design Preparations 15% (0.15x\$170,500)				\$25,575
	Mapping Work				\$5,000
	Total work proposed in year 2000				\$30,575

Sanitary Sewer

**TR-17
 (McDougall Creek)**

ITEM	DESCRIPTION	UNIT	ESTIMATED QUANTITY	UNIT PRICE	EXTENSION
1	(MH 1 - 12) 200Ø SDR 35 PVC Main	l.m.	1400	105	\$ 147,000.00
	(MH 12 - 20) 250Ø SDR 35 PVC Main	l.m.	775	115	\$ 89,125.00
	(MH 20 - 25) 300Ø SDR 35 PVC Main	l.m.	555	140	\$ 77,700.00
2	Manholes	ea.	25	\$ 3,000.00	\$ 75,000.00
3	Asphalt Removal	m ²	120	\$ 2.25	\$ 270.00
4	Asphalt Installation (75mm)	m ²	120	\$ 10.00	\$ 1,200.00
5	Base 100mm	m ²	120	\$ 2.50	\$ 300.00
6	Subbase 400mm	m ²	120	\$ 6.00	\$ 720.00
7	Dewatering	l.m.	2700	\$ 50.00	\$ 135,000.00
	SUBTOTAL				\$ 526,315.00
	ENGINEERING & CONTINGENCY (35%)				\$ 184,210.25
	TOTAL Design and construction				\$ 711,000.00
	Mapping Work allowance				\$ 10,000.00
	TOTAL BUDGETARY CAPITAL COST				\$ 721,000.00
	For work in Year 2000				
	Predesign Preparations 5% (0.05x\$711,000)				\$ 35,550.00
	Mapping Work				\$ 10,000.00
	Total work proposed in year 2000				\$ 45,550.00

Sanitary Sewer

TR-15
(Cut Off Lands)

ITEM	DESCRIPTION	UNIT	ESTIMATED QUANTITY	UNIT PRICE	EXTENSION
1	300mmØ SDR-35 PVC Main.	l.m.	860	\$ 140.00	\$ 120,400.00
2	Manholes	ea.	14	\$ 3,000.00	\$ 42,000.00
3	Asphalt Removal	m ²	30	\$ 2.25	\$ 67.50
4	Asphalt Installation (75mm)	m ²	30	\$ 10.00	\$ 300.00
5	Base 100mm	m ²	30	\$ 2.50	\$ 75.00
6	Subbase 400mm	m ²	30	\$ 6.00	\$ 180.00
SUBTOTAL					\$ 163,022.50
ENGINEERING & CONTINGENCY (35%)					\$ 57,057.88
TOTAL BUDGETARY CAPITAL COST					\$ 220,500.00
INAC Funding share					\$ 165,270.00
WFN Funding share (oversize)					\$ 55,230.00
For work in Year 2000					
Design preparations 15% (0.15x\$55,230)					\$ 8,285.00
Total work proposed in year 2000					\$ 8,285.00

Water system

**Water Pump Station 1 -
 Phase 1 Upgrade**

ITEM	DESCRIPTION	EXTENSION
1	Pumps (1 x 500 kW)	\$ 125,000.00
2	Piping	\$ 50,000.00
3	Sub Station Installation and Civil Works	\$ 80,000.00
4	Electrical	\$ 15,000.00
	SUBTOTAL	\$ 270,000.00
	ENGINEERING & CONTINGENCY (35%)	\$ 94,500.00
	TOTAL BUDGETARY CAPITAL COST	\$ 364,500.00
	<u>For Work in Year 2000</u>	
	Pump Purchase	\$ 60,000.00
	Substation Installation (including Civil)	\$ 80,000.00
	Subtotal	\$ 140,000.00
	Engineering and Contingency 35%	\$ 49,000.00
	Total work proposed in year 2000	\$ 189,000.00

Water System

Review System Control Information and Operation

ITEM	DESCRIPTION	EXTENSION
1	Investigation of System Control, Information and Operation	\$ 18,500.00
2	Implementation of Control System	\$ 92,600.00
	SUBTOTAL	\$ 111,100.00
	ENGINEERING & CONTINGENCY (35%)	\$ 38,885.00
	TOTAL BUDGETARY CAPITAL COST	\$ 150,000.00
	<u>For Work in Year 2000</u>	
	Investigation of System Control, Information and Operation	\$ 18,500.00
	Engineering and Contingency 35%	\$ 6,500.00
	Total work proposed in year 2000	\$ 25,000.00

Water System

**Standby Power
 To Pump Station
 Phase 1**

ITEM	DESCRIPTION	EXTENSION
1	Right Angle Drive	\$ 30,000.00
2	(Gas) Engine	\$ 50,000.00
3	Installation of right angle drive and engine	\$ 30,000.00
4	Building Alterations	\$ 30,000.00
	SUBTOTAL	\$ 140,000.00
	ENGINEERING & CONTINGENCY (35%)	\$ 49,000.00
	TOTAL BUDGETARY CAPITAL COST	\$ 189,000.00
	For Work in Year 2000	
	Proceed with Standby Power Installation	\$ 189,000.00
	Total work proposed in year 2000	\$ 189,000.00

Water System

Utility Operating Cost Review

ITEM	DESCRIPTION	UNIT	ESTIMATED QUANTITY	UNIT PRICE	EXTENSION
1	Utility Operating Cost Review				\$ 11,100.00
	SUBTOTAL				\$ 11,100.00
	ENGINEERING & CONTINGENCY(35%)				\$ 3,885.00
	TOTAL Review				\$ 15,000.00
	Mapping Work allowance				\$ 5,000.00
	TOTAL BUDGETARY CAPITAL COST				\$ 20,000.00
	For Work in Year 2000				
	Proceed with Review				\$ 15,000.00
	Mapping Work				\$ 5,000.00
	Total work proposed in year 2000				\$ 20,000.00

Water System

**Watermain 1
 (Cut Off Lands)**

ITEM	DESCRIPTION	UNIT	ESTIMATED QUANTITY	UNIT PRICE	EXTENSION
1	300mmØ DI	l.m.	1639	\$ 180.00	\$ 295,020.00
2	300mmØ Gate Valves	ea.	6	\$ 1,750.00	\$ 10,500.00
3	300mmØ Fittings Bends	ea.	15	\$ 500.00	\$ 7,500.00
	Tees	ea.	4	\$ 1,200.00	\$ 4,800.00
4	Hydrants and Leads	ea.	5	\$ 3,200.00	\$ 16,000.00
5	Asphalt Removal 900 x 3.3	m ²	2970	\$ 2.25	\$ 6,682.50
6	Asphalt Replacement (75mm)	m ²	2970	\$ 10.00	\$ 29,700.00
7	Base 100mm 900 x 2.7	m ²	2430	\$ 2.50	\$ 6,075.00
8	Subbase 400mm	m ²	2430	\$ 6.00	\$ 14,580.00
9	Connect to Existing	ea.	2	\$ 2,500.00	\$ 5,000.00
	SUBTOTAL				\$ 395,857.50
	ENGINEERING & CONTINGENCY (35%)				\$ 138,550.13
	TOTAL BUDGETARY CAPITAL COST				\$ 534,500.00
	INAC Funding share				\$ 274,032.00
	WFN Funding share (oversize)				\$ 260,468.00
	For work in year 2000				
	Design preparations 15% (0.15x\$260,468)				\$ 39,070.00
	Total work proposed in year 2000				\$ 39,070.00

Water Treatment

**Water Treatment
Pre-Planning**

ITEM	DESCRIPTION	EXTENSION
1	Water sampling, reviews & report	\$ 50,000.00
	SUBTOTAL	\$ 50,000.00
	TOTAL BUDGETARY CAPITAL COST	\$ 50,000.00
	<u>For Work in Year 2000</u>	
	Proceed with work	\$ 50,000.00
	Total work proposed in year 2000	\$ 50,000.00

Roads

Red Cloud Way

ITEM	DESCRIPTION	UNIT	ESTIMATED QUANTITY	UNIT PRICE	EXTENSION
1	GENERAL REQUIREMENTS				
1.1	Mobilization/demobilization	l.s.	1	\$ 15,000.00	\$ 15,000.00
1.2	Surveys and layout	l.s.	1	\$ 5,900.00	\$ 5,900.00
2	ROADWORKS				
2.1	Excavation	cu.m.	7700	\$ 5.00	\$ 38,500.00
2.2	Road Structure	sq.m.	13800	\$ 12.00	\$ 165,600.00
2.3	Asphalt	sq.m.	10500	\$ 7.00	\$ 73,500.00
2.4	Shouldering	sq.m.	2200	\$ 5.00	\$ 11,000.00
2.5	O/H Hydro, Tel, Cable	l.m.	1100	\$ 40.00	\$ 44,000.00
2.6	Streetlighting on Hydro Poles	l.m.	1100	\$ 10.00	\$ 11,000.00
2.7	Drainage	l.s.	1	\$ 25,000.00	\$ 25,000.00
2.8	Landscaping	sq.m.	7900	\$ 5.00	\$ 39,500.00
	SUBTOTAL				\$ 429,000.00
	ENGINEERING & CONTINGENCY (35%)				\$ 150,150.00
	TOTAL Design and construction				\$ 579,500.00
	Mapping Work allowance				\$ 18,000.00
	TOTAL BUDGETARY CAPITAL COST				\$ 597,500.00
	For Work in Year 2000				
	Design preparation 9% (0.09x\$579,500)				\$ 52,000.00
	Mapping Work				\$ 18,000.00
	Total work proposed in year 2000				\$ 70,000.00

Roads

Safety Issues Investigation

ITEM	DESCRIPTION	EXTENSION
1.1	Review pedestrian access safety issues	\$ 20,000.00
	SUBTOTAL	\$ 20,000.00
	TOTAL BUDGETARY CAPITAL COST	\$ 20,000.00
	<u>For work in year 2000</u>	
	Proceed with review	\$ 20,000.00
	Total work proposed in year 2000	\$ 20,000.00

Drainage

C8
Marlow Spring

ITEM	DESCRIPTION	UNIT	ESTIMATED QUANTITY	UNIT PRICE	Minimum Base cost	EXTENSION
1	600 culvert	l.m.	100	\$ 140.00	\$ 1,000.00	\$ 15,000.00
2	Boring under highway	l.m.	40	\$ 1,250.00		\$ 50,000.00
	SUBTOTAL					\$ 65,000.00
	ENGINEERING & CONTINGENCY(35%)					\$ 22,750.00
	TOTAL Design and construction					\$ 88,000.00
	Mapping Work allowance					\$ 10,000.00
	TOTAL BUDGETARY CAPITAL COST					\$ 98,000.00
	RDCO Share of design & construction					\$ 3,000.00
	WFN Share of design & construction					\$ 85,000.00
	WFN Mapping					\$ 10,000.00
	For Work in Year 2000					
	Design and Construct project C8					\$ 85,000.00
	Mapping Work					\$ 10,000.00
	Total work proposed in year 2000					\$ 95,000.00

