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AN ANALYSIS OF PUBLIC LAND BANKING POLICY

by

Marilyn Dolenko, B.A.

A thesis submitted to Carleton University
in partial fulfilment of the requirements
for the degree of
Master of Arts
in
Public Administration

School of Public Administration
Carleton University
OTTAWA, Canada
August, 1976
The undersigned recommend to the Faculty of Graduate Studies acceptance of the thesis

AN ANALYSIS OF
PUBLIC LAND BANKING
POLICY

submitted by Marilyn Dolenko, B.A.,
in partial fulfilment of the requirements for the degree of Master of Arts in Public Administration.

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ABSTRACT

There are three objectives which proponents of public land banking claim can be achieved by the implementation of a public land acquisition program. 1) The price of land and thereby housing can be reduced (The Price Objective). 2) The profits accruing from land development can be recovered for the public sector (The Profit Objective). 3) Planning can be more comprehensive and longer ranging because the public sector will own the land and plan all land uses (The Planning Objective). Each of these objectives is examined from a theoretical perspective, following which four case studies are presented: 1) Saskatoon, 2) Hamilton, 3) Red Deer, Alberta and 4) Mill Woods, Edmonton.

The purpose of the thesis is to analyze the implementation of a public policy and to determine the extent to which the three objectives were achieved. The theoretical and empirical studies led to the conclusion that neither the price nor profit objectives can be viably reached through the use of land banking projects. However, public land banking can be an effective though expensive tool in the planning process. It is especially useful as a means of controlling the rate of development and can influence the direction and sequence of growth. The most immediate housing problems facing large urban centres, however, are high costs and a time-consuming planning process. Public land banking is not an effective tool for reducing housing costs, nor is it an effective means of reducing the time-consuming planning process. Urban land banking* is a long-term process which will do little to ameliorate today's housing problems.
To Allan

for

encouragement

and

patience
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AN ANALYSIS OF PUBLIC LAND BANKING POLICY

INTRODUCTION

A. The Problem

During the past decade the price of single family dwellings in Canada has continued to escalate.\(^1\) For example:

In 1972, a small three bedroom house on a 50 foot lot in the suburbs of Calgary cost $25,000 . . . . (In 1976) a basic three bedroom new house on a 40 foot lot on Calgary's suburban fringe costs $54,000. 2

Increasing house prices have led to several studies suggesting ways to alleviate the problem. One suggestion has been for greater government involvement not only in the housing market, but in land ownership, servicing and development. This type of extensive involvement has been proposed because increasing house prices have not been the only indication of problems in

\(^1\)In real terms the "housing crisis" has not been nearly as serious as most political commentators would have us believe. ". . . . the proportion of income spent for housing services in 1972 was 16.1%, compared to 18.6% in 1962, 16.0% in 1969,. . . . Between 1961 and 1974 the tenancy cost component of the consumer price index rose only 30.1% and the home ownership component rose 127.1%, while personal disposable income per capita rose 166.1% and personal disposable income per family rose an estimated 156.8%." L. B. Smith, "Myths and Realities in Mortgage Finance and the Housing Crisis." Remarks presented at the Symposium on Housing and Lifestyles, Halifax, October 4, 1975, pp. 7-8.

the industry. There have been accusations of shortages in the supply of serviced land caused by a complicated, expensive and time-consuming system for development approval;\textsuperscript{3} accusations of artificial shortages of housing created by developers who can increase prices by reducing supply;\textsuperscript{4} accusations of collusion between municipal politicians and developers.\textsuperscript{5} In addition, there have been numerous examples of poorly planned communities. Many of these problems have contributed to higher costs for the consumer. However, the problems go beyond cost alone and raise the whole question of private ownership versus land as a public good requiring public control.

The proponents of public land banking claim that the problems created by politicians, planners and developers have obstructed the proper functioning of the free market system in land. Rather than attempting to eliminate the obstructions, they propose extensive public ownership of land in order to guarantee that control—meaning pricing, allocation, land use and the timing of development—will be maintained by the public sector.


\textsuperscript{4}James Lorimer, "Their Land, Your Money" and Peter Spurr, The Land Problems' Problem, A Report Submitted to CMHC.

\textsuperscript{5}James Lorimer, A Citizen's Guide to City Politics (Toronto: James, Lewis and Samuel, 1972).
By definition, the term 'land banking' refers to:

a stockpile of land owned by the public, resulting from a policy, implemented by a continuous programme of land buying and land management for the public, to be held by the government (federal, provincial, municipal, or crown corporation) for future use as needed.6

Specifically, the advocates of public land banking (or land assembly) propose the public acquisition of land with development potential, on the periphery of urban centres, in advance of anticipated need. At a time when development becomes imminent, the land can either be sold for private development or be developed by the public land assembly agency and leased.

The proponents of public land banking claim that three objectives can be achieved by public land assembly:

1) The price of land and thereby housing can be reduced. (The Price Objective).

2) The profits accruing from land development can be recovered for the public sector. (The Profit Objective).

3) Planning can be more comprehensive and longer ranging because the public sector will own the land and plan all land uses. (The Planning Objective).

Proponents of public land banking cite northern European experiences as being successful and an incentive for attempting similar projects in Canada. In doing so,

they are ignoring certain facts. The Canadian tradition, contrary to that of Sweden and Finland, has been private ownership of land and little government interference in the market system. Private land ownership is embedded deeply into Canadian cultural norms. Immigrants to Canada, including those from northern Europe, have often considered the acquisition of land to be a primary objective. Land in Canada has become a symbol of wealth, prestige, security and freedom. Therefore, it should be recognized that extensive public land banking does not conform to traditional Canadian governmental practices.

Secondly, the experience in the United Kingdom, Sweden and Israel demonstrates that the cost of private land increases as a result of public land banking. 7

Thirdly, there is no documentation of better planned communities resulting from public ownership of land. Tapiola in Finland is considered to be the most successful of extensively planned new communities and if took place on a privately owned land bank. 8

Finally, land banking is not a short-term solution to the housing problem. Land banking is a long-range program; land is purchased well in advance of need when the cost is lowest. Public acquisition of peripheral urban

7 Ibid., p. 2.
8 Ibid., p. 9.
land would be extremely expensive as it is already owned by private developers. To refuse servicing and development approval for peripheral privately owned land and purchase and develop land beyond it, would result in extremely high infrastructure costs and leap-frog development. At the same time, to consider land banking as a tool for future planned communities will do little to ameliorate today's housing problems.

If one looks at the demographic projections for Canada, it is clear that the pressures for housing will ameliorate after the mid-1980s. By that time the postwar baby boom will have been housed. Recent projections indicate that after the mid-1980s household formations will fall by 25% relative to the current period, and continue to decline until the end of the century. These projections clearly indicate that the need to increase housing supply is today.9

Therefore, if Canada is to embark on an extensive land banking program, the objectives of the program must be clear. There has been little Canadian experience on which to base further programs. Since the depression, Saskatchewan has been very actively involved in land banking and recently most other provincial governments, the federal government and some municipal and city governments have acquired small tracts of land designated as land assembly projects. Most of these projects have been on a small scale, over a short time span, without clarification of objectives and with mixed results.

B. The Thesis Proposal

The purpose of this thesis is to analyze public land banking policy as it has been presented in the literature and using as case studies the experiences of four Canadian cities. In Chapter I, the first two objectives of public land banking will be examined: a) the Price Objective: to lower the cost of land and thereby housing to the ultimate consumer; and b) the Profit Objective: to reclaim the accrued value of land resulting from zoning and servicing for the public sector. It is felt that neither of these objectives can be viably reached through land banking projects. The analysis in Chapter I will bear out the conclusions reached.

The price and profit objectives have received considerably more attention in land banking literature than the planning objective. Therefore, Chapter II is devoted to a theoretical examination of the Planning Objective to determine whether control of the land through public ownership will guarantee better planned communities. A prerequisite to an evaluation of the possible benefits of public land banking is a clear understanding of the planning process as it currently exists. Therefore, the beginning of Chapter II concentrates on an examination of the provincial planning Acts and regulations which set out the procedures to be followed by cities and municipalities, and an examin-
ation of the traditional tools with which the planning procedures are implemented. This examination was based on literature not directly related to public land banking but related to the planning process itself—a process applicable to both privately and publicly owned land.

Because planning decisions are made within a political context, Chapter II also briefly examines the political process which currently exists to determine what changes in attitude and behaviour may be necessary if extensive public land banking is to be successfully introduced in Canada.

In addition, in Chapter II, a sophisticated model which integrates public land ownership into the planning process is outlined and then critically evaluated.

Finally, the qualifications which must be met if public land banking is to be used as an effective tool in the planning process, are specified in the conclusion to Chapter II.

Chapter III moves from the theoretical plane to the empirical. Four Canadian cities which have implemented public land banking to a greater or lesser extent are examined to see if any of the three objectives were attained.

There are few Canadian examples of public land banking projects. After a cursory examination of the literature available, the following choices were made: 1) Saskatoon, because it has the oldest and most widely publicized land
banking program; 2) Hamilton, because it is one of the few examples of a land assembly project within a metropolitan area; 3) Red Deer, because it has the most intensive program in Canada; and 4) Mill Woods, Edmonton, because it is an ongoing project and an excellent example of a program where the planning objective may be achieved in a large urban centre.

The lack of primary sources and the choice of three western cities as case studies, dictated the use of secondary sources. Projects in eastern Canada have not been undertaken as frequently. Those projects which have been completed have been limited in scope. For example, Peterborough and Kingston both attempted public land banking projects but neither city gave sufficient consideration to the profit or planning objectives and neither clearly articulated how it intended to achieve the price objective. Documentation shows that neither city was able to reduce shelter costs in general and that both granted subsidies to a few select buyers who acquired public lands at less than market value.\textsuperscript{10} It was felt that cities which demonstrated some measure of success should be used as case studies rather than those which could be considered absolute failures. Therefore the final choice of cases was dictated by the availability of secondary sources.

\textsuperscript{10} Precautions were not taken to insure that purchasers fell into certain income categories. There were no restrictions on resale opportunities. Lots were awarded on a first come first serve basis and a number of people made enormous profits on resale. See John Jordan, "The Case for Public Land Assembly," Housing and People, Vol. 2, #3, 1971, pp. 4-7; and Angus McKay, "Government Land Development for Private Housing," Plan, Vol. 3, #1, 1962, pp. 31-33.
sources including City Plans, Planning Studies, critical evaluations in journals and newspapers and theses prepared on any aspect of the cases. In each instance, all three objectives were examined but the complexity of the planning objective necessitated additional attention.

The primary purpose of the thesis is to analyze the implementation of a public policy. The theoretical literature suggests that certain objectives can be achieved if land is publicly owned. The examination of actual land assembly projects highlighted the difficulties encountered and made possible an evaluation of the extent to which the three objectives of public land assembly were achieved.

The conclusions presented in Chapter IV specify the problem areas and the criteria which must be met if the objectives of land banking are to be attained. Finally, the viability of land banking as opposed to other means of control of land use and the timing of development are reviewed.
CHAPTER I

The Price and Profit Objectives

A. The Price Objective

The Price Objective of public land banking is to lower the cost of land and thereby housing for the consumer. In order to do so, the land assembly agency must control sufficient reserve land to exert leverage on the market. At any given time, it must be able to flood the market, thereby bringing down prices. Various suggestions have been made regarding the percentage of land required but no known empirical studies have been made to verify recommendations. The figure of 60% has been suggested as allowing the land bank to have a major role in suburban land development yet leaving a significant private market. It has been argued that a public stock of land on these proportions would have two benefits:

1. It would alter expectations of continued price increases and result in a partial decrease in land values.
2. The supply in the long run would create maximum development and increase the supply of shelter relative to demand.

---


That is to say, that the supply of land would not be curtailed because private owners were withholding land in anticipation of higher prices.

Because our current knowledge of the land market is extremely limited, estimates of land requirements, supply and demand, must be viewed simply as estimates. Canadian experiences in public land assembly have been limited and on a small scale. For example, Saskatoon, "with a population of 135,000 has committed $3,033,128 in seventeen years to assembling 7000 acres."\(^3\) Metro Toronto is thirty times the size of Saskatoon; raw land is at least ten times as costly per acre and the city is expanding much more rapidly. To extrapolate the Saskatoon figures, in an effort to fit them to Toronto, could hardly be expected to produce an exact estimate. We simply do not know how much land is required for effective price control in rapid-growth, high land-price areas.

At the same time, it is obvious that land at the periphery of existing cities, particularly rapid-growth cities, is the most desirable for future development and would have the most immediate impact on housing expansion. This fact is so obvious that it has been anticipated by developers who have already purchased most peripheral land.

\(^3\)Ibid., p. 21.
The table presented below estimates the residential land requirements for 1971-80 and the estimated acreage controlled by the six leading developers in each city. These latter estimates do not include the land held in trust for the developers or in other corporation names.

RESIDENTIAL LAND REQUIREMENTS 1971-80

<table>
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<tr>
<th>City</th>
<th>Estimates in acres</th>
<th>Acreage controlled by 6 leading developers</th>
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<tbody>
<tr>
<td>Calgary</td>
<td>7500</td>
<td>7500</td>
</tr>
<tr>
<td>Edmonton</td>
<td>8790</td>
<td>8500</td>
</tr>
<tr>
<td>Halifax</td>
<td>2250</td>
<td>1600</td>
</tr>
<tr>
<td>London</td>
<td>4252</td>
<td>3820</td>
</tr>
<tr>
<td>Montreal</td>
<td>12000</td>
<td>3000</td>
</tr>
<tr>
<td>Ottawa-Hull</td>
<td>8128</td>
<td>7000</td>
</tr>
<tr>
<td>Toronto</td>
<td>19600</td>
<td>18000</td>
</tr>
<tr>
<td>Vancouver</td>
<td>8000</td>
<td>6900</td>
</tr>
<tr>
<td>Victoria</td>
<td>4571</td>
<td>nil</td>
</tr>
<tr>
<td>Winnipeg</td>
<td>8000</td>
<td>6155</td>
</tr>
<tr>
<td>Windsor</td>
<td>3000</td>
<td>-1500</td>
</tr>
<tr>
<td>Regina</td>
<td>1250</td>
<td>1250</td>
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Under the circumstances, it would appear that land assembly on a large scale would be possible only in the distant future and could have little impact on immediate prices. The only alternative would be the use of expropriation.

on the part of the public authority. This avenue, although frequently advocated by proponents of public land assembly,\(^5\) is not likely to result in any savings to the public authority. The process of expropriation must be justified on the basis of need for a particular parcel of land, and is subject to appeal. Therefore, governments are likely to avoid the inconvenience, cost and adverse publicity by paying the market price. It has also been suggested that "because of the greater possibility of information leaks, government acquisition costs are likely to exceed private costs."\(^6\)

The example above indicates the importance of purchasing land well in advance of anticipated need. Estimates in this regard range from 15-20 years prior to required use. There are two real problems with this projected time frame: a) our experience with planning and predicting over this time horizon has not been very encouraging, and b) the proponents of public land assembly advocate it as a means of reducing the current high cost of land and thereby housing. This does not mean that land cannot be publicly purchased and used immediately. It does mean, however, that the real choice, in the case of the

\(^5\)Fleckner, Dennis and Fish, etc.

\(^6\)Jack Carr and Lawrence B. Smith, "Public Land Banking and the Price of Land," unpublished, p. 3.
twenty-two metropolitan centres in Canada, is between expropriation of peripheral land or leap frog development. Neither of these methods are likely to provide an avenue for reducing the high cost of land in the short run.

The more pertinent question is, however, whether land assembly would actually result in reduced land prices in the longer run if it were practical to use this method. For the sake of argument, it can be assumed that land has been acquired in the past. The price objective is to reduce the price of land for the consumer today. Assume that this hypothetical piece of land had been acquired for $100,000 and held for several years so that combined acquisition and holding costs totalled $140,000. If the market value at the present time for this same parcel of land is $200,000, the land agency would have two choices. It could sell the land for total cost or for market value. If the land is sold at market price, no over-all reduction in the price of land can be expected. If on the other hand the land is sold at less than market value, the government agency would actually be providing a subsidy (in this case of $60,000) to some selected beneficiaries.

In the very long run, this type of behaviour on the part of a public agency might lower the market price of

\[7\text{Op. cit.}, \text{S. W. Hamilton, p. 16.}\]
land, providing that large quantities of land were made available. The costs of literally glutting the market with serviced land would be enormous. On the other hand, if only small parcels of land were made available at any one time, the effect would not be one of price, but of distribution. Under the circumstances, it might be more viable to simply subsidize buyers in the private market, that is, subsidize some people so that they can purchase land at market prices. In that way the expense of setting up the required agency and tying up large sums of money in advance land acquisition could be avoided.

The CMHC memorandum quoted below demonstrates that prior to 1968, public assembly and development of land from the federal government's point of view, could only be justified if the land was used for public purposes:

The advantage of government developed land cannot be equitably passed on to the consumer without making it available in large quantities year after year to meet the demand; this would require expenditures of public funds at a very high level . . . . Its only legitimation . . . rests with . . . land uses of a public character: parks, civic buildings, low income rental housing, rental houses for senior citizens, etc.8

However, even if the land is only provided at below market prices for public purposes, the true costs are being disguised. Providing land at less than market value encourages

8Op. cit., Dennis and Fish, p. 318. In April, 1968 the federal government decided that land banks could be used as a method of restraining land costs.
the wasteful use of land, with less regard for possible alternatives.

To provide land for private purposes, such as low income housing developments, is again to subsidize certain individuals who may or may not be deserving of a subsidy. The price objective, as defined by proponents of public land assembly, is to reduce shelter costs in general, not to grant subsidies to a few select buyers who acquire public lands at less than market value.

Precautions can be taken to insure that purchasers fall into certain income categories and that certain restrictions are applied to resale opportunities. The question that then arises is, why not provide these individuals with outright income supplements which would enable them to purchase homes at the market price?\(^9\) The amount and the distribution of an income subsidy is readily determined and subject to scrutiny. If land at less than market value is provided, the amount of the subsidy is not as readily determined.

The proponents of public land assembly argue that one of the reasons for high land costs is speculation, that

\(^9\)Income supplements will cause an initial increase in the price of goods. This, however, will result in an increase in supply which should eventually modify prices. In one particular market such as housing, the price increase will not be great because individuals receiving income supplements will form a small share of the market, and therefore exert little impact on price.
is, the purchase of land in the hope of profiting by an increase in the market value of the land. There is, however, some question as to the validity of this argument. A study of the effects of speculation by J. Carr and L. B. Smith,\textsuperscript{10} concludes that speculators cannot increase land prices in the long run. The study is divided into two parts; the first deals with speculators who do not hold a permanent stock of land. In other words, the assumption is made that "equilibrium speculative holdings at the beginning and end of the full speculation cycle are zero."\textsuperscript{11} Under these conditions, land prices will rise at the beginning of the cycle and fall at the end of the cycle. The second part of the study assumes that speculators hold a permanent inventory of land. Under this more realistic assumption, speculation will result in a one-time increase in land price as speculators limit the supply on the market at one time. There is a possibility, however, that the individual holding the land is doing so in his role as developer and not in his role as speculator, because land inventory is a necessary input in the development process. This does not suggest that the developer is a non-speculator. It would be difficult to find a

\textsuperscript{10}Op. cit., Carr and Smith.

\textsuperscript{11}Ibid., p. 6.
group of pure non-speculators in the land market. Even if non-speculators were defined as participants in the land market who primarily need land for their own use, the decision of when rather than if to buy or sell will be affected by the expected price of land, and thus the non-speculator has in a broad sense some speculative motive in the timing of his purchases and sales.12

This same definition is applicable to a public agency. It is therefore possible to state that a land assembly program would replace private land speculators with public land speculators.

B. The Profit Objective

Proponents of public land assembly maintain that land and natural resources are the common heritage of mankind and that this implies public ownership, either of land, or of the economic rent derived from it. This is particularly the case where an increase in land values is due to public decisions and expenditures of capital. In many instances, the value of property is increased by the creation of public streets, highways and utilities. However, it is not solely the provision of services which adds value to a parcel of land, but also the mere permission to develop. Speculators who can afford to hold land because of low land taxes, are rewarded when urban growth forces

12 Ibid., pp. 11-12.
up the price of their land. Dennis and Fish ask: "Why should the advantage of that added value accrue to private interests who have done nothing more than purchase and hold the land?"¹³

Capturing gains to the public resulting from public investments is seen as a justifiable public policy. Whether land banking is the proper mechanism for achieving this goal, however, is open to question.

Given the nature of this paper, an in-depth analysis of alternative policies to capture increased land values is not possible. However, site value taxation will be examined as a potential and more easily implemented alternative to public land ownership.

The most common current method of taxation is based on buildings, although frequently buildings and land are assessed separately. Basically, site value taxation would simply shift the emphasis to land. A tax on buildings can be, and generally is in fact, paid not by the landlord but by the tenants in their rent.

A tax on land on the other hand, normally reduces the market price of the land by the capitalised amount of the tax. . . . A pure land tax is in effect a tax on the economic rent of land, using the term according to the classical Ricardian theory. Economic rent in this sense derives from the differential advantages of different pieces of land. . . . the economic rent of the

most valuable land represents the difference between its value and that of the marginal land. . . . To tax it, therefore, is simply to appropriate it for the community, and the proprietor who pays it cannot shift it to anyone else.14

This would mean that withholding land or retaining it underdeveloped, would be discouraged by means of high taxation. However, site value taxation applies not only to peripheral undeveloped land, but to high value central city land as well. If site value taxation were practised, it would no longer make economic sense to use central city land for parking lots and gas stations. Whereas it is now more profitable for a slum landlord not to improve his property, site value taxation would no longer make this a reasonable alternative. The over-all results of this method of taxation would be:

1) a more intensive use of the central business district;
2) a more extensive use of industrial land;
3) more rapid development of idle land (on the periphery of development); and
4) redevelopment in older areas.15

The advocacy of site value taxation does not imply that other methods of income, capital gains and property taxation should be abandoned. It is simply a suggestion that this method of taxation might discourage the holding of idle land for speculative purposes. At the same time,

15 Ibid., p. 295.
it is a means of capturing gains resulting from public investment, and administratively it is much more readily implemented than public land assembly.

C. **Financing**

Financing a public land assembly program cannot be treated in the simplistic manner suggested by Dennis and Fish, who state "expenditure would be fully recoverable loans." That type of argument ignores the supply and demand aspects of government purchase which can result in increased prices for raw land. For example, in order to be effective, a government agency must acquire a large initial stock of land. Therefore demand for raw land increases and if supply is not perfectly elastic, this will increase the price of raw land outside the assembly. Subsequently, the government land agency must replenish its stock. Again the competitive price of raw land outside the assembly will be higher because of increased demand, lessened supply and higher value expectations.

It can therefore be assumed that each additional parcel of land acquired by the land bank will cost more and thereby adversely affect the land bank's ability to carry out its primary goal of providing more land at lower costs.

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Ignoring the restrictions imposed by inelastic supply and the escalating prices of privately owned land, the Dennis and Fish study makes the following assumptions:

1) All housing needs should be met over the next ten years.
2) Four-fifths of the required units should be built in metropolitan cities, that is about two million units between 1972-1982.
3) In any given year, one quarter of the city's requirements must be marketed, in order to control land prices.
4) One half of the annual requirements should be publicly developed and marketed, resulting in a substantial increase in the amount of social housing produced.
5) The units should be spaced at ten units per acre. That would mean 200,000 acres are required annually.
6) Servicing costs are equal to $15,000 per acre.
7) Land costs are equal to $3000 per acre for fringe lands not in the immediate path of trunk services and about $10,000 per acre for lands in the immediate path of development.
8) Total acquisition costs vary between $600,000,000 and $2,000,000,000. Servicing costs total $1,500,000,000 plus sewer, water, trunk and road costs. As a rough estimate the total cost of $2.8 billion would be divided into loans totalling about $400 million annually in each of the first three years and then levelling off to $230 million per year.
9) Public loans would be repaid in full with interest at the federal government's borrowing rate.17

Dennis and Fish's treatment of costs does not specify the quantity of land to be purchased in each area, how they arrived at costs per acre or the effects of inflation on land costs. As a result, their estimated total cost of $2.8 billion

must be considered as a subjective approximation. The authors also assume an unlimited supply of financial resources are available under the National Housing Act legislation. In fact $83.7 million was made available for 1975 and $97 million in 1974. However, the municipal governments did not have the capacity to utilize all the funds available in 1974 and, as a result, some of these funds were diverted to other projects.\textsuperscript{18} It would appear, therefore, that federal funding is not the only problem faced by the municipalities. Dennis and Fish, however, ignore these and any other inherent difficulties and go on to suggest the following lending ratios by the federal government: "Two-thirds where the province would own and control the land banking program and one hundred per cent where there was municipal control."\textsuperscript{19} There is no effort to consider opportunity costs confronting any level of government or to suggest additional revenue sources to finance a program.

The latter problem has been considered by a number of American writers without any substantial results. Patrick Noonan suggests financing by insurance and underwriting companies with agreed upon fixed percentage profit.\textsuperscript{20} His suggestion, however, does not describe which mechanisms would

\textsuperscript{18}CMHC, Assembly Division, telephone conversation.

\textsuperscript{19}Op. cit., Dennis and Fish, p. 346.

be put into play to ensure a fixed percentage profit and how a predetermined profit margin would affect the selling price of the land.

Sylvan Kamm identifies the following potential sources of revenue:

1) transfer fees on real estate transactions;
2) allocation of capital gains taxes in connection with land transactions;
3) allocation of increments in property taxes resulting from increased assessments in land values.21

Although these are possible sources of revenue, they could not meet the total needs of a land assembly program. For example, the Province of Ontario collected a total of approximately $500,000 between April 9, 1974 and March 31, 1975 in connection with its Land Speculation Tax Act. From March 31, 1975 to October 31 the amount collected was $1,500,000 indicating a possible upward swing,22 however, much larger amounts would have to be collected in order to make a dent in Ontario land assembly requirements.

Kamm's first two suggested sources of revenue are generally collected by federal or provincial governments. Under the NHA, the initiative for undertaking a land assembly program rests with the local government which must seek approval of the provincial government. The provincial and


22 Director, Land Speculation Tax Act Division, Government of Ontario, Toronto, telephone conversation.
local governments must then apply to the federal government for funding of 75% of the project and agree to funding the remaining 25% jointly. However, the first two tax bases suggested by Kamm are not within municipal jurisdiction and the third suggestion is an inadequate source of funds.

Currently, municipalities receive 80% of their revenues, excluding grants, from property taxes. Because of continually increasing responsibilities and lack of an additional tax base, municipalities have been forced to increase property taxes on an almost yearly basis. These increments have been spent to maintain the status quo. To finance an expensive land assembly program, using the same revenue source, would appear to be unrealistic. Constraints on other activities would be even more severe.

Marion Clawson offers few explicit suggestions for financing but states that extensive data on the direction of growth, land transactions and price patterns are needed. He recognizes that the land bank would continually be paying higher prices for each new parcel of land acquired, which would result in either higher disposition prices or the need for subsidies. At the same time, if the value of the land not bought by the land bank increases, he suggests that the


additional tax revenues thus generated would help pay for the bank program.

The literature surveyed left numerous problems unanswered. For example, the only treatment of the cost of capital were references to interest costs. There was no treatment of opportunity costs.

Secondly, the literature surveyed has quickly become outdated. For example, Dennis and Fish stated in 1972 that public holding costs were lower than private holding costs because governments could borrow money more cheaply. This viewpoint was challenged in 1973 by Carr and Smith who maintained that the case was by no means clear. They showed that by 1973 the McLeod, Young, Weir average yield on municipal bonds was 8.54% compared to 8.47% for industrial bonds. Not only did the trend continue but the gap widened in 1974. The October 31, 1974 average yield on municipal bonds was 10.52% while the industrial bond yield was 10.40%. Increased government borrowing could reduce credit worthiness and result in continually escalating costs. In any case,

if higher borrowing costs were a major issue, a government agency could lend money to development corporations on the security of the land and avoid the ownership issue.

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27 McLeod, Young, Weir Investment Co., Ottawa office.
In the literature surveyed, there has been no serious attempt to deal with a) property taxes lost as a result of public land ownership, b) the management expenses of the program, or c) the slight but possible danger of land prices decreasing below acquisition cost. The treatment of land requirements has been extremely cursory and that of financing a program has been completely unsatisfactory. Until the proponents of public land assembly confront such questions, their proposals will lack viability.

D. Dichotomy of Purposes

It is necessary to mention briefly the dichotomy of purposes in the objectives advocated by proponents of public land banking. The planning objective, which will be examined in detail in Chapter II, requires that the land bank follow a comprehensive plan of acquisition, encouraging more compact development patterns and avoiding the expense of urban sprawl. The profit objective, on the other hand, if seriously pursued would have the land bank act as speculator to obtain the greatest return on investment. These two objectives suggest that a trade off may be necessary.

The situation becomes more complex when the price objective of providing land at a lower cost is considered. It has been demonstrated that one method of lowering the cost of land, is to sell land at less than market value, or, in other words, to subsidize some consumers. However, if
land is sold at less than market value, no profits are realized, no money is available with which to replenish the stock. At the same time, land prices are likely to increase with increasing demand. In other words, financing of the land bank would become increasingly more expensive.

Some proponents of land banking advocate long-term leasing as an alternative to purchasing of land. Presumably, the agency concerned would borrow money at the market rate and the rent collected would cover the interest payments and servicing costs. This method guarantees further land acquisitions through continued borrowing as long as leasing revenues cover borrowing costs. However, this procedure would have no effect on lowering costs to the consumer as market rates would determine rents.

Another shortcoming of this method is that it assumes that the concerned municipality has given priority to a land assembly program. Municipalities have the fiscal capacity to borrow only limited amounts. Concentration on a land assembly program may well curtail borrowing for other purposes.

E. Viability of Price and Profit Objectives

The price objective of public land assembly is to reduce the over-all price of land. Only by providing vast quantities of land, thereby flooding the market, can this objective be obtained. There is no empirical evidence,
however, to suggest how much land must be available at any one time. On the other hand, the most common procedure advocated by proponents of public land banking is the provision of smaller parcels of land at below market price. It has been demonstrated that this procedure is in fact a form of subsidy to a select group of consumers. Income supplements may provide a more controllable method of achieving the ultimate goal of providing private housing to a greater number of people.

The profit objective of public land assembly is a means of capturing the gains resulting from public investments in land. It has been shown that land banking is not necessarily the proper mechanism for achieving this goal.
CHAPTER II

Planning and Public Land Banking

Introduction

In this chapter the relationship between planning and public land assembly will be examined. The advocates of public land banking maintain that it is a very useful tool in the planning process because it guarantees control of the land. It enables planners to consider long time periods when developing an over-all urban growth strategy. According to the advocates' arguments, public land ownership can prevent urban sprawl, and balance the distribution of economic and demographic growth. Ownership enables a public agency to regulate land use, to protect the environmental qualities of land and to guarantee sufficient land for public purposes such as parks and schools. Finally, advocates of public land banking maintain that the timing—the sequence and tempo—of development can be guaranteed if land is publicly held.

On the other hand, the opponents of public land banking maintain that the desired goals can be achieved by other methods such as increased servicing, comprehensive and long-range planning which considers land use and develop-
ment of large sections of land, legal controls, fiscal incentives, zoning and subdivision controls.

In this chapter, current planning processes will be discussed. Following this, land banking as a component part of the planning process will be examined. Then land banking as a tool used independently or in conjunction with more traditional tools will be discussed. Finally, the political process in which planning decisions are made, will be examined in order to determine whether land banking will make an impact. It is hoped that this procedure will demonstrate, theoretically, that public land ownership is a useful tool in the planning process.

A. The planning process as it currently exists

The Ontario Economic Council (OEC) defines planning as:

first, the ordering of the use of land and the timing of its preservation, development or redevelopment; and second, the provision of planning advice on financial, racial and public service programs and work projects of various kinds.1

Unfortunately, the planning process as it currently exists is slow, complicated and not infrequently results in land uses which are determined by developers rather than in the public interest. Using the Ontario Planning Act as the

basic model of provincial and municipal behaviour, the planning process will be examined.

The Ontario Planning Act RSO 1970 (hereafter referred to as the Planning Act) is not atypical of provincial Acts. It is geared primarily to the municipal level although some mention is made of the provincial role in planning within regions; between regions where disparities exist; and with respect to over-all provincial planning.

The Planning Act outlines five main planning activities: 1) the preparation and adoption of Official Plans and amendments; 2) subdivision control; 3) preparation of plans of subdivision; 4) adoption of zoning, building and housing standards bylaws; and 5) preparation of redevelopment or urban renewal plans.

The Official Plan (§1 above) is a broad statement of objectives and principles regarding the regulation and control of future growth and development of a municipality. It is intended to encourage coordination among the political, social and technical actors in the development of the community. At the same time, it integrates some professional and technical knowledge into political decision-making. For example, a standard for park space may be specified in acreage per 1,000 population, but specific zoning for parks will not be included in this document. The Official Plan

2 Some of the differences among provincial Acts are noted in Appendix A to this chapter.
places municipal council decisions in a long-range perspective in an effort to achieve greater consistency and continuity over time.

The first step in developing an Official Plan is to apply to the Minister of Municipal Affairs for definition of a planning area. The Minister defines the planning area which may be one municipality or part thereof, or a joint area consisting of two or more municipalities. Following this, the municipality(ies) appoints a planning board which again, requires the approval of the Minister. Finally, the municipal planning department prepares alternatives of an Official Plan which are presented to the planning board, who decide on one Official Plan. This plan is presented to the municipal council for approval and adoption by means of a bylaw. The council, of course, is not forced to accept the recommendations of a planning board. There are a number of examples of jealous, distrustful or uninterested councils ignoring, procrastinating or diluting the work of planning boards. However, if the plan is accepted, it is then forwarded to the Ministry of Municipal Affairs for final approval.

The entire process regarding the preparation and adoption of an Official Plan is presented graphically below.

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The preparation and adoption of an Official Plan

<table>
<thead>
<tr>
<th>Steps by the Province</th>
<th>Steps by the Municipality</th>
<th>Steps by the Planning Board</th>
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<tbody>
<tr>
<td>Decision to prepare or revise Official Plan</td>
<td>Engage Planner</td>
<td>Conduct surveys and analysis</td>
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<td>Prepare Draft Official Plan</td>
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<td>Public meeting</td>
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<td><strong>Review of Draft Plan by Municipality</strong></td>
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<tr>
<td><strong>Review of Draft Plan by Province</strong></td>
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<tr>
<td>Public meeting</td>
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<td>Revise Draft Plan</td>
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<td></td>
<td>Recommend Official Plan to Council by resolution</td>
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<td></td>
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<td>Adopt Official Plan Bylaw</td>
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<td></td>
<td></td>
<td>Submit Official Plan to Minister</td>
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<tr>
<td><strong>Circulation and Review of Official Plan by Minister</strong></td>
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<tr>
<td><strong>Advertise on Minister's comments</strong></td>
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<tr>
<td><strong>Consideration of Minister's comments</strong></td>
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<tr>
<td><strong>Approval of Official Plan by Minister</strong></td>
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It involves only the province, municipality and planning board and not the development industry.

However, it is not uncommon for the development industry to approach the municipality while it is preparing the Official Plan, and begin to exert pressure for consent to sever the land. The pressure is exerted at this stage because developers are fully aware that following the adoption of an Official Plan, subdivision will take place. The adoption of an Official Plan can take one to three years, and subdivision approval can take one to three years, so an effort to have both processes moving simultaneously is frequently made.

The second planning activity, as outlined in the Planning Act, is subdivision control which can take the form of either: a) approval of plans of subdivision, or b) a general subdivision control bylaw. Both these steps discourage rapid growth but at the same time are a means of avoiding poor planning.

A general subdivision control bylaw means that a person may not sell a piece of his property—that is, his land may not be severed. It is a means of enforcing a temporary no growth policy. Unfortunately, it may stop growth for longer than anticipated or permanently, if a neighbouring municipality accelerates its growth rate.

Plans of subdivision are a less drastic method of controlling growth. These plans are a means of regulating
the division of land for sale or for long-term lease. In
the pre-application stage, the developer begins a feasi-
bility study of the economic, physical and legal conditions
which are involved in subdivision. He must clarify what is
being undertaken for and by the owner, the developer and
the municipality. He then submits a formal application for
approval to the Minister—not to the municipality. This
pre-application and application stage alone can take up to
one year.

Next, an agreement is drawn up between the developer
and the municipality which specifies the conditions which
must be met.

Although all approvals are vested in the Ministry
by the Act, the fixing of the design and the
setting of the conditions are left to local deter-
mination wherever municipal capability makes such
delegation practical. 5

This includes the staging of the development, the access
and egress provisions, the owner/developers' contribution
to service costs, servicing and site treatment standards
and responsibility for or demolition of existing buildings.
The signing of the agreement is accompanied by a draft
approval for subdivision. (The draft approval process (A)
is illustrated below. 6) Having received draft approval,
the developers can begin a final survey of the area and do
rough site work.

Draft plan approval process

E.g., Scarborough subdivision
After draft approval has been received and rough site work completed, the final approval process is initiated. Although the exact procedures may vary from municipality to municipality, the diagram (B) below will provide some indication of the long process involved.\footnote{Op. cit., \textit{Subject to Approval}, p. 64.}

Before building permits are issued, most municipalities require substantial completion of underground services which usually requires an additional four to six months of labour. Thus, when he files his subdivision application, the builder-developer is actually forecasting consumer demand, municipal requirements, availability of money and mortgage rates at least three years away.

Delaying the process still further, is the necessity of zoning bylaw changes. Most potential development land is zoned for agricultural use only, even if it has not been used for active farming in recent years. This zoning assures lower taxes than would be forthcoming from residentially or commercially zoned land.

A zoning change is long and complicated. First, the planning board must notify all property owners within 400 feet of the area concerned of an impending hearing. At the hearing, any objections to the subdivision development are heard and, if necessary, amendments are made which may involve the developers, the municipal planning staff and
Final plan approval process

e.g., Scarborough subdivision

Approved Draft Plan - Applicant's surveyor prepares final plan

Copy to Applicant's lawyer prepares deeds for school sites etc. secures maintenance & Performance bonds

Copy to

Local planning board staff prepares any zoning amendment

Copy to Applicant's engineer prepares drawings

Munpl. engineering dept. for approval

Munpl. clerk prep. subdivision & site plan agrmts.

Applicant signs agrmts., pays levies

Council approves agrmt., passes zoning amendments.

Clerk notifies Ministr. all condns. fulfilled

Zoning bylaw to OMB Notice of approval

Ministr. signs plan - plan registered

Engineering plan circulation out to those affected

Local RUC or Hydro

Metro Works

Metro Roads

Any Railway

HEFC

Priv. utilities Ntl. Energy Board

OWRC

Approvals back
other municipal departments (e.g., roads and public works). If there are not any objections to the zoning change, the bylaw is presented to the municipal council, from whence it is sent to the Ministry of Municipal Affairs and finally to the Ontario Municipal Board (OMB) for approval. (A diagram of the zoning process as it occurs in Toronto will provide some indication of the steps involved.8)

The Ontario Municipal Board is an extremely powerful body, which, in addition to granting final approval for all zoning changes in the province, also is a) the final appeal tribunal and principal arbitrator in assessment matters; b) validates municipal debenture bylaws; c) creates, dissolves and amalgamates municipalities; d) approves all capital expenditures of municipalities; and e) is the board of appeal for actions initiated under the Planning Act.

The OMB, therefore, will have had several encounters with the concerned municipality before final subdivision approval is granted. If the municipality accepts financial responsibility for any infrastructure as a result of the subdivision, approval must be received from the OMB. And if, as usual, capital expenditure requires the municipality to float a debenture, the details of the probable financial transactions must be submitted to the OMB.

Once the zoning changes and any municipal financial transactions are approved by the OMB, and the final surveys

8Op. cit., Subject to Approval, p. 75.
## The preparation and adoption of a Zoning Bylaw

<table>
<thead>
<tr>
<th>Steps by the Province</th>
<th>Steps by the Municipality</th>
<th>Steps by the Planner</th>
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<tbody>
<tr>
<td>Decision to prepare or revise Zoning Bylaw</td>
<td>Engage planner</td>
<td>Study planning requirement for Bylaw</td>
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<tr>
<td></td>
<td></td>
<td>Prepare Draft Bylaw</td>
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<tr>
<td>Review of Draft Bylaw by municipality</td>
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<td>Revise Draft Bylaw</td>
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<tr>
<td>Adoption of Bylaw by Council</td>
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<tr>
<td>Application to Municipal Board for approval</td>
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<tr>
<td>Publication and notification of Bylaw as directed by Municipal Board</td>
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**Review of Bylaw by Planning Branch**

- Recommendations on objections by planner
- Report to Municipal Board

- Municipal Board public hearings
- Municipal Board decision

- Prepare Bylaw amendment if needed

- Adoption of amendment by Council
have been completed, a request for final approval is submitted to the municipal planning board. The entire procedure will have taken an average of three years to complete.

It has been assumed in the foregoing discussion that the municipality concerned exceeded 5,000 in population and had its own planning department. A rural township of 5,000 people or less would hardly be in a financial position to hire planning staff. It would therefore be required to depend on the Regional Development Branch of the Treasury Ministry, the planning arm of the province. The Regional Development Branch provides the necessary expertise, but very frequently development is further delayed.

It has also been assumed that building and housing standard bylaws have not required change specifically to accommodate the potential development. If the new development is innovative in design, it is quite possible that certain standards would have to be changed. This would result in a bylaw amendment which would again involve the planning board, municipal council and OMB, and would result in further delay.

The results of these long and involved processes have been recurring criticisms:

The designs are poor, with dull and stereotyped environments the all-too-frequent result. The process is slow, resulting in additional carrying costs which must be passed on to the ultimate consumer. . . . the conditions attached are unduly
onerous, adding to the burden of the eventual consumer.9

Rather than tackle the process as it now exists, and try to improve it, the advocates of public land assembly suggest that the planning process should begin on another basis—the public ownership of land.

B. The planning process and public land banking

The advocates of public land assembly often insist that planning and advance acquisition are inseparable parts of a single set of objectives,10 because planning determines land use and the timing of development, while public ownership guarantees control of land use and the timing of development. The proponents of public land banking suggest that public ownership of land will guarantee that various dimensions, spatial, social, environmental and economic will be taken into account during the planning and preplanning process. They believe that public ownership guarantees more public input and more emphasis on the "public interest" as opposed to developers' interests.

The position of public land assembly proponents has been well articulated and sophisticated models have been drawn up to demonstrate how the planning process can be integrated with public land ownership. For example, Norman


Pearson has developed a model in which planning, servicing, land use, timing of development and ownership are coordinated. An outline of the model is presented below:

The Norman Pearson Model

The first objective would be to build up an initial inventory of 10-15 years of land supply.

By year 10 development should be moving ahead at such a rate as to use the first part of the inventory while the second part is being readied for development. By year 15, ideally, the first phase of development should be completed and the inventory again be augmented by a further 10-15 years' supply.11

Public acquisition of land will require in the public sector the skill of a speculator or entrepreneur to know where to buy land, how much land to accumulate, what price to pay, how long to hold the land and when to sell or lease it. The following information would have to be compiled:

a) Land needs, demands and supply;
b) Demographic forecasts;
c) Dwelling unit requirements;
d) Areas to be developed (location and phasing);
e) Financial, planning, servicing, social and other resources needed to carry out the programmed housing development.12

One method of compiling this information would be for the province to require local authorities to submit.


long-range plans which included all the necessary data. Their long-range plans could then be coupled with a "land banking plan" which included the following elements:

a) Inventory on hand;
b) Inventory under option;
c) Areas planned for land banking;
d) Areas planned for "Cycle I" (10-15 years) development;
e) Development periods for "Cycle II" (15-30 years) and land supply intended;
f) Costs of present land holdings;
g) Costs for future land purchase;
h) Financial proposals for acquisition;
i) Management plans for land bank;
j) Disposition strategies;
k) Specific alternative interim use proposals.13

The final step would be to move the analysis forward into the predictive and development stages as a guide to public policy decisions:

a) Locate total space and land needs for public purposes;
b) Develop a "commanding position" strategy, that is, a position in which the public agency will influence market behaviour;
c) Set out the actual area needed, location and housing volume allocation in stages.14

These procedures would provide a guideline in the design stage and would be useful in setting up development agreements.

Critique of the Norman Pearson Model

This type of comprehensive planning and timing of development done by the same agency which owned the land

could result in the provision of well planned and serviced land at a rate which adequately met demand. However, there is no reason why certain aspects of the model could not be applied to a situation in which long-range planning was undertaken by the public sector while land was privately owned.

For example, Provincial governments could compel more long-range comprehensive planning by and for cities, municipalities or regions which would make use of data regarding land needs, demographic forecasts, financial resources required, etc. The machinery for such planning is already in place, but at the present time the input into Official Plans is not as comprehensive as the input suggested for the Pearson Model. In addition, whereas the onus for subdivision plans rests with the private developer at the present time, it could be shifted to the public sector. Although there is not much public input at the present time, in the form of recommendations and suggestions from area residents or community groups, there is no reason why the situation could not be changed.

Pearson's recommendation for cyclical planning could also be introduced into the model currently in use. For example, Official Plans could be divided readily into stages: Stage I might consider development over a 10-year period while Stage II could consider development over a 30-year
period. Once a sophisticated plan had been formed, all information could be made public. Landowners and developers would be aware of development patterns, the rate of subdivision approvals and the rate at which servicing would take place. Developers could then be asked to sign agreements to develop in accordance with the public plan and at a rate determined by the public sector. Knowing the rate of development would reduce costs and uncertainties for developers which should encourage their compliance with long-range planning techniques.

Comprehensive long-range planning involving both the public and private sectors could go a long way towards ensuring that land use and the timing of development was controlled by the public sector and at the same time would avoid the enormous expenses of public land acquisition.

The second criticism which can be directed at the Pearson model is that it makes no attempt to justify the cost of a comprehensive land banking and planning program.

There is little doubt that initial costs for large-scale intervention are high: they are even higher if the intervention is for virtually immediate results. As an example, the Lithwick Report noted the need for land in the period 1971-2001 in Toronto... Vancouver... Montréal to be between 1425 and 1550 square miles. To purchase even 25% of this... at $5000-10,000 an acre the acquisition outlay would range from 1.3 to 2.5 billion dollars.

\[15\] Op. cit., Pearson, Land Banking: Principles and Practice, p. 5. The estimate of 1.3 to 2.5 billion dollars required to purchase 25% of the land required can be compared to the 1973 Federal Budget which totalled 18.4 billion dollars.
The Lithwick Report cost estimates may be moderate to low because they do not take into consideration the consequences of public land banking where the site is announced in advance. For example, in Pickering, Ontario a site of 25,000 acres was originally proposed for a town to be built in conjunction with the airport (now cancelled).

... $24 million were set aside for land costs. At the point where about 10-15% of the land had been assembled, costs exceeded $40 million. The site is now being cut back to 15,000 acres and total end costs are forecast to range from $240 million up to $400 million. It is difficult to see how this has any public advantage whatsoever.16

A public land banking agency will automatically be in competition with large-scale private land banking, and with persons buying small parcels of land. Competition for the same land will inevitably bid up the price. Unless public land banking is accompanied by a law forbidding large-scale private land banking, the competition for a scarce resource will continue and the price of land will continue to be high.

The objectives of any agency intervening in the land market must be clearly understood. The objectives of well planned communities and an adequate supply of serviced land are viable. However, land banking is an expensive means of achieving these objectives. It is a tool which can be used, but, at least from an economic viewpoint, it appears to be an inefficient tool.

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C. Land banking as a control tool

The proponents of public land banking maintain that public ownership of land should replace current control tools or should be used in conjunction with them. There are a variety of tools available to municipalities for controlling land use, and most of these tools can be justifiably criticized.

Land use control tools fall into three broad categories: permanent controls, long-term controls and short-term controls. Permanent controls, which have not been mentioned before in this paper, include crown lands and mineral rights both of which fall under federal and/or provincial jurisdiction and are beyond the scope of this paper.

Long-term controls include provincial planning Acts, easements, covenants, official plans, subdivision control and zoning bylaws, subdivision and developer agreements and zoning.

Short-term controls include holding and temporary bylaws, the granting of building permits and time limitations on development.

The following discussion will concentrate on long-term controls.

1. Planning Acts

The planning procedures outlined by the provincial planning Acts are time-consuming and frustrating. In order
to develop an Official Plan for an area, go through the subdivision procedure and zoning changes, receive development approval, and proceed with servicing, a minimum period of five years is required. To simply register a piece of land for development can require up to thirty separate steps.\textsuperscript{17} In addition, there is frustration on the part of developers who have to receive 10-40 approvals from one government source before development can proceed, or stand aside as officials from different government levels quibble over detailed planning judgments.\textsuperscript{18}

In what way could public land banking supersede provincial planning Acts or be used in conjunction with planning Acts to simplify the procedures involved?

If the provinces are to maintain control over the broader issues of environmental protection, continuity and quality of services, etc., there must continue to be at least two levels of approval for municipal planning—the local level and the provincial. At the current time, both these levels are concerned with technical requirements such as transportation, education, and utilities. Both levels subject draft plans to scrutiny by individual departments and this procedure takes time. However, this departmental scrutiny is a requirement of comprehensive planning.

\textsuperscript{17}Op. cit., Federal Task Force on Housing and Urban Development, p. 44.

The technical input in the planning process is coordinated at the provincial level by a Community Planning Branch of the Municipal Affairs Department or Ministry. At the local level, the municipal planning board coordinates recommendations.

These types of comprehensive procedures outlined in provincial planning Acts are intended to guarantee provincial standards. If land were publicly held in land banks, the procedures would not be changed; each step in each procedure, however, would possibly require less time. For example, in the steps outlined for subdivision administration, the technical requirements could be met without any concern for rights of way or egress and access provisions.

On the other hand, a process known as Replotting, which was developed in Saskatchewan and has been used in Manitoba, can also be used to guarantee technical rights of way. Replotting involves pooling all land for planning purposes and then redistributing it on a lot-by-lot basis after planning has been completed.\(^{19}\)

In other words, public land banking can be used in conjunction with provincial planning Acts but would do very little to make the procedures set out in the Acts more efficient or more effective.

\(^{19}\)Replotting will be discussed in greater detail in Chapter III - Saskatoon.
2. Official Plans

Official plans can be as comprehensive as local municipalities wish to make them. They were intended to be the basic planning instrument and the central pivot for all municipal planning activity. In most provinces they have tremendous scope, with provisions made for the acquisition of land by municipalities:

For the purpose of developing any feature of the official plan, a municipality, with the approval of the minister may at any time and from time to time:
a) acquire land within the municipality;
b) hold land heretofore or hereafter acquired within the municipality; or
c) sell, lease or otherwise dispose of land so acquired or held when no longer required.20

However, the Ontario Economic Council's review of municipal planning found that taken together, official plans have been the least successful product of the municipal planning process in a qualitative sense. . . . the fact remains that a disturbing percentage of municipal official plans are incomplete, inflexible and not especially well done.21

What is missing in most instances, therefore, is not the tools, but the initiative. Local municipalities can by law acquire public lands for planning purposes but have not been inclined to do so. A change of attitude towards planning must occur before land banking will be used as a tool in the planning process.

The initiative for planning rests with the individual municipalities. If a municipality cannot or will not plan, the provincial Minister cannot force it to, or do the planning himself. Therefore an innovative, comprehensive and long-range attitude towards planning is completely dependent on local councils, planning boards, and planning departments.

Ownership provides a straightforward access to control but without an innovative council or planning department, ownership has not been used to accomplish anything normally outside the reach of planning and subdivision regulation.22

In summary therefore, land banking can be used in the development and enactment of Official Plans. It has been used on occasion to acquire land for public uses, such as city or municipal buildings, schools and sometimes parks.23 For the most part, however, initiative on the part of local planning authorities has not been forthcoming. The tools are available but have not been used.

3. Subdivision Controls

Requests to subdivide land are initiated by developers. Permission to develop land cannot be given by the authorities at a greater rate than developers request it. And no city


23 Quite frequently developers are required to set aside a percentage of land for parks or recreational purposes. Location of "park" land within the development is determined by the planning board in consultation with the developers.
hall can force a developer to turn approved land into housing lots faster than he wants to. As a result, the timing of development is controlled by developers and not by the public sector. However, if the land were publicly held, the sequence and timing of development could be controlled by the public sector. Artificial shortages of land and housing could not be created.

There have been instances where agreements to develop within a specified time frame have been effective. For the most part, however, it would simplify matters if the sole responsibility for matching supply with demand was in the hands of a public agency which owned, serviced and released the land. Therefore, public land banking could play a useful part in the subdivision process in that it can be a useful tool in the timing of development.

4. **Zoning**

Zoning has been criticized as being ineffective in controlling urban growth, as being a static prohibitive control and one that cannot change quickly enough with changing community goals. Specific criticisms of zoning include the following:

1. It cannot account for market forces.
2. It is too inflexible where new land-use types are developed.
3. It cannot remove nonconforming uses.
4. It is weakened by spot zoning and variances.
5. It is inflexible in terms of the time required to change the zoning ordinance.
6. It is difficult to administer, requiring the obtaining of many consents.
7. It has been used for negative purposes such as segregating economic, social, and racial groups.
8. It designates zones in vacant areas with no basis in fact for the "proper or likely future land use."
9. It cannot encourage desired land uses.24

There are at least two courses of action which may be considered on the basis that some of the criticisms listed above are valid. First, it is possible to improve zoning ordinances as they are currently constituted. The deficiencies inherent in the system can be corrected, new techniques can be developed. Most important, zoning can be used as a tool of comprehensive planning. That is, "the proper or likely future land use" can be determined before zoning ordinances are passed.

Secondly, zoning can be replaced by public land ownership in conjunction with public planning. Zoning would remain in place in either an improved form or in its current ineffective form, where land was privately held. Where land was purchased by a public authority, zoning would be superceded by public sector planning. This would enable one authority to determine land use patterns. This authority would be able to impose its plan because it had control through ownership.

5. Land banking as a control tool: conclusions

Public land banking can be an effective control tool used in conjunction with comprehensive planning. In

many instances provincial legislation allows for the acquisition of land by municipal authorities for planning purposes. Therefore the tool is available for use, but attitudes toward planning must change. The "negative minutia dictating minimum lot sizes, setbacks and other requirements virtually inconsequential from a planning viewpoint" and abhorred by the 1969 Canadian Task Force on Housing, must be replaced by a "grand design." A co-operative approach to planning must replace the "adversary" approach which characterizes current practices.

The planning process has become an adversary proceeding in which municipalities attempt to extract concessions from developers and administrators, who have been burnt in the past by sharp practices, continually review proposals looking for holes.

If public land ownership is accompanied by an over-all urban growth strategy it can be an effective tool in the planning process, particularly with respect to the timing of development. Zoning and subdivision controls have been ineffective in determining the timing of development. Public land ownership accompanied by long-term planning may be more effective.

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25 See Appendix A.


D. The political process and public land banking

Its advocates often insist that planning will be improved by the introduction of public land banking. But planning is not simply a technical process. It is intimately associated with politics. In order to understand why certain planning decisions are made which appear to favour the private developer and ignore the "public interest," it will be necessary to briefly examine the political process as it currently exists. Then an effort will be made to see if the planning decisions can be expected to change in a non-changing political environment.

1. The current political process

City planning is a political activity which is injected into this basic social process in order to alter the pattern of urban growth in ways thought desirable at a particular time.28

One of the key words in the sentence quoted above is "political." The planner cannot carry out his own plans, but must rely on the politician, as the final decision-making authority. What is important to realize is that planners and politicians frequently base their recommendations on different decision criteria. The politician takes into account the supports and demands of competing forces while the planner, on the other hand, "seeks to form arguments

that refute special interest groups in favor of benefits to the elusive public interest.\textsuperscript{29} The planner deals with long-range proposals based on planning techniques and aesthetics both of which can change over time. For example, currently peripheral development with its cheaper initial transportation and infrastructure costs is favoured over leap-frog development. However, only a few years ago, self-contained satellite communities surrounding a major urban centre were advocated because their rural settings could provide an alternative life style and because the proximity to the work place reduced transportation costs. Choices between these alternatives had to be made in the political arena and were based largely on political criteria.

The political process is more concerned with short-term benefits,\textsuperscript{30} political power and equity. The politician is concerned with satisfying the needs of special interest groups\textsuperscript{31} rather than in defining the general public interest.


\textsuperscript{30}Politicians want to point to achievements in the short run in order to impress the electorate and guarantee re-election for themselves.

\textsuperscript{31}An 'interest group' is defined as a group of people who have combined to present a particular viewpoint to a political body in an effort to sway opinions and decisions. There are powerful interest groups such as the development industry which is well funded, articulate and specific in its demands. There are also community interest groups which are not financially 'stable, present diffuse viewpoints and are usually aroused only when their interests are threatened.
There are a variety of interest groups who attempt to influence politicians. Of these, land developers comprise one of the most powerful and articulate of groups. James Lorimer, in his book *A Citizen's Guide to City Politics*, has demonstrated that developers have many friends and allies on city councils, planning boards and development authorities. He has also shown that in many cities, a substantial percentage of the local politicians are in the real estate and land development business themselves, and that many more receive active support from developers.

Under these conditions, that is: a) where there is a strong sense of identity, common goals and aspirations between the interest groups (developers) and the politicians; b) where the groups' (developers') demands are specific; and c) where there will be no demonstratively harmful effect on the articulate public, (for the most part, the middle class), then the groups' (developers') demands are met. For the most part, the demands of the middle class are also being met because the middle class votes, financially supports politicians, and is articulate when crossed. It is the inarticulate urban poor who are not involved in the political process whose demands and needs are frequently by-passed.

In smaller urban centres which are just beginning to develop, the situation is somewhat different but the results similar. Smaller municipalities are anxious for
development because it alleviates tax problems, but quite often they have no policies or comprehensive plans for development or bylaws for implementing plans. These municipal councils are unable to cope with the pressures for development and are unaware of many of the problems which may arise. One issue, however, has been mentioned frequently and has had an impact and that is financing the servicing in early development stages.

In explaining the situation to the Federal Task Force on Housing in 1969, The Mayor of Scarborough stated that a minimum space requirement of 1,200 square feet was necessary for single family dwellings because that size of house provided the minimum assessment return necessary to carry municipal education and welfare costs.\textsuperscript{32}

As a result of the need to meet the financial costs of development through property taxation, middle-class housing predominates in areas adjacent to small municipalities. However, there may be another explanation for the prevalence of middle-class development over mixed-income developments:

In many cases also town and village councils are made up of conservative landowners who do not have a high regard for zoning or other development controls.\textsuperscript{33}


These men are accustomed to a tradition of private land ownership which allows the landowner to do as he pleases with his land. Interference by planning boards is not tolerated beyond the well-established municipal responsibility of providing roads, sewers and water.

2. The political process and land banking

There is no reason to suggest or expect a change in emphasis because of the introduction of public land banking. The composition of municipal or city councils, planning boards, and provincial government departments will not change. They will continue to react to pressure "in ways thought desirable at a particular time."\(^{34}\) They will continue to react favourably to the demands presented by developers because those demands are clearly focused, and repeatedly presented by well-financed organizations. They will not react to occasional public inputs which are diffuse, disorganized, difficult to sustain and costly to articulate. It is unfair to expect land banking on its own to change an entrenched decision-making process.

It is also futile to condemn city councils because the elected politicians are in the real estate and land development business themselves or are sympathetic to those needs. Politicians can be opposed at each election, but the apathy of the electorate at large and the unwillingness

of many people to stand for election, suggests that the status quo meets the needs of the majority of citizens.

In other words, the public input will not increase or significantly change if the land is publicly held. There will continue to be a dependence on the planning departments, planning boards, municipal and city councils and provincial boards. These people are publicly elected or require the approval of publicly elected boards and therefore should express the "public interest."

In the final analysis, there will be innovative planning which considers the needs of all citizens, if the planning departments and councils are innovative, and adequately financed, both matters completely independent of land ownership. The matter of innovativeness and awareness of the needs of all citizens can only be solved through the electoral process. What must be realized is that planning and the political process are separate entities but that planning decisions are frequently based on political criteria. The situation will not be improved by providing planners with land ownership as a control. It "may" be improved by making the political system more responsive to the public interest.

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35A system which depends solely upon property taxation for the provision of services is going to meet only the needs of the wealthier land owners. Therefore, a reappraisal of the municipal taxation system may be in order.
E. Conclusions

Public land banking is not a necessary tool in the planning process but it may be a useful, though expensive, tool in reaching planning objectives. In order for land banking to be effective in the planning process, the objectives of the assembly agency must be clear. Land banking cannot replace good planning, nor can it change the inputs received by or reacted to by the part of politicians who are asked to make decisions regarding urban growth and development. But land banking can be used to replace other land use controls. It can be very effective in determining the timing of development. However, it must be used in conjunction with good planning which considers the spatial, social, environmental and economic dimensions of development. It is an extremely expensive tool which requires a considerable accumulation of land over a long period of time and can also cause increases in the price of private land. Land banking must be directed by an efficient management which has developed a comprehensive strategy for purchases and withdrawals of land.

If all these qualifications are met, land banking can be an effective tool in urban planning. Whether the results justify the expenditures required, is another matter.

The discussion in this chapter has been based on theoretical assumptions regarding land banking as a tool in the planning process. The next step in the evaluation is
to examine actual projects where land banking has been used to determine whether the benefits claimed for public land assembly have been achieved.
CHAPTER III

Case Studies

Introduction

In this chapter four relatively large Canadian land assembly projects will be examined. In each instance, a background to the project will be presented, following which the price and profit impacts will be discussed. Slightly more emphasis will be given to the planning objective because it has been de-emphasized in the literature.

In keeping with the methodology developed in Chapter II, each land assembly project will be examined: a) to determine the political input and methods employed in planning; b) to determine whether planning, that is, land use and the timing of development were improved because of the public ownership of land; and c) to determine the extent to which public land ownership is a useful control device, either superimposed on or used in conjunction with traditional control devices such as zoning and subdivision regulations.

Case Study No. I: Saskatoon

A. Background

The existence of the Saskatoon land banking program is well known and it is frequently held up as a shining
example of how government involvement in land assembly can be an effective means of reducing housing costs. For example, the Federal Task Force on Housing cited Saskatoon as a positive instance where municipal government has been able to provide land for private development at reasonable prices while at the same time planning the development pattern in a comprehensive sense.1

However, a close examination of the way Saskatoon's land bank functions reveals that most of the claims made for it simply don't hold up.

Saskatoon's current land development policy had its origins in the boom years of 1910-1913. During this period, Saskatoon's population rose dramatically from 113 in 1903 to 18,096 in 1911 and 27,527 in 1912.2 This increased population increased the demand for housing and land—and the speculators were in business. "In the peak year of 1912, there were 267 real estate firms operating in the City."3 But the boom was short-lived with the result that the majority of unoccupied land held speculatively reverted to the city when the taxes were not paid. This process began shortly after the boom and continued at an accelerated rate during the depression of the 1930s and early 1940s.

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Initially at a very slow rate, and then more rapidly during the postwar building boom, the city sold off the land it had acquired through tax defaults. Between 1920 and 1954, the total receipts from these land sales totalled $3.5 million, a very profitable windfall for the city and also a financial base for the city's initial land acquisitions.  

In 1955, after nearly 35 years of experience in retailing land, the City of Saskatoon initiated a formal land banking program. Between 1955 and 1969 the city purchased 7,000 acres of land (Tables 1 and 2 below), with the purpose of reselling the land for residential, industrial or commercial purposes.

Saskatoon happened into a land banking program. However, the City has since articulated six benefits which can be attributed to the program and which justify its continuance. These are:

1. To realize a profit as a result of municipal involvement in land development and to use the profit to purchase additional land and to make capital expenditures.
2. To reduce land prices significantly below market prices.
3. To encourage low cost housing.
4. To reduce speculation on fringe urban land.
5. To provide land for anticipated transportation, recreation, institutional and commercial needs.
6. To provide a comprehensive control regarding the direction and rate of municipal growth.

\[4\text{ Op. cit., Ravis, p. 18.}\]
\[5\text{ Op. cit., Ravis, pp. 26 and 27.}\]
\[6\text{ Op. cit., Ravis, p. 26.}\]
TABLE 1

EXPENDITURES FOR SASKATOON MUNICIPAL LAND HOLDINGS 1955-1972

<table>
<thead>
<tr>
<th>Period</th>
<th>Total Area of Purchase (acres)</th>
<th>Total Land Expenditures</th>
<th>Price per Acre</th>
<th>Cumulative Total Land Expenditures</th>
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</thead>
<tbody>
<tr>
<td>1955</td>
<td>300¹</td>
<td>$100,000.00</td>
<td>$333.00</td>
<td>$100,000.00</td>
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<td>1957</td>
<td>375</td>
<td>106,415.00</td>
<td>262.00</td>
<td>206,415.00</td>
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<td>305</td>
<td>76,250.00</td>
<td>250.00</td>
<td>282,665.00</td>
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<tr>
<td>1959</td>
<td>1007</td>
<td>342,076.00</td>
<td>332.00</td>
<td>624,741.00</td>
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<tr>
<td>1960</td>
<td>628</td>
<td>257,250.00</td>
<td>350.00</td>
<td>881,991.00</td>
</tr>
<tr>
<td>1961</td>
<td>160</td>
<td>112,000.00</td>
<td>700.00</td>
<td>993,991.00</td>
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<tr>
<td>1962</td>
<td>Nil</td>
<td>--</td>
<td>--</td>
<td>--</td>
</tr>
<tr>
<td>1963</td>
<td>698</td>
<td>245,000.00</td>
<td>351.00</td>
<td>1,238,991.00</td>
</tr>
<tr>
<td>1964</td>
<td>968</td>
<td>366,658.00</td>
<td>378.00</td>
<td>1,605,649.00</td>
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<td>1965</td>
<td>148</td>
<td>44,472.00</td>
<td>300.00</td>
<td>1,650,121.00</td>
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<td>1966</td>
<td>277</td>
<td>568,715.00</td>
<td>2,100.00</td>
<td>2,218,836.00</td>
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<tr>
<td>1967</td>
<td>490²</td>
<td>311,182.00</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>x 5 percent</td>
<td>15,559.00</td>
<td>640.00</td>
<td>2,234,395.00</td>
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<tr>
<td>1968</td>
<td>38³</td>
<td>450,930.00</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>x 5 percent</td>
<td>22,546.00</td>
<td>1,232.00</td>
<td>2,968,306.00</td>
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<tr>
<td>1969</td>
<td>932</td>
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<td>793.00</td>
<td></td>
</tr>
<tr>
<td>1970</td>
<td>Nil</td>
<td>64,822.00</td>
<td>790.00</td>
<td>3,033,128.00</td>
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<tr>
<td>1971</td>
<td>Nil</td>
<td>64,822.00</td>
<td>790.00</td>
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<tr>
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<td>Nil</td>
<td>64,822.00</td>
<td>790.00</td>
<td>3,033,128.00</td>
</tr>
</tbody>
</table>

¹Part of the original incorporation of fringe area purchased from the Rural Municipality of Cory as 4300 25' lots, which they acquired by tax default.

²CMHC Partnership Holdings, City of Saskatoon contributing 5 percent.

³CMHC Partnership Holdings, City of Saskatoon contributing 5 percent.
# TABLE 2

**AREA EXPANSION OF SASKATOON MUNICIPAL LAND HOLDINGS**

<table>
<thead>
<tr>
<th>Period</th>
<th>Total Individual Purchases</th>
<th>Total Area Purchased (acres)</th>
<th>Cumulative Total of Acquisition</th>
</tr>
</thead>
<tbody>
<tr>
<td>1955</td>
<td>1</td>
<td>300 (approx. 4300 25' lots)</td>
<td>300</td>
</tr>
<tr>
<td>1957</td>
<td>2</td>
<td>375</td>
<td>675</td>
</tr>
<tr>
<td>1958</td>
<td>1</td>
<td>305</td>
<td>980</td>
</tr>
<tr>
<td>1959</td>
<td>6</td>
<td>691</td>
<td>1,671</td>
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<tr>
<td>1960</td>
<td>2</td>
<td>628</td>
<td>2,299</td>
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<td>1961</td>
<td>1</td>
<td>160</td>
<td>2,459</td>
</tr>
<tr>
<td>1962</td>
<td>Nil</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>1963</td>
<td>4</td>
<td>699</td>
<td>3,158</td>
</tr>
<tr>
<td>1964</td>
<td>4</td>
<td>968</td>
<td>4,126</td>
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<tr>
<td>1965</td>
<td>1</td>
<td>148</td>
<td>4,274</td>
</tr>
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<td>1966</td>
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<td>277</td>
<td>4,551</td>
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<tr>
<td>1967</td>
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<td>490</td>
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<tr>
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<td>1969</td>
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<td>6,718</td>
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<tr>
<td>1972</td>
<td>Nil</td>
<td>307</td>
<td>6,718</td>
</tr>
</tbody>
</table>

\(^1\)Part of original incorporation of fringe area, purchased from the Rural Municipality of Cory, which they acquired by tax default.

\(^2\)CMHC Partnership holdings.

\(^3\)CMHC Partnership holdings.
B. The price and profit impacts


A comparison of land prices in Saskatoon with those of other metropolitan areas in Canada, all show that Saskatoon prices are lower. However, what is not taken into consideration is the fact that of the 22 metropolitan areas in Canada, Saskatoon has the second smallest population

(130,000 in 1974) and has the eighth lowest rate of growth (12% increase between 1966 and 1974). \(^8\) "To compare the prices of land in different cities without reference to their sizes, rates of growth, and economics, is to ignore the very factors which determine land prices." \(^9\)

In an article on the Saskatoon land bank, John Piper compared the costs of lots in seven western cities, all of which have similar market structures, but different demands for lots, primarily due to differences in city sizes. The graph below depicts his findings: \(^{10}\)

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\(^8\) See Appendix to this chapter showing populations and growth rates of metropolitan centres in Canada. Information: Statistics Canada. Catalogue 91-207 Annual. (Appendix B).


It shows a clear relationship between the demand for lots, as expressed by the number of housing starts, and the cost of lots for these western Canadian cities. Saskatoon is not exceptional; it merely has a lower demand for lots than do other metropolitan areas.11

When the price of lots in Saskatoon is compared with prices in Moose Jaw and Prince Albert, the latter smaller cities are found to have lower lot prices. Therefore, there is reason to believe that Saskatoon's land policy is not necessarily the cause of lower lot prices for its consumers.

More importantly, Saskatoon's policy is aimed solely at controlling the price of new sites as they are put on the market. There is no attempt to control the total market for land and housing.12 In any case, if the over-all intention of selling lots at below market value is to keep the cost of housing down, Saskatoon may no longer be succeeding. According to recent figures reported in the Financial Post, house prices have increased 66% in Saskatoon during the past two years.13

One of the objectives of the Saskatoon land assembly program is to realize a profit as a result of municipal


12The price of new sites does have an impact on the over-all price of lots, but the effect of controlling the price of new sites is minimal because so few new lots are put on the market annually.

involvement in land development and to use the profit to
purchase additional land. Initially, the program was
financed by using the $3.5 million accumulated through tax-
defaulted land sales. In spite of the fact that additional
taxes were not imposed on the taxpayers to finance the pro-
gram, the program did have a cost. The $3.5 million could
have been used to defray other capital intensive programs,
that is, there was an opportunity cost to the land assembly
program.

Secondly, the Saskatoon accounting system was
extremely simplistic. There are no costs listed for the
administration of the program on the grounds that the work
is carried on by existing staff. The accounting system also
ignores the cost of holding land and taxes foregone. 14
Therefore, it is impossible to determine the actual costs
of operating the land banking program or to use the
Saskatoon figures as a cost basis for similar programs in
other parts of Canada.

In spite of the fact that Saskatoon began its
program with a large stock of land and $3.5 million, by 1967
the increased cost of peripheral land made it impossible for
the City to finance additional purchases on its own. 15 As
a result, Saskatoon applied for provincial and federal


assistance. In 1967, 490 acres were purchased followed by an additional purchase of 438 acres in 1968 to which the municipality contributed 5%, the provincial government 20%, and the federal government 75% of total costs. In other words, the Saskatoon land bank was not self-financing as anticipated. Not only did the City not realize an overall profit from its land transactions, it could not continue to buy land it felt was required without senior government assistance.

Finally, it should be noted that by marketing land itself, in order to avoid undue profits by speculators, the City of Saskatoon may be assisting local development firms. The City purchases and holds the land and then sells it to development firms as required. As a result, the development firms can avoid long-term investments in land, and the risk of purchasing land which may not receive development approval. They purchase land at below market price from the City and resell it to the consumer at the market price, thereby realizing enormous profits over a short time-span and without risk.

C. Political input and methods employed in planning.

The Co-operative Commonwealth Federation (CCF) Party formed the government in Saskatchewan when Saskatoon's land banking policy was instigated. As a result, the political atmosphere is often used to explain the government's involve-
ment in a traditionally private market. The validity of assumptions regarding the past may be questioned but the continued support in Saskatchewan of a socialist-style of government suggests that intervention in the market place is accepted by the voters. In addition, public sector involvement in the entire planning process, not simply at the approval stage, has been accepted for a considerable length of time. Saskatoon's first Planning Department was organized in 1952, eventually became a strong supporter of the City's real estate policy, and has continued to work closely with the Real Estate Committee.

In his book, The Saskatoon Experience, Don Ravis states that:

 Acting as a landowner through this municipal planning authority, the Planning Department, Saskatoon has been able to plan its development in the fullest comprehensive sense. Because the municipality is both land owner and planner, it is free to plan according to its own interpretation of "good planning."

However, an examination of the planning procedures used by the City of Saskatoon suggests that the procedures used are long range, comprehensive, equally applicable to both private and publicly owned land, and therefore completely divorced from the land ownership question. First of all, all subdivision applications are submitted to the Planning Department, which functions as secretary to the Community

Planning Commission and the Technical Planning Board. The Community Planning Commission is composed of citizens, municipal employees, and representatives of the various School Boards who judge development proposals from a non-technical standpoint. The proposals are then forwarded to the Technical Planning Board, which is made up of one representative of each of the technical agencies operating in the City—the City Planning Officer, the City Engineer, the Manager of Utilities, the Director of Parks and Recreation, the City Solicitor, and representatives of the gas, electrical and telephone companies. Each of these individuals reviews the plan from the standpoint of his technical requirements. "This means that if any of these departments requires a site for building or easement, approval of the plan by City Council is made subject to the provision of these utility requirements." Once the plan has been approved by the Community Planning Commission and the Technical Planning Board, it is presented to City Council for political review and then returned to the initial applicant who completes his registration through the Land Titles Office. The procedure is identical whether the developer is the City or a private concern. Where a development involves substantial portions of privately owned land, the private parties must

17 The planning procedure has been synthesized from Ravis, p. 51.

sign a Development Agreement with the City. Therefore, there is no reason to suggest that public land assembly has been functionally useful in the planning process.

As Mr. Ravis states, the City is planned in accordance with "its own interpretation of good planning." That interpretation is based on the ideologies, concepts and technical requirements of the planning committees and City Council, both of which are subject to political pressures.

In his article on Saskatoon, John Piper accuses the Saskatoon Council and city hall planners of a "fraternal relationship" with local developers.\(^{19}\) For example, in the summer of 1974 Plainsman Developments Ltd., a small development firm negotiated the purchase of 503 acres from Mrs. F. Lawson of Vancouver.\(^{20}\) One of the owners of Plainsman then approached the City's planning and development committee "to avoid competition" and arranged for the City to purchase 85% of the 503 acres, while Plainsman would purchase the remainder at $1,425 per acre. The City agreed to the arrangement and paid Plainsman a 6% commission, $36,000, for negotiating the land purchase.

As the result of the deal Plainsman has hit the big time. Without making any cash outlay, Plainsman's commission will pay their share of the down payment and any interest charges on the remainder. As well Plainsman has secured


enough land for 300 lots and the guaranteed co-operation of the City.21

It would appear, therefore, that Saskatoon's politicians and municipal employees are subject to the same pressures which afflict politicians and bureaucrats in other areas of Canada. And just as it is elsewhere, the specific goals and demands of developers assure decisions will be made in their favour rather than in the elusive "public interest." As a further example, the majority of lots on sale each year are sold at below market price to contractors—not to the public.22 The City doesn't control the resale price of lots, therefore these same contractors can charge the regular market price for land and pocket the windfall profits.

In summary, the planning procedures employed by the City of Saskatoon can be completely separated from the ownership of land; and the individuals making the planning decisions for the City are subjected and succumb to pressures from strong interest groups in a pattern familiar to students of municipal politics.

D. Planning--land use and the timing of development

In many respects, the timing of development in Saskatoon has been relatively simple because the City has


not been subjected to rapid rates of growth. For example, the City limits established in 1911 were not extended again until 1955 (see map following).

The development which has taken place has been orderly and contiguous and based on full services. Uncertainties of time, place and type of development have been removed as a result of detailed planning. 23

Land has been purchased by the City in an effort to consolidate its boundaries and assure orderly development. The majority of land purchases have been within a six-mile radius from the centre of the City. At the time of purchase, the ultimate land use has often been remote, with only the development pattern or direction of future growth known. However, interim uses of publicly owned land have always been planned. For the most part, interim use has been agricultural.

By renting out the land for agricultural purposes, it was hoped that the rental revenue would be sufficient to possibly cover interest on the original investment, together with any taxes or other charges that were incurred. 24

The accounting system used by the City, however, is haphazard with no information on the precise costs of holding specific parcels of land, taxes foregone, operating expenses of the

23Figures regarding the actual time required to process a development plan and complete registration are not available, making comparison with the planning process in other parts of Canada difficult.

program, interest or other opportunity costs of capital or rental revenue from agricultural land. As a result, pricing of land by the Assistant City Clerk on behalf of the Real Estate Committee, has been done on an arbitrary basis. Frequently, the seller is simply granted a lease on the land until it is required for development purposes. The City pays the taxes on the property and in return receives one-third of the revenue from wheat sales.

Once development is imminent, the planning process determines ultimate land uses. Because the City has controlled the planning process and has owned large parcels of land, it has had the full gamut of choice regarding land use, but has only rarely been innovative in its approach to development.

The Replotting Scheme process is one example of a procedure which has been innovative. By authority of the Replotting Section of the Community Planning Act, the City has been able to redistribute land and resubdivide existing communities in about one-third of the time it would normally take.25 The method used in resubdividing is compensation of owners for their land with equivalent-sized lots in new subdivisions.

Where an area is to be jointly developed, redistribution is used, again by authority of the Replotting Section.

In this process, the total planning area land, both public and private, is pooled. Spatial relationships can then be planned for an area large enough to include residential and commercial centres, recreational space and institutional sites. The City prepares the plans, charging administrative and servicing costs. After the development receives inputs from the Community Planning Committee and Technical Planning Board, and receives final approval from City Council, the land is divided again on a lot-for-lot basis in the ratio of total contribution.

An exception to this proportional division occurs where a use has been proposed that puts a higher than average value on a particular parcel, as in the case of a shopping centre. In such a circumstance, the original owner of the land must receive the increased value accruing to that lot.26

The Replotting Scheme is an efficient mechanism using land ownership and land trading as a tool in determining land use. But the over-all results that have been achieved are not exceptional. For example, Saskatoon planned and developed two areas simultaneously, College Park and Confederation Park. In College Park, land was sold at $25 per foot frontage in comparison to $15 per foot frontage in Confederation Park. In College Park, lots were 50 to 55 feet wide; in Confederation Park lots were 40 to 50 feet wide.27 The result was that College Park became a preserve for the rich.

In other words, no effort has been made by the public authority to end segregation in housing or to encourage mixed-use zoning.\textsuperscript{28} Saskatoon is planned to look just like every other Canadian city.

E. Land ownership as a control device

Traditionally zoning, subdivision approval and regulation have been used to control urban growth. In Saskatoon, these traditional tools have been used in conjunction with public land ownership. The City has consolidated its holdings in and around Saskatoon and used its holdings to determine the direction of growth and servicing. As a result, Saskatoon has no unplanned suburban communities, no fringe or leap-frog developments. The planning committees, City Council and the general public are all aware of planning directions well in advance, and therefore the uncertainty which is attached to other public and private investments affected by the location of future public services, is reduced. There is less need to pay high hold-out or expropriation costs if direction of growth is determined in advance and assured by public land ownership.

\textsuperscript{28} To assure segregated land uses, the City traded land with the University of Saskatchewan in 1956. The University received land in proximity to its central-City location while the City accepted peripheral land which was used for industrial development.
The exchange of land between private developers and the City has become a very important land use control tool. For example, Saskatoon traded land for Circle Drive, a major highway, without the inconvenience and costs often involved in attaining rights-of-way.

F. **Summary**

The examination of Saskatoon's land assembly program has shown that the results of the price objective of lowering the cost of housing to the consumer must be seriously questioned. Housing in Saskatoon may be similar in cost to other areas which share common supply, demand and growth characteristics. The profit objective has not been met either. The land banking program has not been self-financing as anticipated. As peripheral land increased in cost, the City was forced to apply for assistance in purchasing land and could not continue to finance the program from the profits of former land sales. In addition, it is quite probable that the City program has benefited the developers more than the public.

The examination of the planning process has shown that it can be, and is, completely separated from land ownership. The process and results are identical whether the land is privately or publicly held. The planning decisions can only be as innovative as the Council and committees which initiate and approve them. In the
Saskatoon example, planning has not been particularly innovative; the results are similar to those in most western Canadian cities in the sense that housing is usually segregated and mixed zoning is rare. But the political decision-makers are developing plans in accordance with their "own interpretation of good planning." In addition, the political decision-makers are subjected to interest group pressures and can be co-opted by well organized groups with specific goals, such as the construction industry.

On the positive side, development has been orderly and contiguous. Interim land use has been effectively instigated although the costs and benefits have not been accurately calculated. The Replotting Scheme whereby the City trades pieces of land, has been effectively used in the resubdivision process. It has enabled the City to determine land use in one-third of the time the normal acquisition or expropriation and rezoning process would take. It has also enabled the City to redistribute land and therefore to plan areas large enough to include commercial centres, recreational space and institutional sites.

The use of land ownership as a control tool has assured Saskatoon of the right to determine the direction and rate of growth and because of the trading option, the right to determine land use.
Therefore, in spite of the fact that public land ownership has not been effective in controlling prices or redirecting profits, it has been a useful tool in the planning process. Used in conjunction with comprehensive long-range planning, it is an effective mechanism.
Case Study No. II

Hamilton

a) The Federal-Provincial Assembly
b) The Saltfleet Assembly

A. Background

Hamilton is one of the few major urban centres in Canada with extensive experience in public land banking. In the past twenty-six years, there have been two large separate assemblies of land in Hamilton—the Federal-Provincial Assembly and the Saltfleet Assembly.

Hamilton had earlier experiences in assembling land but in each of those experiences the land was to be used exclusively for public purposes. At the turn of the century, the City set aside a specific annual levy for the purchase of land to be used for parks, schools and cemeteries.¹ Years later, land was set aside for an internal greenbelt known as the Royal Botanical Gardens.² Tax default land accumulated during the depression was used for public health institutions on the western side of the "Mountain."³ As a result of these projects, land was set


²Ibid., p. 15.

³Ibid., p. 17.
aside for public use. In both the Federal-Provincial and Saltfleet Assembly projects, however, objectives were diversified and land was to be used for private and public purposes.

In 1950-51, the Federal and Provincial governments assembled 900 acres of land above the Niagara Escarpment, which was then beyond the main built-up area (see map following). The purpose of this assembly was to exert influence over the direction of future development. This land banking took place under the provisions of Sections 40 and 42 of the National Housing Act and it was expected that the land would be held for a considerable period of time. 4

According to the 1947 City Plan, the population of Hamilton was expected to increase by 60,000 over 30 years. 5 It was therefore felt that development of the "Mountain" would not be imminent. However, by 1954 planning of the Federal-Provincial Land Assembly area began.

The original plan was to simply sell off the land at controlled prices in the form of serviced lots. 6 But controversy over the location of the Mountain freeway began at that time and carried on so that detailed planning was

4 Ibid., p. 100.
5 Ibid., p. 19.
6 Ibid., p. 23.
not tackled until the mid-1960s.

In 1961, however, after a very extensive series of discussions and a review of experiences it was agreed by a joint committee representing the City, the Province and CMHC that the Federal-Provincial Land Assembly be developed with a mixture of housing types, for both private and public ownership, and for both sale and rental purposes and that lands be sold at market value.\(^7\)

However, the City did not act upon the agreement reached. In 1965, the controversy still continued: should land be sold at or below market price; should there be a mixture of housing types in the development? Finally, in April, 1966 the Hamilton-Wentworth Planning Board approved a revised plan which provided for single-family dwellings in the northern half of the development, and a mixture of housing types with a two-storey limit in the southern part.\(^8\)

The revised plan was then presented to City Council who rejected it. Council decided that row-housing, the sole survivor of the struggle for new housing types, should be confined strictly to the interior of the site. Controversy over housing types had delayed development by over three years. It was felt that agreement among the Planning Board, City Council, the Federal and Provincial governments would never be reached. All plans which had been designed to this point were abandoned and Ontario Housing Corporation (OHC)

\(^7\)Ibid.

\(^8\)Ibid., p. 26.
took over sole responsibility for developing the Federal-Provincial Land Assembly.\(^9\)

In 1968, the OHC purchased 1,600 acres in Saltfleet, east of Hamilton (see map).\(^10\) The Saltfleet area will house 70,000 people on 3,570 acres of land. Although the OHC owns less than half of the land, that proportion was enough to exert a very strong influence on the whole planning process. The planning process was long (1968-1972) and the OHC played a vital role. It took the initiative to develop the Official Plan, the Zoning Bylaw, the detailed Subdivision Layout Plans and the Financial Impact Review.

There was a definite difference in the approach used in the Federal-Provincial Land Assembly and in the Saltfleet Assembly. In the former:

1) Local government planning . . . was useless and piecemeal; it distorted the original aims and multiplied planning costs tenfold.
2) The City blocked innovative development.
3) The Federal and Provincial Governments mistakenly let the City treat them as "just another developer."
4) Land speculation was there before the Land Assembly. The partnership soon switched from social objectives to selling land at market value.
5) Municipal delays increased costs: divergent objectives confused the issue.
6) Housing and land costs escalated outside the Land Assembly. The initial advantages were fumbled and lost.\(^11\)

\(^9\)Ibid.
\(^10\)Ibid., p. 102.
\(^11\)Ibid., p. xii.
On the other hand, the Saltfleet Assembly was time-consuming but comprehensive, unified and effective. Public input was maintained through the OHC. Objectives were clear and consistent. As a result,

In the incisive words of one of the planners most closely concerned with the process "Saltfleet is a community; the Mountain land assembly is just a bunch of subdivisions." 12

In 1961, when planning of the Federal-Provincial Assembly first began, the Joint Coordinating Committee 13 recommended that the prime objectives of the public land assembly program should be:

1) to achieve good planning;
2) to cater to the non-private development market;
3) to counteract the inflation of land values which was evident. 14

During the period 1961-1966, before OHC took over as prime developer, the objectives shifted and were confused. In the Saltfleet Assembly, the same mistakes were not made. The results of public land assemblies in these two areas will therefore be treated separately.

12 Ibid., p. 38.

13 The Joint Coordinating Committee was composed of representatives of the Federal, Provincial and Municipal governments.

B. The price and profit objectives and the response to the non-private development market--The Federal-Provincial Assembly

The controversy surrounding development of the Federal-Provincial Assembly, the divergent objectives and recurring delays had the combined effect of increasing the costs of land and housing within the Assembly. Outside the Assembly housing and land prices escalated.

In Hamilton, the increase in house prices was more rapid than that in Toronto, which did not have a public land assembly project. The figures below suggest that the effect of the land bank on housing prices was negligible in spite of the fact that approximately 30% of new housing starts took place on publicly owned land.\textsuperscript{15}

\begin{table}
\centering
\begin{tabular}{|c|c|c|c|c|}
\hline
Year & Hamilton & \% Increase & Toronto & \% Increase \\
\hline
1967 & $19,435 & & $24,078 & \\
1968 & 21,767 & 12.0 & 26,726 & 11.0 \\
1969 & 23,369 & 7.4 & 28,945 & 8.3 \\
1970 & 24,363 & 4.3 & 29,492 & 1.9 \\
1971 & 24,758 & 1.7 & 30,426 & 3.2 \\
1972 & 27,061 & 9.3 & 31,357 & 3.1 \\
\hline
\end{tabular}
\caption{AVERAGE SELLING PRICE OF HOMES 1967-1972: HAMILTON AND TORONTO}
\end{table}


\textsuperscript{15}Ibid., p. 41.
The average price of serviced land in lots quadrupled in little more than a decade.

**TABLE 2**

**AVERAGE PRICE OF SERVICED LOTS**

**HAMILTON**

<table>
<thead>
<tr>
<th>Year</th>
<th>Price</th>
</tr>
</thead>
<tbody>
<tr>
<td>1961</td>
<td>$3,000</td>
</tr>
<tr>
<td>1972</td>
<td>$12,000</td>
</tr>
</tbody>
</table>


Within the Assembly itself, there was often difficulty in keeping lot prices below that outside the Assembly. For example, in part of the development known as the Lawfield neighbourhood, "construction costs were $707,300 for 213 lots, averaging a net development cost of $3,300." However, the price had to be re-estimated adding in the costs for park and church lots and servicing costs for a proposed shopping centre. "The resulting lot cost then became $5,040.34." Lots were sold at $5,500.

These costs were compared with the prevalent market price of lots in a private subdivision in the same area in March, 1965, eighteen months before the public assembly land

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was marketed. In the private subdivision, lots were serviced at $3,020 and sold for less than $5,000. The difference in the final figures was a result of:

1) a higher standard of servicing in the public assembly;
2) increased servicing costs over the 18-month period;
3) recurring delays and disagreement over plans in the public assembly which "multiplied planning costs tenfold." The figures above suggest that servicing and development costs are not lower for the public sector and that economics of scale are not readily realized. The high cost of lots resulted in the construction of middle-class housing in Lawfield. The original plan of a model community featuring homes for low-income families was abandoned.

In the long run, a substantial net profit on the sale of land in the Federal-Provincial Assembly was realized. Although recapturing the increased value of land for the public treasury was not a primary objective of the Assembly, $13,044,323 accrued to the Federal and Provincial Governments (see table below).

\[\text{18 Ibid.}\]

\[\text{19 For example, underground hydro service rose from $150 per lot to $235. Road construction costs increased from $23 per lineal foot to $34 per lineal foot. Ibid.}\]

\[\text{20 Ibid., p. xii.}\]
TABLE 3
CITY OF HAMILTON CALCULATION (1966) OF ASSUMED DEVELOPMENT PROFITS ACCRUING TO FEDERAL AND PROVINCIAL GOVERNMENTS IN ULTIMATE DISPOSITION OF FEDERAL-PROVINCIAL LAND ASSEMBLY

<table>
<thead>
<tr>
<th>Description</th>
<th>Cost</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cost of Land</td>
<td></td>
</tr>
<tr>
<td>900 acres at $1,000 per acre</td>
<td>$ 900,000.00</td>
</tr>
<tr>
<td>$900,000 interest compounded 5% for 13 years</td>
<td>1,697,084.00</td>
</tr>
<tr>
<td>Legal fees for purchase of 900 acres, at 1½% (Crown Corporations exempt from land transfer tax)</td>
<td>11,250.00</td>
</tr>
<tr>
<td>Total cost of 900 acres of land</td>
<td>2,608,334.00</td>
</tr>
<tr>
<td>Total cost per lot: $610.00</td>
<td></td>
</tr>
</tbody>
</table>

Sale Price of Land
5% land dedication on 900 acres - 45 acres.
Each acre would subdivide into 5 lots (50' by 100')
855 acres would produce 4,275 building lots
4,275 lots at $6,500 per lot                                                $27,787,500.00
Legal fees for sale of lots (1½%)                                             416,813.00
Cost of services at $2,500 per lot                                          10,687,500.00
Initial cost of 900 acres                                                   2,608,334.00
Total cost of land sold                                                      13,712,647.00
Net profit of sale of 900 acres                                             $14,074,853.00

Source: Norman Pearson, Towards a Methodology for Housing and Land-Bank Needs Analysis, Ontario Housing Corporation, April, 1973, pp. 112-113. (Computation errors on original have been corrected.)
C. The planning objective--the political input in the Federal-Provincial Assembly

Three levels of government were involved in the Federal-Provincial Assembly, each of which issued generalized policy statements, each of which had different priorities. The result was inconsistency and continual delays.

For example, between 1955 and 1959 the Hamilton-Wentworth Planning Area Board tried unsuccessfully to establish a 20-year comprehensive plan.

In 1965, the City of Hamilton requested that the partnership continue with the planning of 277 acres in the public land assembly. CMHC agreed to do the lay-out work. However, in August, 1965 a private consultant firm was also engaged to produce a general development plan. The plan drawn up by the consultant, Murray V. Jones and Associates, was not accepted by the City.

In October, 1965 OHC engaged their own consultants to draw up plans for the development of the balance of the Federal-Provincial holdings.

Thus all partners were busily planning, but the plans were not coordinated, and the results were contradictory.

In addition to the problems caused by poor coordination, were the problems caused by varied objectives.

\[21\text{Ibid.}, \text{p. 47.}\]
\[22\text{Ibid.}\]
\[23\text{Ibid.}\]
Originally, the social objective of providing land at below market value for low-income housing was accepted by the partnership. The development was to be a model community with a mixed variety of housing. However, the local politicians especially were under mounting pressure exerted by the Metropolitan Hamilton Home-Builders' Association and later by the Urban Development Institute. These groups insisted that:

a) there should be no further land assembly;

b) all lands should be disposed of by public auction or by tender;

c) the profits should be ploughed back into public services to increase the supply of available land.  

The result of this pressure was a policy that ensured that land would not be sold at less than market price.

The local Planning Board was also under pressure from ratepayers' associations. For example, in response to public opinion, the Planning Board "recommended against changing the northern half of the public lands from the existing single-family designation to allow a broader range of housing types."  

It therefore appears that Hamilton's elected officials and appointed public servants were subject to pressures from organized lobbies--developers and middle-

\[24\text{Ibid.}, \text{p. 34.}\]

\[25\text{Ibid.}, \text{p. 26.}\]
class ratepayers' associations. As a result, innovative housing and less than full market pricing was made virtually impossible.

D. Land use, the timing of development, and controls—Federal-Provincial Assembly.

The 900 acres originally purchased for the Federal-Provincial Assembly were located outside the immediate area of urban growth. The intent to develop was long term and for that purpose the land was strategically located. The two main parcels of land were located on the two main residential axes of growth.

The opportunities opened to the partnership of federal, provincial and municipal governments were therefore:

1. A chance to pioneer new kinds of community development.
2. A chance to apply and demonstrate sound planning principles.
3. An opportunity to achieve economies of scale.
4. A chance to forget about property boundaries and to develop consolidated land holdings.
5. A chance to integrate low income housing into comprehensive neighbourhood layouts.
6. A chance to influence design and land use, adjacent to the freeway and to get public advantage (in terms of major public uses and commercial development) from such locational advantage.26

However, the disputes regarding objectives, the breakdown of comprehensive planning, the lack of coordination and the continual revision of plans resulted in many delays.

26 Ibid., pp. 31-32.
For example, after the OHC took over the responsibility for developing the public land assembly, subdivision plans were withdrawn (1966) and then redesigned (1967) according to municipal ideas. "Development was in effect delayed three years by this kind of controversy."27 As a result, serviced land was not put on the market at a rate which kept pace with growth and this had an inflationary effect on prices.

The opportunity for innovative design and integration of low-income housing was lost because the three levels of government had divergent objectives and succumbed to pressures from powerful interest groups. There must be the determination to apply an innovative design, clear objectives, and control through ownership, if a public assembly is to be distinguishable from private piecemeal development. In the Federal-Provincial Assembly standardized, rather than innovative, forms of development were used; objectives of the three government levels involved were divergent and continually changed; and there was no effort to apply control, which was an available and powerful tool.

As a result, a "block by block" approach was used; the area is virtually indistinguishable from surrounding development; and there is an insignificant amount of low-income housing.

E. Conclusions--Federal-Provincial Assembly

In the Federal-Provincial Assembly the price objective of reducing the cost of land and housing for the consumer was not met. Cost of housing inside the Assembly was high and there was little attempt to provide adequate low-income housing. Cost of land and housing outside the Assembly continued to escalate.

The profit objective was realized. Over $14 million were returned to the public treasury and it would seem that this amount could have been increased if a more efficient system of planning had been utilized.

The planning opportunities in the Federal-Provincial Assembly were lost because there was no attempt to plan large areas, innovative designs were not used, objectives were unclear and coordination of activities was extraordinarily poor.

It would therefore seem that control through ownership, although it provides the opportunity for comprehensive and long-range planning, does not guarantee that such planning will take place. The public officials who make the final decisions can be unduly influenced by powerful interest groups and social objectives can be lost. Innovative planning requires innovative planners and politicians.

The opportunity to integrate housing types by determining land use through ownership was also lost. Ownership
is a powerful tool only when a concerted effort to use it is made.

F. The price and profit objectives and the response to the non-private development market--The Saltfleet Assembly

The price objective of lowering the cost of land to the consumer has not been reached in the Hamilton area. Although nearly one-third of the new detached houses built in Hamilton each year are built on publicly owned land, the price of land and housing has not been reduced. In actual fact, Hamilton has "one of the highest average house and lot prices and price increases of any Canadian city." 28

Specific information regarding profits claimed for the public treasury as a result of the Saltfleet Assembly are not available. However, it is quite probable that profits were realized.

Land acquisition costs were approximately $7 million for 1,600 acres of land. Investment in addition to acquisition was expected to approximate $8 million between 1969 and 1973. 29

It is known that the expected average price of land to be marketed in Saltfleet was approximately $20,000 per lot in a price range of $6,000 to $50,000. 30

28 City Magazine, Vol. 2 #1, p. 17.
Unless the estimated costs escalated dramatically or the project was badly managed, for which there is no evidence, the Saltfleet Assembly should have shown a profit.

This example again demonstrates that it is difficult if not impossible to pursue price and profit objectives simultaneously. If the objective is to make a profit by selling land at market price, the price objective of lowering the cost of land for the consumer will not be met.

In Saltfleet, however, at least some land was provided at cost for low-income housing, and there was a concerted effort to integrate a variety of housing types into the community. This was accomplished because it was a clearly stated objective of the OHC which maintained control of the development.

G. The planning objective—the political input in the Saltfleet Assembly

In Saltfleet, management was unified under the direction of the OHC. As mentioned earlier, OHC developed the Official Plan, the Zoning Bylaw, the Subdivision Layout Plans and the Financial Impact Review for the Assembly.

Planning of the Assembly began in 1968 and housing came on the market in 1973. Planning was comprehensive and long term resulting in a stream of development. Land use was planned for a community and not on a "block by block" basis as it was for the Federal-Provincial Assembly.
The public sector owned less than half of the land in the Saltfleet development, but even this amount allowed OHC to determine over-all land use and to use its "new town" expertise on a small scale. Development and growth of both the public and private sectors was coordinated by OHC, assuring provincial public input and the realization of provincial public goals.

The price paid for comprehensive and innovative development on the part of OHC, was the suspension of local government from initial planning to the completion of development. The City of Hamilton had control only over servicing and in this area there was some disagreement.

OHC wished to complete development of the Mountain (Federal-Provincial Assembly) at the same time as it began development of the Saltfleet Assembly. The City was hesitant to begin servicing the Saltfleet Assembly because of the financial costs and because it wished to see the Mountain area development completed first. Eventual agreement was reached.

Presumably, some local objectives were integrated into the Saltfleet Official Plan, although there was no guarantee that these objectives would be realized.

There is no doubt that OHC has the expertise to plan, coordinate, manage and develop a public land assembly efficiently and effectively. However, the suspension of
local government autonomy is a high price to pay. The history of local government in Canada predates Confederation and there should be some guarantee that these powers will not be usurped in all important matters.

H. Land use, the timing of development, and controls---The Saltfleet Assembly

Land use planning, and the timing of development were guaranteed in Saltfleet because the public sector could, and did, exercise control through ownership. The objectives of OHC were clear and concise; planning was comprehensive and innovative. Ownership of less than half the land guaranteed the realization of public objectives.

Planning was done on a community scale and development was coordinated with expected growth requirements. In the Saltfleet Assembly, ownership as a control tool was effectively employed.

I. Conclusions--The Saltfleet Assembly

There has been little difference in the rates of escalation of house prices in Toronto and Hamilton. Both cities have experienced rapid growth rates and are large metropolitan centres. One major difference between them is the existence of a land bank in Hamilton. This suggests that the price objective has not been realized in Hamilton, that is, that the land bank has exerted little influence on the total market price of housing.
On the other hand, the profit objective was probably realized, although explicit figures are unavailable.

The planning objective of developing a well-planned community using land ownership as a control tool in the development process was realized. Planning was comprehensive, effective and innovative but in order to allow provincial goals to be implemented, local government was suspended. In order to have effective management, local initiative and input were curtailed. The price for a well-planned community was high.
Case Study No. III

Red Deer

A. Background

The City of Red Deer, Alberta operates the most intensive and one of the most successful land banks in Canada. The City began purchasing land in 1956 in order to maintain firm control over the direction of growth in the area. The objectives of controlling land prices and/or of recapturing the profits in land sales for the public treasury were relegated to a secondary position. Long-range and comprehensive planning was of primary importance and the City never lost sight of that objective.

Red Deer currently monopolizes land development within its City limits. There are virtually no private developers of any consequence. The City controls a seven-year supply of land which it has purchased without any outside assistance, that is, Red Deer has not applied for provincial or federal assistance but has remained self-financing. ¹

Like many western Canadian cities, Red Deer began accumulating land by tax default shortly after a growth boom which ended about 1912. By 1920, the City held title to almost all vacant land within the City limits. After 1936, this land was slowly sold off to individuals who promised to erect a building within one year. Speculation did not take place for two reasons: 1) title to the land was not transferred until the new building had passed inspection by City officials; and 2) demand for land was never substantial. This early experience in land ownership and sales strongly influenced the City's decisions after a second boom period which began in 1953.

The population of the City of Red Deer grew very slowly until World War II, after which it quickly tripled:

**TABLE 1**

<table>
<thead>
<tr>
<th>Year</th>
<th>Population</th>
<th>Year</th>
<th>Population</th>
</tr>
</thead>
<tbody>
<tr>
<td>1901</td>
<td>323</td>
<td>1946</td>
<td>4,042</td>
</tr>
<tr>
<td>1911</td>
<td>2,118</td>
<td>1957</td>
<td>7,575</td>
</tr>
<tr>
<td>1921</td>
<td>2,328</td>
<td>1961</td>
<td>19,600</td>
</tr>
<tr>
<td>1931</td>
<td>2,344</td>
<td>1966</td>
<td>26,200</td>
</tr>
<tr>
<td>1941</td>
<td>2,924</td>
<td>1973*</td>
<td>28,000</td>
</tr>
</tbody>
</table>


---

<sup>2</sup>Ibid., p. 119.
By 1953, the City was faced with heavily overtaxed sewer and water facilities and the need for an over-all strategy to cope with the expected growth. In that same year, a new Regional Planning Director was appointed; Mr. Dennis Cole, a surveyor and town planner who strongly favoured land banking as a method of controlling the direction of urban growth. Between 1953 and 1955, Mr. Cole supervised the preparation of a long-range plan for Red Deer.

This plan considered the land and infrastructure requirements over a twenty-year period, for an eventual population of 40,000. It recommended the usage of every piece of land within City limits in the first instance, followed by orderly development of the urban fringe. Calculations showed that 1,750 acres would be required for residential plus industrial use over the twenty years.\(^3\)

It was at this point that the City realized that land speculation could quickly wreck the plans for orderly and economic growth.

In the event that a speculator or builder should get possession of say, the first 100 acres of the 500 acres to be served by the initial major sewer (costing about $350,000) he could monopolize the entire market in serviced lots for several years or force the City into leap-frogging or constructing a second trunk line.\(^4\)

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\(^4\) Ibid., p. 31.
As a result, the City decided that it would either acquire or obtain long-term options on large tracts of land in the logical direction of development.

All the lands which have been acquired by the City have been purchased through negotiation and not by use of expropriation powers. Prices paid have been low because the City has always kept options for development in more than one direction open and has pointed out to potential sellers that development would take place where land and servicing costs were lowest.

Servicing has been by far the greatest source of costs and as Red Deer intended to continue its policy of "pay-as-you-go for services," a Prepayment scheme was devised. This scheme charged the purchaser of a newly subdivided landbank lot "the marginal cost of all the extensions of service which produced that lot." In this way the bulk of the capital investment necessary for servicing lots was recaptured in the first year. Servicing, however, took place over two years for "cash flow" convenience.

Although the servicing costs for land are high, total land costs are low because the raw land component of cost is minimal. Therefore, paying all servicing costs at once has not been an exceptional burden for most purchasers. The table below gives a breakdown of land costs in Red Deer.

### TABLE 2
ESTIMATED RESIDENTIAL LAND COSTS AND RETURNS--ALL CASES
RED DEER 1973

<table>
<thead>
<tr>
<th></th>
<th>Cost</th>
<th>% of Total Cost</th>
</tr>
</thead>
<tbody>
<tr>
<td>Selling Price</td>
<td>$4,895</td>
<td></td>
</tr>
<tr>
<td>Total Lot Costs</td>
<td>4,617</td>
<td></td>
</tr>
<tr>
<td>Raw Land Costs</td>
<td>484</td>
<td>10.5</td>
</tr>
<tr>
<td>Service Costs</td>
<td>3,891</td>
<td>84.3</td>
</tr>
<tr>
<td>Planning, Sales and</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Administration</td>
<td>242</td>
<td>5.2</td>
</tr>
<tr>
<td>Return</td>
<td>278</td>
<td>6.0</td>
</tr>
</tbody>
</table>

Based on lot of 55 front feet.


The price of land in Red Deer has been loosely based on a cost-recovery formula which usually includes:

1) The cost of the land plus 25-50% to allow for the increased cost of replacement.
2) Survey and registration costs.
3) Trunk, sanitary and storm sewer costs.
4) Perimeter arterial road costs--i.e., major thoroughfares.
5) The cost of sanitary sewers, water lines, storm sewers, paved roads, sidewalks, curbs and gutters.
6) The cost of power and underground wiring for street lights.
7) The consulting engineers' fees for design and supervision.
8) Contingencies--i.e., an additional 5% of the total estimated cost.  

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6 Ibid., p. 132.
Prices have also been manipulated by Council in an effort to influence the direction of development. This matter is discussed below.

Although the cost of land has been relatively low in Red Deer, there has been a steady increase in absolute prices. "Between 1962 and 1973 the price of a newly developed 55 foot frontage, single-family lot in Red Deer increased from a range of $2420 to $2777 to a range of $3988 to $4675."  

The land banking program coupled with long-term comprehensive planning functioned smoothly until 1964. In that year, Red Deer suffered from an unforeseen sharp decline in the demand for new housing so that the City was left with an unsaleable large inventory of serviced and partly serviced lots. As a result of this unforeseen decline, the City was faced with large debts for the first time since it had embarked on a land banking program.  

In 1973 the reverse problem occurred. A sharp upswing in the demand for housing left the City land bank without lots to sell on the south side of the City. A private developer who owned a very small parcel of land in the eastern

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8 In 1963, the City debt for unsold improvements totalled $14,455. In 1964, this amount increased to $419,645 and could no longer be covered by short-term borrowing. Op. cit., Watson, p. 199.
part of Red Deer (see map), quickly stepped into the gap, developing and selling 75 lots at $110 per front foot where the land bank had been selling lots in the same area at $78.40.\(^9\)

The planning failures mentioned demonstrated to the City the need for a sophisticated system of market demand projection. As long as the City was small and grew at a steady rate, projections were simple to determine. Complications set in when the growth rate fluctuated. One of these complications is that the expectations of private holders of raw land have taken a quantum jump. When a private developer competed for land in the shortage of 1973, land prices escalated from an average of $1,500 per acre to $3,000 per acre.\(^{10}\) If Red Deer wishes to maintain its monopoly position in land development, it must be able to guarantee an adequate supply of serviced land. Otherwise, the objectives of the land banking program may not be as readily attained.

B. The price and profit objectives

As mentioned earlier, the price and profit objectives in Red Deer have been relegated to a secondary position. The City has never made an attempt to control prices. Its goal has been "to provide a good residential environment for its citizens at lowest cost to them and to the City."\(^{11}\) This

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\(^9\)Ibid., p. 199.  
\(^{10}\)Ibid., p. 215.  
\(^{11}\)Ibid., p. 189.
goal has resulted in a cost-recovery basis for lot sales and a non-profit orientation for the land bank. The price of land has been low in Red Deer (see Appendix C) but this can be partially attributed to low demand in most years. The table below gives the growth rates in Red Deer, which explains in large part the low demand for housing.\footnote{By comparison, the percentage increase of the Canadian population for the years 1966-74 was 12.5\%. For the 22 metropolitan regions the increase was approximately 16.5\%. Statistics Canada, Catalogue 91-207.}

### TABLE 3

<table>
<thead>
<tr>
<th>Year</th>
<th>Population</th>
<th>Immigration</th>
<th>Population Migration</th>
<th>% Rate of Increase</th>
</tr>
</thead>
<tbody>
<tr>
<td>1958</td>
<td>16,501</td>
<td>2,463</td>
<td>18.2</td>
<td>6.6</td>
</tr>
<tr>
<td>1959</td>
<td>17,593</td>
<td>598</td>
<td>3.6</td>
<td>6.6</td>
</tr>
<tr>
<td>1960</td>
<td>18,762</td>
<td>651</td>
<td>3.7</td>
<td>6.6</td>
</tr>
<tr>
<td>1961</td>
<td>19,615</td>
<td>354</td>
<td>1.9</td>
<td>4.5</td>
</tr>
<tr>
<td>1962</td>
<td>21,107</td>
<td>975</td>
<td>5.0</td>
<td>7.6</td>
</tr>
<tr>
<td>1963</td>
<td>23,106</td>
<td>1,444</td>
<td>6.8</td>
<td>9.5</td>
</tr>
<tr>
<td>1964</td>
<td>24,446</td>
<td>741</td>
<td>3.2</td>
<td>5.8</td>
</tr>
<tr>
<td>1965</td>
<td>25,195</td>
<td>203</td>
<td>0.8</td>
<td>3.0</td>
</tr>
<tr>
<td>1966</td>
<td>25,752</td>
<td>84</td>
<td>3.3</td>
<td>2.2</td>
</tr>
<tr>
<td>1967</td>
<td>26,173</td>
<td>22</td>
<td>0.1</td>
<td>1.6</td>
</tr>
<tr>
<td>1968</td>
<td>26,730</td>
<td>217</td>
<td>0.8</td>
<td>2.1</td>
</tr>
<tr>
<td>1969</td>
<td>26,924</td>
<td></td>
<td></td>
<td>0.7</td>
</tr>
</tbody>
</table>


At the same time, the City should be given credit for assuring an adequate supply of serviced lots in each year, with the exception of 1973.

The City has not realized profits as a result of its involvement in the land market, nor has it accumulated
enormous costs—primarily because of its Prepayment Scheme. The table below summarizes the City’s calculations regarding expenditures and receipts resulting from its investments in a land bank.  

### TABLE 4

**LAND BANK INVESTMENT JAN. 1, 1958–DEC. 31, 1972**

<table>
<thead>
<tr>
<th>Description</th>
<th>Amount</th>
</tr>
</thead>
<tbody>
<tr>
<td>Expenditures on land acquisition</td>
<td>$1,875,176</td>
</tr>
<tr>
<td>Expenditures on services</td>
<td>7,179,927</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>9,055,103</td>
</tr>
<tr>
<td>Recoveries from land sales</td>
<td>$1,457,828</td>
</tr>
<tr>
<td>Recoveries from utilities Prepayment</td>
<td>7,455,980</td>
</tr>
<tr>
<td>Recoveries from Winter Works Grants</td>
<td>133,615</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>9,047,423</td>
</tr>
<tr>
<td>Net Investment in Services</td>
<td>$(409,668) over</td>
</tr>
<tr>
<td>((7,455,980 + 133,615) - 7,179,927)</td>
<td></td>
</tr>
<tr>
<td>Net Investment in Land</td>
<td>417,348</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>7,680</td>
</tr>
</tbody>
</table>


The figures above are inaccurate in that they do not reflect the cost of working capital used to purchase raw land and to hold it over considerable periods. The City of Red Deer provides that capital without cost to the land bank. Therefore the true costs of land purchases are hidden in the

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For a more detailed breakdown of costs and recoveries, see Appendix C to this case study.
Red Deer accounting system. The result is a hidden subsidy for all land purchasers in the City.

The City has accomplished its secondary objective of selling land to its citizens at a low price, but the cost of the program, which is borne by all citizens, is unknown.

C. The planning objective—political input

The land banking program in Red Deer has been able to provide individuals and local builders with a continuous supply of serviced land at low prices. As a result, private developers gradually withdrew from competition, leaving the City in a monopoly situation. Therefore, the Municipal Planning Commission and the local politicians have not been influenced by private developers and have been left to develop the City in accordance with their own concepts of "good planning."

The Council is guided in its determinations by technical expertise and receives little input from the general public. Individual families have the first opportunity to purchase lots in a new subdivision. Lots are awarded for two weeks on a first-come-first-serve basis. The balance of the lots are then made available to building contractors 14

14 There are 10-15 building contractors in Red Deer, P. Spurr, The Land Problems' Problem, a Report submitted to CMHC, p. 328. These men differ from developers in that they simply purchase serviced lots from the City, and build homes on them. They play no part in planning or servicing of the development and do not own large tracts of land as developers do.
by a democratic process: 1) numbers are drawn to determine
order of choice; 2) each contractor may choose five lots at
a time; 3) drawing continues until each contractor has
chosen as many lots as he wishes. This process assures that
each contractor has an equal share of the best lots. It
also guarantees that the developments will not have a
project appearance.

In spite of the fact that powerful lobbies do not
exert undue influence, the over-all appearance of sub-
divisions in Red Deer is comparable to that in most other
Canadian cities. Housing segregation by income has been
achieved in a different way—but it has been achieved
nevertheless.

For example, lots in North Red Deer have continually
been sold at a lower price than comparable lots in South Red
Deer. In 1964, land in Oriole Park (North Red Deer) sold at
$47.10 per front foot in comparison to $50.90 per front foot
in Morrisee (South Red Deer). This differential has increased.
In 1973, land in Highland Green (North) was $72.52 per front
foot while land in West Park (South) was $85 per front foot.15
The difference does not primarily reflect differences in
land bank costs in the two areas but rather City Council
policy. By artificially lowering lot prices in North Red
Deer, the City is effectively segregated by income. In most
Canadian cities, similar segregation is planned by developers,

approved by city councils, and is also a consequence of the operation of the land market. It would appear that the same ends can be achieved without input from developers.

D. Planning objective—land use and the timing of development

Between 1953-56, the City of Red Deer developed a comprehensive, long-range plan which considered land use, infrastructure and service requirements for a city with a population of 40,000. In order to assure that development would take place as planned, in a logical staged manner, the City acquired strategic lands on the fringe of the urban area and obtained long-term options on large tracts of land in the logical direction of development. Thus, with an initial purchase in January, 1958 for $1.3 million, an intensive land banking program was initiated, with the prime objective of controlling the direction and rate of growth.

The program has been immensely successful for two reasons:

1) The objective of the program was clearly understood. There was no attempt to achieve a variety of objectives which might involve trade-offs.

2) Land banking was treated simply as a tool in a long-range, comprehensive planning process. The planners saw land banking as a means of controlling land use and the speed at which development took place. They did not confuse the concepts of land banking and planning, but treated each separately.

Planning has been exceptionally thorough and has continued to adhere to the over-all concepts set down in 1953. Decisions concerning land use and development fall into three basic phases: 1) the inventory phase; 2) the design phase; and 3) the development phase.

The process is coordinated by the Regional Planning Commission which is the planning authority for Red Deer City. It does the economic, market and demographic projections that guide the sequence of development and then suggests policy to the City Council. The Regional Planning Commission is also responsible for the site plan design for each individual subdivision.

The Regional Planning Commission receives input from the City Engineer and consultants who are hired to plan service patterns. The City Lands Department also reports to the Regional Planning Commission. The Lands Department is responsible for estimating the demand for lots, negotiating acquisitions and managing the raw land inventory. Inventory is kept in agricultural use until it is required for subdivision.

The Design phase begins five years prior to development of a subdivision. Each subdivision is treated as a

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17In 1953, with a population of under 10,000, the City of Red Deer decided that it would be more economical to use consulting firms for infrastructure, service and traffic planning rather than trying to hire the necessary staff. Op. cit., Watson, p. 122.
single, planned unit of approximately 160 acres. Land uses are related closely to one another, and development is self-contained in respect to elementary schools, local parks, playgrounds and shopping facilities.

After the initial design has been prepared by the Regional Planning Commission, it is modified by the City Engineer and Consultants. For example, one of the modifications initiated by the City Engineer has become standard procedure in all subdivisions. The position of the house, driveway and garage on each lot is now regulated to ensure that the provision of entrance breaks in street curbs will be done as simply as possible.

The City Council is asked to approve the design in principle, at this stage, before it is sent to CMHC, the School Boards, Parks Board and major utility companies for comments. After all modifications are made, the plan is presented to the City Council for final approval and then sent to the Survey Department which prepares the subdivision plan.

The design and standards of subdivisions in Red Deer have been high. All streets have sidewalks and concrete curbs. All telephone and electrical wiring is underground to ensure a pleasing visual impact. There are general restrictions on the type of housing in each close to ensure the houses relate harmoniously to one another. In the
newer subdivisions, cluster groupings of houses around cul-de-sacs called "closes" are often utilized. Each close has a central green space which can be used as a playing area for children.

In the final Development Phase, the Regional Planning Commission and the City Development Officer prepare zoning plans and subdivision approval applications which are sent to City Council for approval. Tenders are called for services. Servicing proceeds incrementally over a number of years depending on housing demand. Once a number of lots are serviced, selling prices are calculated, approved by Council and then made available to individuals and contractors.

The planning process employed is thorough and precise. The planners are aware of intended land use well in advance of development and have predetermined the direction of growth. Timing of development is determined by projection studies, for which two miscalculations have been recorded in the past eighteen years (1964 and 1973).

Land banking fits neatly into the over-all plan. It is used as a tool to guarantee that public decisions regarding land use, direction and rate of growth will be assured because of public ownership of the land.
LAND BANK DECISIONS FLOW CHART

1. **Inventory Phase:**

Regional Planning Commission coordinates planning studies. City Engineer and Consultants plan services pattern. City Lands Department estimates demand for lots.


2. **Design Phase:**

a) Five years before development target, Regional Planning Commission begins initial design.
b) City Engineer and Consultants modify the design.
c) City Council approves in principle.
d) The design is sent to CMHC, School Boards, Parks Board, and major utilities companies for comment.
e) Final Design approval by Council.
f) Survey Department prepares subdivision plan.

3. **Development Phase:**

Regional Planning Commission and City Development Officer prepare new zoning plan and subdivision approval application. City Lands Department sets sales date and calls for servicing tenders. Calculates lot selling prices.

City Council approves rezoning, servicing costs, street names, and sales policy. Sets sales date. Conducts draw for lots. Inspects lots once a month to enforce sale conditions.

E. The planning objective--controls

Land uses in Canada have traditionally been regulated by bylaws pertaining to zoning and subdivision. These measures have had varied success according to the demands made of them. However, both zoning and subdivision controls are strained when Planned Unit Development (PUD) is employed. Under PUD large areas of land are planned, subdivided and serviced as a single unit. "The result is an area of mixed land uses carefully integrated with each other in an individual way which fits the unique situation of that piece of land." ¹⁸

The City of Red Deer has used PUD in virtually all residential expansion which has taken place since 1956, and has adopted traditional legislation to cope with this new situation. In order to do this, Red Deer incorporated "development control" with the best elements of zoning and subdivision controls.

Development control is a concept which evolved in England in relation to New Towns. As control was guaranteed through ownership, development regulation could be viewed in a broader context. There are no detailed specifications of allowable land uses or maximum densities as there are in zoning laws. Land use is not rigorously separated. Instead, interrelationships between widely separated uses are stressed.

In Red Deer, a large area is planned and major land uses are designated—open space, church and school sites. These general plans are guaranteed under "development control." When development of a particular subdivision becomes imminent, detailed planning decisions are made. This provides considerable flexibility. For example, densities can be determined at the last moment, taking into consideration land uses in neighboring subdivisions and coordinating over-all area land uses.

When subdivision plans are completed, zoning classifications are superimposed. That is, small areas within the site plan are given an appropriate zoning designation, approved through the subdivision approval authority which is the Regional Planning Commission.

The official zoning maps are then taken to City Council which passes a bylaw amending Zoning Bylaw #2011 of the City of Red Deer. The amendment simply makes the new zoning map official.

The process adopted by Red Deer has the virtue of simplicity; but it does have some faults:

1. The relationship between different uses, different zones on the one site is not put into words. Such things as "density transfers" are assumed rather than expounded.19

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19 Density transfers refer to a situation in which densities are calculated over the whole area of the Planned Unit Development rather than in small internal zones. Therefore, some micro areas may have densities higher than is otherwise allowed, but this fact is compensated by adjacent areas being left totally open.
2. The external rigidity of detailed zoning masks the wide flexibility in the informal systems of the actual decision-making process.
3. The amount of citizen participation is very limited. The Alberta Planning Act requires a public hearing when a zoning amendment is being contemplated; but when it is public land being rezoned the hearing tends to be a mere formality.20

In summary therefore, the system of land use control in Red Deer is unique. "Development control" is used as an interim measure during the period when a general plan is in effect. It is guaranteed by land ownership. When a detailed plan is to be implemented, standard zoning procedures are superimposed on the system.

F. Conclusions

Price control has not been a major objective of the Red Deer land bank. Nevertheless, the City Council has made a conscious effort to keep the price of land low. By ignoring the cost of capital, the price of land has been artificially set at a low rate. In addition, the slow growth rate and small size of the City have contributed to low market demand and low prices.

It is unlikely that Red Deer has incurred high costs as a result of its land policy, but the exact costs to the City are unknown. The City's objective of providing a good residential environment at low cost to its taxpayers, may be admirable and the City may wish to continue doing so, but the accounting system should reveal the actual costs.

including the cost of capital. Only in that way, can the City be held accountable for its policies. Only in that way, will the actual subsidies granted land purchasers be a matter of public knowledge.

Red Deer was wise in relegating the "profit objective" to a minor position, as high demand and inflating prices were not typical characteristics of the City, and it is doubtful whether a social increment could have been recaptured for the public treasury.

The primary objective of the Red Deer program was to use land banking as a tool in the planning process. In this, the town was quite successful. Planning was comprehensive and long-term. Land uses and rate of development were guaranteed by public ownership. As a result, Red Deer is a well-planned community in which land uses are integrated. The line between urban and non-urban uses remains sharp and distinct. There is no fragmentary sprawl. Services have been extended in a rational and efficient manner. This can be attributed in large part to carefully articulated objectives and carefully chosen tools by which they could be achieved. One of those tools was public land banking.
Case Study No. IV

Mill Woods, Edmonton

A. Background

Like most other western Canadian cities, Edmonton accumulated tax default land during the depression, but, unlike most, it also experienced an oil boom in 1947. Between that date and 1960, the population of Edmonton rapidly increased (Table 1), the City sold off its tax default land and became completely dependent on the private sector for its land supply.

**TABLE 1**

<table>
<thead>
<tr>
<th></th>
<th>POPULATION OF EDMONTON-SELECTED YEARS</th>
</tr>
</thead>
<tbody>
<tr>
<td>1911</td>
<td>24,900*</td>
</tr>
<tr>
<td>1951</td>
<td>159,631*</td>
</tr>
<tr>
<td>1965</td>
<td>425,000</td>
</tr>
<tr>
<td>1969</td>
<td>470,000</td>
</tr>
<tr>
<td>1971</td>
<td>496,000</td>
</tr>
<tr>
<td>1974</td>
<td>529,000</td>
</tr>
</tbody>
</table>


The rapidly increasing population and a lack of serviced lots in the suburbs, placed great pressures on the existing older housing areas. House prices escalated quickly.

1Edmonton services all new subdivisions itself, one subdivision at a time. This has an inflationary effect on the price of house lots. See John Jordan, "Regarding Public Land Banking," Battle for Land, Community Planning Association of Canada, National Planning Conference, Regina, 1974, p. 20.
At the same time, there was a new demand for public housing, schools, parks, transportation facilities, hospitals, police and fire stations, libraries, health clinics, senior citizens' housing, utility buildings and institutional buildings to accommodate the growing population.

In the late 1960s, the City decided that it would purchase a large supply of land in an effort to curtail spiralling land costs.

Up until this time, the City had been expanding on a southwest-northeast axis along the North Saskatchewan River Valley. It was decided that if public land were to be acquired cheaply, a totally new direction of growth would have to be chosen. As a result, the area known as Mill Woods was acquired to the southeast of Edmonton (see map). Within a twelve-week period in the summer of 1969, the Province of Alberta quietly purchased 4,500 acres in a nine square mile tract, on behalf of the City of Edmonton.²

The Alberta Housing Corporation (AHC), which acted on behalf of the province, acquired the land for a cost in excess of $9 million, using its own funds and funds borrowed from CMHC under the land assembly provisions of the National Housing Act.³ Edmonton, which did not have adequate funding

²P. Ellwood, Mill Woods Project Director, "Notes for a Speech at the TPIC Annual Conference," Saskatoon, June, 1972, p. 1.

³Ibid., p. 5.
METRO EDMONTON GROWTH AREAS
to purchase the land on its own, agreed to acquire the land from AHC over a 15-year period, for a total cost including interest, in excess of $17,179,032. The public land acquisition program was intended to be self-sustaining and in fact return revenues to the City over expenditures in order that a land bank program could be established and priorities set for the acquisition of lands for public purposes without going into extensive market borrowing.

Not all of the Mill Woods area is publicly owned, but it was felt that a sufficiently large area was controlled to allow the City to realize its objectives.

**TABLE 2**

<table>
<thead>
<tr>
<th>Planning Area</th>
<th>Acres</th>
<th>% of Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Public Ownership</td>
<td>4,425</td>
<td>68</td>
</tr>
<tr>
<td>Private Ownership</td>
<td>2,075</td>
<td>32</td>
</tr>
<tr>
<td>Planning Area</td>
<td>6,500</td>
<td></td>
</tr>
</tbody>
</table>

| Public Ownership in Mill Woods      | 4,425 |            |
| Public Ownership outside Mill Woods | 660   |            |
| Total Public Ownership              | 5,085 |            |


---


The City established a separate department which has been responsible for coordinating all activities regarding the Mill Woods project. For example, this department coordinated the financial commitments and cost recovery programs, the preparation and implementation of development schedules and land marketing.

The objectives under which this department operated were extremely complex. Originally, the stated purpose of the project was:

the maintenance of a continuous and adequate supply of land for housing so that the trend to spiralling costs, particularly for land may be reversed; and the progressive servicing of land in the area, to provide public and private housing of good quality at minimum cost.6

Later, as planning of the project became more detailed, the City realized that it had the potential "to create an urban environment of the highest order."7 Yet, at all times it was necessary to consider the program as one which would not only be fully self-sustaining, but would return a profit that could be used to continue a public land banking program. Therefore, the objectives of the department can be summarized as follows:

6Ibid., p. 1.

7Mill Woods. A Development Concept Report Prepared on Behalf of the Civic Administration by the City Planning Department, March, 1971 - pages not numbered.
1. The Price Objective—to reverse the trend to spiralling land costs "so that fewer residents will be forced to rely on some form of subsidized housing."\(^8\)
2. The Profit Objective—to realize a profit from the sale of land which can be used to establish a public land bank.
3. The Planning Objective—"to create an urban environment of the highest order."
4. To maintain an adequate supply of serviced land for private residential use.
5. To provide an adequate supply of serviced land for public purposes.
6. To guarantee the most economic form of growth for the City as a whole.\(^9\)

Priorities among the objectives were not set and the dichotomies which existed were not clarified. The special department was simply expected to realize all objectives in the model community of Mill Woods.

Mill Woods is expected to eventually house 120,000 people. Planning will be comprehensive and development is expected to cover a long time-span—in excess of two decades. The project will not be completed until after 1991 and, as a result, the discussion which follows can only draw interim conclusions.

B. The price and profit objectives

In keeping with its policy of recovering costs, the department in charge of Mill Woods includes in its final

\(^8\)Ibid.

\(^9\)Ibid. An economic form of growth is one which is contiguous, and in the most logical direction from a cost point of view.
selling price for lots, the cost of local services such as street lighting, power, telephone, water connections, sidewalks, curbs and roads. The Mill Woods Department is treated by the City as if it were any other private developer in terms of the economics of providing for services. For example, Mill Woods had to bear the cost of extending a major trunk sewer to the area ($5 million) and through the development ($5 million). Part of the first cost was recovered when another major developer paid $1,800,000 to the City as its share of the cost of utilizing the same storm sewer.

Forty percent of the land in Mill Woods was dedicated to the City for municipal purposes. In addition, the Mill Woods Department "sold" 5% of its land to the City for public housing and other public purposes. This same policy is followed with other major private developers in other parts of the City.

Although Mill Woods is under the same restrictions as private developers, it has been able to keep the cost of housing lots in the land banking project lower than the cost of housing lots in private developments. (See Table 3.) Perhaps the best indication of the effect of public intervention in the land market is a comparison of publicly and privately owned lots within the confines of the Mill Woods development itself. (See Table 4.)

### TABLE 3

EXAMPLES OF RECENT PRICES FOR MIDDLE INCOME HOUSING LOTS
IN EDMONTON ($ PER FRONT FOOT)

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Mill Woods</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>105-110</td>
<td>125-130</td>
<td>135-140</td>
</tr>
<tr>
<td>West Jasper Place</td>
<td></td>
<td>120</td>
<td>137</td>
<td>180</td>
<td>250-300</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Dininsefield</td>
<td>141</td>
<td>141</td>
<td>160</td>
<td>184</td>
<td>Sold Out</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Londonderry</td>
<td>84</td>
<td>100</td>
<td>133</td>
<td>133</td>
<td>Sold Out</td>
<td></td>
<td></td>
</tr>
<tr>
<td>S. Edmonton</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>300</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>


### TABLE 4

COMPARATIVE ESTIMATED RESIDENTIAL LAND COSTS AND
RETURNS--ALL CASES. (IN DOLLARS PER LOT) 1973

<table>
<thead>
<tr>
<th></th>
<th>Mill Woods private</th>
<th>Mill Woods public</th>
</tr>
</thead>
<tbody>
<tr>
<td>Lot Size</td>
<td>55 ft</td>
<td>55 ft</td>
</tr>
<tr>
<td>Selling Price</td>
<td>$6,600</td>
<td>$6,325</td>
</tr>
<tr>
<td>Total Lot Costs</td>
<td>$6,041</td>
<td>$5,087</td>
</tr>
<tr>
<td>Raw Land Costs in $</td>
<td>$1,592</td>
<td>$1,068</td>
</tr>
<tr>
<td>Raw Land Costs as %</td>
<td>26.4%</td>
<td>21.0%</td>
</tr>
<tr>
<td>Service Costs in $</td>
<td>$3,860</td>
<td>$3,430</td>
</tr>
<tr>
<td>Service Costs as %</td>
<td>63.9%</td>
<td>67.4%</td>
</tr>
<tr>
<td>Planning, Sales and</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Administration $</td>
<td>$589</td>
<td>$589</td>
</tr>
<tr>
<td>Planning, Sales and</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Administration %</td>
<td>9.8%</td>
<td>11.6%</td>
</tr>
<tr>
<td>Return in $</td>
<td>$559</td>
<td>$1,238</td>
</tr>
<tr>
<td>Return as %</td>
<td>9.3%</td>
<td>24.3%</td>
</tr>
</tbody>
</table>


---

11 The increase in lot prices over time is in part a result of higher service costs and in part a result of higher land costs. Servicing costs have increased from $35.05 per front foot in 1965 to approximately $110 per front foot in late spring 1974—"an increase of approximately 300% in 9 years" Op. cit., Technical Report #4, p. 100.
Table 4 clearly indicates that raw land costs, servicing costs and, therefore, selling price are all lower for the public sector. It is not surprising that lot costs were lower for the public sector, as land was purchased quickly and quietly in an unexpected direction. The private sector purchased the land once the direction of development had been ascertained and seller expectations had increased. What is surprising about the costs recorded above, is the lower recorded servicing costs for the public sector. Research in other centres has shown that economies of scale in the servicing industries are not readily realized.\textsuperscript{12} The exception in the case of Mill Woods suggests that additional investigation of the recorded costs is warranted, particularly in view of the conflicting information discussed below.\textsuperscript{13}

In spite of the fact that a return of $1,238 per lot in the public sector is listed in Table 4, a total profit per residential lot was not realized. There were additional costs recorded in a manner not in accordance with acceptable accounting principles. The City has recorded that the return on investment was utilized as follows:

\begin{itemize}
\item $524 for additional purchase of right-of-way;
\item $350 for services carrying charges;
\item $450 for
\end{itemize}

\textsuperscript{12}See Chapter I.

\textsuperscript{13}A breakdown of servicing costs for the public and private sectors was not available.
additional services costs, for a loss of $86
made up in sales policy for multiple housing,
commercial and industrial lots.14

If an additional $800 in servicing costs was
incurred by the public sector but not recorded, the return
on investment is not nearly as impressive as the records
suggest. (Return in dollars--($1,238) $438; Return as
%--(24.3%) 7%.) The information that has been recorded in
the public accounts is misleading and may have been mani-
IPulated. A further breakdown of costs and a definition
of terms is required before a clear understanding of the
price and profit situation as it pertains to Mill Woods
can be ascertained.

As it now stands, it can be suggested that a
small hidden subsidy is being provided to the purchasers
of residential lots in the public sector of Mill Woods
and that the City is not making a profit in the sale of
residential lots. If an over-all profit is realized in
Mill Woods, it is because commercial and industrial lots
are being sold.

Further, the Mill Woods project has been unable to
affect total land values in the City of Edmonton, because
the supply of serviced land has been limited and has not
met demand. The price of lots and houses has continued to
move up dramatically as evidenced by Table 5.

**TABLE 5**

INCREASES IN LOT PRICES IN EDMONTON 1967-1976

<table>
<thead>
<tr>
<th>Year</th>
<th>Cost</th>
<th>Percentage Increase</th>
</tr>
</thead>
<tbody>
<tr>
<td>1967*</td>
<td>$3,700</td>
<td></td>
</tr>
<tr>
<td>1968*</td>
<td>4,300</td>
<td>16.2%</td>
</tr>
<tr>
<td>1969*</td>
<td>4,600</td>
<td>6.9</td>
</tr>
<tr>
<td>1970</td>
<td>5,885</td>
<td>27.9</td>
</tr>
<tr>
<td>1971</td>
<td>6,663</td>
<td>13.3</td>
</tr>
<tr>
<td>1972</td>
<td>6,913</td>
<td>3.0</td>
</tr>
<tr>
<td>1973</td>
<td>7,944</td>
<td>14.0</td>
</tr>
<tr>
<td>1974</td>
<td>9,885</td>
<td>24.0</td>
</tr>
<tr>
<td>1975</td>
<td>13,118</td>
<td>32.0</td>
</tr>
<tr>
<td>1976 (first quarter)</td>
<td>16,740</td>
<td>27.0</td>
</tr>
</tbody>
</table>

Source: Dennis and Fish, Table 6, p. 79. 1970-76 CMHC Canadian Housing Statistics—based only on NHA financed homes.

C. The planning objective—land use and the timing of development

Although the original emphasis in Mill Woods focused on the reduction of land costs, the City almost immediately decided to employ

the most advanced planning techniques in designing a comprehensive development plan conducive to accommodating the entire spectrum of income levels residually, as well as providing for all the requisite service facilities.15

In spite of the fact that advanced planning techniques were used in the actual design of Mill Woods, the traditional

planning procedures of Alberta were followed. These procedures involve three main steps:

1) The development of an Outline Plan which is a broad statement of principles and concepts covering a large area.
2) The development of a Neighbourhood Outline Plan which covers smaller areas and is done in much more detail.
3) The development of a Subdivision Plan which is done in great detail and indicates the use and dimension of all lots, streets, parks and schools.16

The responsibility for design of Mill Woods was given to the City Planning Department. The resultant Development Concept made use of an open-ended planning process. The comprehensive planning techniques employed can be summarized as follows:

1) The development of social, physical and economic objectives aimed at creating a residential community responsive to human needs and to changing circumstances.
2) The formalization of a community urban form based upon the stated goals and objectives and in harmony with the geographical characteristics of the site.
3) The translation of the anticipated needs of the community and its residents into a basic physical frame or outline plan which would identify key components essential to satisfactory community functions and form.17

The Outline Plan which was accepted by City Council was based on a modified new town concept. Mill Woods is to have a Town Centre with a commercial component which will

employ an estimated 10,000 people. The expected total population of 120,000 will be housed in a variety of housing units. The open space area which is 4% of the total area, has been planned to include neighbourhood and district parks, and a larger central park. The recreational area will include a 27-hole golf course.¹⁸

The City owns 68% of the total land in the Mill Woods development. This acreage includes the most vital areas from a planning viewpoint. For example, both sides of Mill Creek are publicly owned and have been retained as part of the open space area.

The planning of the site has included the entire 6,500 acres, as agreements to comply with the City Concept have been reached with private landowners. As a result, the Mill Woods site has been planned so as to take into account the physical topography and the site's relationship to adjoining areas. Three types of housing--single family units, multiple family units and public housing--have been integrated into the development. In addition, the planners have been able to correlate community facilities because they have planning control of the entire site.

The first 320 lots were ready for development in the fall of 1971. Of these, the City planned to offer

¹⁸See Appendix D, Mill Woods Case Study for a complete breakdown of land use.
230 to private individuals and the rest to the building industry. One thousand and forty-one applications for the 230 lots were received, an indication of the shortage of serviced lots in Edmonton.\textsuperscript{19} As a result of the extraordinary response to the offer for lots, a draw was held. The winners purchased lots for $105-110 per front foot (approximately $5,775-6,050 per lot).

In 1973, 700 lots were sold and in 1974, 1,000 lots were sold. In each subsequent year, one subdivision has been ready for development. In this way, the City is able to manage the financing of servicing, which it does itself.

Multiple family sites in Mill Woods are disposed of on a fixed price basis. Individual applications are reviewed and City Council makes the final decision as to which contractors receive the particular sites offered.\textsuperscript{20}

Public housing will eventually make up 9.9% of the total housing units. There has been a concerted effort to maintain the public housing component of the total housing stock.

D. The planning objective and politics

When the City of Edmonton first announced its decision to develop Mill Woods, the large private developers


\textsuperscript{20}Ibid., p. 7.
objected strenuously. They already owned large tracts of
land in other areas of the City; in many instances applica-
tions for subdivision approval had been submitted. In a
competitive situation, the City would hold a considerable
advantage because it could assure preferential treatment
with respect to servicing for Mill Woods.

In actual fact, the City did show preferential
treatment for Mill Woods. Part of Mill Woods was serviced
before the private developments, but at the same time the
City did increase its servicing capacity to enable it to
service sections of other subdivisions simultaneously.
In one instance also, agreement was reached with BACM
Development Corporation of Winnipeg, allowing it to provide
its own services in Castle Downs.

In Mill Woods, an amiable relationship has developed
between the City and a number of small private contractors.
City Council has been responsible for deciding which con-
tractors will be able to purchase sites for multiple family
units. In addition, a certain percentage of serviced lots
are retained annually for purchase by private contractors.

These small contractors are extremely happy with
the arrangement because it enables them to compete with

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21 The map shows the location of large private
developments in the Edmonton area. These include:
Castle Downs, North East Edmonton, Kaskitayo, West Jasper
Place and Riverbend Terwillegar Heights. In addition to
these five major growth areas, Mill Woods competes with
the satellite communities of St. Albert, Sherwood Park
and Leduc.
large developers. They had never before been in a position to hire city planners or consultants or to submit detailed plans for large subdivisions. They had primarily been involved in building a few private homes annually. With the City's assistance, most of these contractors have been able to expand their operations.

At the same time, the large developers have accepted the City's role. Because Edmonton is growing as quickly as it is, demand for housing has not been met and therefore the private developers have not been challenged by the City as they once anticipated. If growth slows considerably, this relationship may reverse itself.

The over-all result in Edmonton has been a good working relationship featuring the City, large developers and small contractors. There are a total of six Outline Plans covering the entire area of the City of Edmonton. Three plans were prepared by consultants for private developers; one plan was prepared by the City Planning Department in conjunction with private developers and two were prepared solely by the City Planning Department.22

As in most Canadian cities, the development industry has been accommodated. The unique feature in Edmonton, however, is that it is the small contractor and not the big developer who has benefited the most.

E. The planning Objective—land ownership as a control device

The City of Edmonton purchased 68% of the land in the Mill Woods development and could therefore anticipate control of the direction and rate of growth and the rate of servicing.

The direction of growth was guaranteed as a result of public ownership of the land, but there were other factors which largely accounted for the rate of growth. The population of the Edmonton area has been rising very rapidly; the demand for serviced lots and houses has been extraordinary. There is no need to control growth, but rather a need to supply serviced lots as quickly as possible. Therefore, the rate of development on the whole has been determined by the finances available to complete servicing. If additional finances were available, Mill Woods could be developed at a much faster rate.

The rate of growth has also been retarded by two of the City's policies: 1) The City has chosen to do all servicing itself. This has reduced the over-all pace of servicing, reduced the supply of serviced lots, and has had an inflationary effect on prices. 2) The City has introduced comprehensive planning in Mill Woods which is extremely time consuming. The City however has chosen to trade off speed for an esthetically pleasing development. This, too, has
aggravated the already pressured housing market, thereby increasing housing prices even more.23

The City of Edmonton, because it owned a substantial portion of the Mill Woods site, was in the position to replace the traditional control devices with control through ownership. Instead, it chose to continue using traditional devices such as zoning. However, zoning in Mill Woods has been used in an effective way. That is "the proper or likely future land use" has been determined before zoning ordinances have been passed. The planners worked with the entire 6,500 acres and determined land use and over-all density before applying for zoning bylaw changes. Mill Woods demonstrates that traditional control devices can be used effectively, if they are accompanied by innovative planning.

On the whole, public land ownership has played a relatively small role in the timing of development. 1) It facilitated the achievement of some technical requirements, thereby speeding up the entire development process. For example, road systems have been planned and constructed without the usual long negotiations with private landowners for rights-of-way or egress and access provisions. 2) Land ownership has been used as a means of controlling the timing of development, in the sense that before the City resold

23Increasing the capacity of small builders has not offset these two policies which have slowed the rate of development.
land to building contractors for commercial or industrial use, agreements were signed guaranteeing construction before a specified date.

It is difficult at this early stage to evaluate the Mill Woods development. What can be said is that a "grand design" has replaced the typical adversary approach to planning. If Mill Woods resembles the planned concept, the City may succeed in "creating an urban environment of the highest order." But the planning success of Mill Woods must be attributed to the innovative designers and the City Council which implemented the plans, and not to public land ownership.

F. Conclusions

The complex objectives of the Mill Woods project almost guarantee that all of them will not be met. There are inherent inconsistencies among the objectives which have not been resolved.

The prime objective (the first one articulated) was to lower the cost of land and thereby housing in Mill Woods. The data reveals that housing in Mill Woods is cheaper than in the surrounding areas. However, it is quite possible that lot purchasers in Mill Woods are being subsidized from the public purse. In addition, it is not at all clear that the middle and upper income homeowners in Mill Woods are deserving of such a subsidy.
The second objective of the project was to generate monies with which to fund a land acquisition program. To date, the project has not generated such funds. This is most probably the result of the incompatability of the first two objectives. It would appear to be impossible to generate sufficient profit to finance a land banking program and at the same time to sell the land at less than market value.

The planning objective of creating an environment of the highest order which respects the social, physical and economical needs of its residents, has had an effect on the profit and price objectives. Well planned, aesthetically pleasing and elaborately serviced developments are also costly. That cost is reflected in the price charged for each lot and, in at least one respect, explains the lack of profit from the project.

From a planning viewpoint, Mill Woods has been successful, to date. However, this is more the result of comprehensive, innovative planning than of public land ownership. Traditional planning tools were used and have not been superceded by control through public land ownership.

In Mill Woods, agreement was reached with private contractors, which allowed the City to plan the entire site with a "grand design" in mind. The contractors benefited from the arrangement as they did not have to bear the responsibility and cost, which few could afford, of planning.
If public sector planning is preferable to private sector planning, similar agreements could probably be reached with private builders elsewhere.

The secondary objectives of maintaining an adequate supply of serviced land for private and public purposes, have not been reached in Mill Woods. The City has been unable to provide services quickly enough to cope with the rapidly growing population, and development has therefore been slowed down. By insisting that all servicing should be done by the City itself, development has been further retarded. The high demand has pushed up prices outside of Mill Woods, in spite of the fact that they have been artificially restrained within Mill Woods.

The one objective which has been met is a minor one indeed. By locating Mill Woods where it has, the City stopped the spread of development along the banks of the North Saskatchewan River. Edmonton is now shaped more like a square. As a result, infrastructure has not been extended as far as it may have been if the southwest-northeast axis had been continued. In addition, the province was able to purchase the land for Mill Woods at a reasonable price. Land in the expected area of growth may have been more expensive as seller expectations would have been higher. Therefore, the Mill Woods project can be said to have achieved an economic form of growth.
Mill Woods is currently incomplete. If the City wishes to meet at least some of the primary objectives which it has set out, the inconsistencies and dichotomies must be resolved and priorities established.
CHAPTER IV

Conclusions

The proponents of public land banking claim that politicians, planners and developers have obstructed the functioning of the free market system of land. They propose public ownership of land to guarantee public sector control of pricing, allocation, land use and the timing of development.

There are few Canadian examples of extensive land banking projects. The empirical examinations in this thesis were of Saskatoon, because it has the oldest and most widely publicized land banking program; Hamilton, because it is one of the few examples of a land assembly project within a metropolitan area; Red Deer, because it has the most intensive program in Canada; and Edmonton, because it is an excellent example of a program where the planning objective may be achieved in a large urban centre.

The examination of actual land assembly projects has highlighted the difficulties encountered and has allowed the author to evaluate the extent to which the three objectives of land assembly were achieved. The conclusions reached are presented in this chapter.
Theoretically, public land ownership can be used as a tool in the development of well-planned communities. In the majority of the actual cases studied, this tool was not used effectively.

The limited success of land banking programs has been due primarily to the fact that the people who have been involved in the organization and direction of the programs have been inexperienced, have attempted to achieve all three objectives simultaneously, and have not clearly understood the dichotomies inherent in the objectives they have pursued.

The conclusions presented below specify the problem areas and the criteria which must be met if the objectives of land banking are to be attained. Finally, the viability of land banking as opposed to other means of control of land use and the timing of development will be reviewed.

A. The Price Objective

The price objective as defined by the proponents of public land assembly, is to reduce shelter costs. This objective has not been achieved. Instead, subsidies have been granted to a few select buyers who acquired public lands at less than market value.
In each of the cases studied, at least some of the land in the public assembly was sold below prevailing market prices. Quite frequently, the accounting systems used did not reveal the exact amount of the subsidy provided to the land purchasers. In none of the cases was there an attempt to correlate need with the subsidy. As a result, in Saskatoon for example, select individuals and contractors have been able to realize profits by purchasing land at below market price from the City and reselling it at market price. "One man bought a lot for $7000 and tried to sell it soon afterwards for $45,000." ¹

It was not surprising to learn that the price of land in general was not reduced as a result of public land banking. The literature examined had stated that in order to lower the cost of land, a land assembly agency must control sufficient reserve land to exert leverage on the market. The literature provided only unsubstantiated estimates of the amount of land which might be required (see Chapter I).

The examination of four cases did not clarify this matter to any extent. The amount of land held by Saskatoon (in excess of 50%) was obviously insufficient to do more than stabilize prices for a few years. Of the four cases

studied, Red Deer came closest to achieving the price objective, although the City itself relegated this objective to a secondary position. As Red Deer controls virtually all the land within its City limits, this would suggest that a public agency would have to control a substantial amount of land in order to influence the market sufficiently to bring down prices.

Surveys conducted by CMHC, Dennis and Fish, and numerous other researchers had revealed that much of the stock of peripheral land in urban areas is held by private developers. This study has revealed that there are two approaches which might be contemplated by agencies in large urban centres faced with this problem. 1) If an alternative direction of growth is possible, as it was in Edmonton, a public agency might contemplate land purchases in that area. 2) A public agency might contemplate the development of satellite communities. These can offer an alternative lifestyle but the cost of infrastructure would be considerably higher than in the development of peripheral land. 2

In smaller centres, such as Red Deer, land can be purchased well in advance of need and at low cost. If the small centre experiences periods of rapid growth, and the

---

2A public agency could approach the owners of the privately held peripheral land with an offer to plan the land using a Replotting mechanism. This would not result in the achievement of the price objective, but could result in public sector planning of urban peripheral land without the cost of purchasing or expropriating highly priced land.
land appreciates in value, the public agency can artificially control the price of all land within its City limits.

This study has demonstrated, however, that land ownership is only the first step in controlling land prices. The public authority must also be able to correctly estimate the number of serviced lots required annually. Unless it does so, it will fail to achieve the price objective. This fact was substantiated by the examples of Saskatoon and Red Deer. For the past two years, Saskatoon has failed to supply enough new land to meet the demand, and as a result lot and house prices have soared 66%. In Red Deer, an inaccurate estimation of serviced lot requirements resulted in a private intervention in the market, which had hitherto been publicly controlled, and the sale of lots at a price considerably in excess of publicly controlled prices. (See Case Study No. III.)

In attempting to control prices, a land banking agency is in effect replacing the market mechanism with administrative decision-making. In order to avoid serious misallocation of resources, the public agency involved in this type of decision-making must be cognizant of all factors involved in the allocation of land. They will have to know how much land to purchase, where to purchase it, when and how much land to service, and when and how much land to release. In addition, the public agency must be prepared to constantly monitor the

system it sets up. If it does not, deviations will occur and the objective of controlling prices may not be attained. The example of Saskatoon's developers, who were able to realize substantial profits by selling land that they had purchased at below market price from the City, to individuals at market price, demonstrates this point. (See Case Study No. I.)

After many years experience in urban land banking, Saskatoon has begun to see the implications of its intervention in the market and has begun to establish controls. Very recently Saskatoon took steps to prohibit the violation of "the spirit or intent of the land banking system." Lots can no longer be traded or resold without City approval. Any lot surplus to a contractor's needs must be offered back to the City at the original price.

Other cities contemplating the introduction of urban land banking as a means of controlling prices, should be cognizant of the deeper implications of their intervention in the market place. Ownership will only provide the wherewithal for achieving their goal. A sophisticated system for projecting supply and demand and a means of controlling and monitoring administrative decision-making is also required.

The examination of four cases revealed that Red Deer was the most successful in achieving the price objective.

Red Deer is also the smallest city of the four studied and has the slowest and most stable rate of growth. This has led to the conclusion that prices are most readily controlled in small cities with slow and stable growth rates, where supply requirements are most easily estimated. The price objective is difficult, if not impossible, to realize in rapid growth areas. Peter Spurr, in his study for CMHC, reached basically the same conclusions:

In the largest cities, the expense entailed in monopolizing the land supply, the anti-redistributive nature of the subsidy, the speculation opportunity, the unfavourable stock conditions, and its growth promoting attributes combine to severely limit the feasibility of a price control program.

The price objective may be more readily attained in smaller centres, but in those instances it will benefit few Canadians. Public land banking does not appear to be a practical solution for reducing the price of land in the large metropolitan centres in the short term.

B. The Profit Objective

The profit objective refers to the recovery of profits accruing from land development for the public treasury. The first thing that must be realized is that the profit objective

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5 Edmonton 24%, Hamilton 13%, Saskatoon 12%. For percentage increase in population of Canada and the metropolitan areas 1966-74, see Appendix B. Red Deer 1.7%, 1966-69.

cannot be pursued at the same time as the price objective. "The two are obviously mutually exclusive." In the cases studied, the two objectives were never attained simultaneously.

It should be mentioned at this point that there is a difference between the profit which is recorded in land banking accounts and profit as it refers to the pure price appreciation of raw land. It is the latter which involves the profit objective. The difference may be explained by the fact that land banking agencies: a) can plan and service lands and record approximate costs only, b) can consciously sell land at lower than market prices, and c) can use accounting techniques in recording costs and profits which are inaccurate.

Because it is difficult to ascertain pure price appreciation of raw land (pure capital gain), particularly where a public agency controls virtually all the land within its city limits, accounting profits have been used as a proxy measure of pure capital gain.

Saskatoon, Red Deer and Mill Woods all sold lots at less than market value. All three used accounting systems which are highly suspect. Yet in spite of the fact that figures may have been manipulated to show a more favourable

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balance, not one of the three cities realized a profit from its land banking program.

Hamilton sold the majority of its lots at market price and as a result was extremely successful in attaining the profit objective. In the Federal-Provincial Assembly alone, a profit of more than $14 million was realized.

Another conclusion reached in this thesis was that if a public land assembly agency sells land at less than market value, it will not realize sufficient profit to finance additional land purchases. Saskatoon found it necessary to turn to senior governments for financial assistance in purchasing land for future requirements and Red Deer expects to do the same.

Thirdly, a public agency must realize not only that the price and profit objectives cannot be pursued simultaneously, but that it must be clear as to which objective will receive priority. Mill Woods should be able to realize a substantial profit from land sales as the City is large, growing rapidly, and lot prices are escalating quickly. In all probability, Mill Woods has not been definitively successful in achieving either the price or profit objective, because its objectives are unclear and priorities have not been set.

It would appear that in large urban centres, the profit objective should receive priority over the price
objective. It is the more logical objective to pursue because it is the more readily attained. It does not require the development of a new means of allocating a scarce resource. It requires simply that the City assume the role of a private developer.

The increment in land values would then fully accrue to the community, which has created it. The community then could—and should—use this profit to reduce the housing expenses of low-income families. The benefits of the landbank policy would accrue to those most in need.\(^8\)

Although the profit objective has been successfully achieved in one large urban centre and could probably be achieved in others as well, if sufficient priority was given to it, the whole question of land banking as the proper mechanism for achieving the profit goal is still open to question.

The financing of a land banking program is extremely costly and by placing an inordinate emphasis on land purchases, a city must forego other opportunities. The continued financing of an intensive land banking program is an ever greater burden as the price of new parcels of peripheral land escalates.\(^9\) Saskatoon and Red Deer where an intensive

\(^8\) Ibid., p. 8.

\(^9\) When the government agency begins to replenish its stock, the competitive price of raw land outside the assembly will be higher because of increased demand, lessened supply and higher value expectations. See Chapter I, Section III: Financing.
program has been in effect, both attest to this fact, as
do non-Canadian examples. There are other means of
recovering the increased value of land which is due to the
development process. These alternatives do not require
immense initial expenditures, administrative skills or
continued allocation of financial resources. A variety of
tax measures should be considered as more readily imple-
mented alternatives to a public land banking program.

C. The planning objective--land banking as a control tool

1. Planning Acts

The planning procedures, with only one exception,
were more time consuming after the introduction of public
land assembly than they were before. In the four cases
studied, the traditional approval processes remained intact,
with planning decisions requiring approval from at least
two levels of government. The provincial governments main-
tained control over the broader issues of environmental
protection, continuity and quality of services. The local
governments all introduced more comprehensive planning at
the same time as they introduced public land assembly.

The combination of comprehensive planning super-
imposed on public land assembly has not made the procedures
set out in provincial planning Acts more efficient.
Agreements with regard to the technical requirements of new

10 See Introduction.
subdivisions have required slightly less time than they might have if the land had been privately held. This can be attributed to the fact that egress and access requirements could be met without concern for rights of way. With this exception, public ownership of land has done little to make the approval and development processes less time consuming.

As a result of the examination of the Hamilton area, it also became obvious that the objectives of a project must be determined in advance and priorities must be set, if time is an important factor. Ownership does not guarantee straightforward control. Bickering and disagreement among involved parties can result in continued delays. If these delays are to be avoided, one agency must retain responsibility for all aspects of the project. It is felt that responsibility should rest with a local body and should not be channeled through a provincial agency. The Hamilton experience established an uncomfortable precedent. Local government is a cherished tradition with close ties to the grassroots. Its decisions may be less sophisticated but its responsibility centres are readily identified and more easily challenged.

2. Official Plans

As a result of public ownership of the land and more extensive public involvement in the planning process from the very start, it is reasonable to expect Official Plans to
be more complete and more flexible than they have been in the past. This has been the case in the four cities studied.

Mill Woods is the best example of innovative planning among the five developments examined. The Mill Woods development promises to become a complete community servicing the needs of 120,000 people from diverse backgrounds and income levels.

It can be concluded, as a result of this study, that innovative designs are not a necessary outcome of public land ownership. All four of the cities had the opportunity to develop imaginative suburban concepts. However, Saskatoon and Red Deer can be described as typical Canadian cities. Housing types have not been integrated and the population has been segregated by income. Perhaps because Red Deer is relatively small, there has been no need to accommodate a variety of life styles and needs in the Official Plan.

The Federal-Provincial Assembly in Hamilton is an excellent example of an unimaginative group of subdivisions. Although the Saltfleet Assembly was an improvement on the earlier assembly project in Hamilton, it does not stand out as an example of innovative planning in a Canadian context.

It is not difficult to conclude from the four cases studied, that innovative, comprehensive designs require an innovative council and/or planning department. Ownership does provide straightforward access to control; it does allow
a public authority free range in planning. But without initiative on the part of politicians and public servants, the resultant development will not be innovative or outstanding in design.

3. Subdivision Controls

Although ownership of the land guarantees public sector control over the direction of growth, it could still be argued that public land ownership is unnecessary and that the public sector can determine the direction of growth by determining the sequence of subdivision approval and servicing. The public sector must retain control over servicing, as Edmonton does, if this alternative is to be effective. Control over servicing, however, is less expensive than actual land acquisition.

Uncertainty as to the direction of growth can be avoided if long-range plans are developed and announced well in advance. The uncertainty which is attached to other public and private investments affected by the location of future public services will also be reduced.

Public ownership of the land can guarantee control over the sequence of development. Saskatoon and Red Deer attest to the fact that orderly and contiguous development and a clear demarcation between rural and urban uses are possible with public land banking. Neither of these cities has unplanned suburban communities, fringe or leap-frog
developments. Again, however, the whole question of sequence of development can be determined by public sector planning and servicing. It is not at all clear that public ownership of the land is necessary.

This study has demonstrated, however, that the rate of development can only be controlled through public land ownership. Where land is privately held, subdivision requests are initiated by developers. Permission to develop land cannot be given by the authorities at a greater rate than developers request it. No City Hall can force a developer to turn approved land into housing lots faster than he wants to. In the past, developers have been accused of creating artificial shortages of land and housing. There can be little doubt that the mechanisms for achieving these shortages were available. With control of the rate of development firmly entrenched in the public sector, these artificial shortages cannot occur.

However, it must be realized that by assuming control over the rate of development, the public sector is also assuming the entire risk associated with assuring an adequate supply of serviced lots. In Hamilton, the rate of development was delayed by continual bickering among the involved parties. In Red Deer, in spite of a relatively slow and stable rate of growth, the City made two errors in projecting demand requirements. Recently, Saskatoon made a similar
error which resulted in substantial price increases for lots and houses. In order to minimize the risk associated with matching supply and demand, the public sector must develop sophisticated projection mechanisms. The possibility of error is greater in areas of rapid or fluctuating growth rates, thereby making it all the more important to acquire in the public sector the skill of a successful speculator or entrepreneur who knows where to buy land, how much land to accumulate, what price to pay, how long to hold the land and when to sell or lease it. Land ownership alone, will not guarantee control of the direction and rate of growth. Administrative and entrepreneurial skills, clear objectives and sophisticated projection mechanisms are required as well.

4. Zoning

Zoning has been criticized as being ineffective in controlling urban growth, as being a static prohibitive control and one that cannot change quickly enough with changing community goals. As a result, it has been suggested that zoning could be replaced by public ownership used in conjunction with a "grand désign" approach to planning.

Of the four cases studied, only Red Deer replaced zoning with comprehensive planning and land ownership, and

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11See The Norman Pearson Model, Chapter II.
it did so only on a temporary basis. Once development was imminent, zoning was superimposed on the Official Plan.

The other cases examined all used traditional zoning techniques in achieving the desired goals. Mill Woods was most successful in its efforts because it used zoning as a tool of comprehensive planning. First, the "proper or likely future land use" was determined and then appropriate zoning ordinances were passed.

The opportunity to replace zoning with public sector planning and guarantee the plan by public ownership was clearly available in each of the four cases studied. The fact that the opportunity was by-passed demonstrates that innovative planning can use traditional control devices effectively.

Zoning was used to implement a plan; it was not used as a static prohibitive control. In order to develop a community which can service people from diverse backgrounds and income levels, large-scale public sector planning is a necessity. Public land ownership is not.

D. The political process and public land banking

The Mill Woods Case Study demonstrated that the public sector can and does on occasion react to the needs of less powerful groups in the building industry. The City of Edmonton undertook to assemble the land, and to do the planning for small contractors who were then in a position
to compete with large-scale developers. By doing this, Edmonton was able to increase the housing stock at least marginally. This, in turn, was beneficial to the public in general, whose demand for housing had exceeded supply for some period of time.

It is possible for similar arrangements to be worked out in other cities where private contractors may already own small sections of land. The public sector could undertake all planning, an expense which few small contractors can afford. In turn, the contractors would agree to adhere to the plans and conditions laid down by the public sector. A Replotting mechanism may be useful in this regard.

The situation in Edmonton is encouraging because it demonstrates that less powerful interest groups can make inroads into an entrenched political system.

In most Canadian cities this type of response has not been forthcoming. Elected officials have continued to sympathize with real estate and land development interests because there is a strong sense of identity, and common goals and aspirations between the two groups. The "fraternal relationship" which has evolved between City Council and Saskatoon developers is an excellent example of how clearly focused and repeatedly articulated demands presented by well-financed organizations will continue
to take precedence over the diffuse and disorganized "public interest."\textsuperscript{12}

The difference between Saskatoon and Edmonton cannot be attributed to public land ownership. Both cities own land. Politics has influenced planning decisions in both cases. In one instance, the response was to a less powerful group. Only by making the political system more responsive to the "public interest" will planning decisions reflect public needs.

E. A final evaluation--land banking as a tool in the planning process.

The benefits of public land banking can only be attained if specific criteria are met:

1. The objectives of the program must be clearly articulated and understood. There should not be an attempt to attain conflicting objectives simultaneously.

2. Land banking must be used in a political system which is attuned to the public interest. If it is not, the predictable Canadian suburban development pattern will continue. Developers and the middle class will continue to have their demands met while the inarticulate urban poor will continue to be by-passed.

\textsuperscript{12}See Saskatoon Case Study--the political process.
3. Land banking must be administered by an efficient management which has developed comprehensive strategies for purchasing, servicing and marketing land.

4. Planning must be seen as a separate procedure, not to be confused with land banking. Planning, on its own, must be comprehensive and innovative if the resultant development is to be outstanding in any sense.

If these criteria are met, public land ownership can be an effective tool in the planning process. It can provide the basis for agreements between developers and the public sector. It can guarantee that the rate of development will be controlled by the public sector. It can also guarantee that the direction and sequence of development will be controlled by the public sector, but in this instance control of servicing may be a more practical means of reaching the objective. In addition, public land ownership can replace zoning as a control device if planners wish to function without the constraints of traditional controls. Lastly, public land banking can guarantee public sector planning of large areas.

It can therefore be concluded that public land banking is a useful tool in the planning process. However, there is an enormous cost involved in employing that tool. The cost of large-scale land purchases in metropolitan areas
would constitute a burden few major cities could afford. The benefits of the program would not be realized in the immediate future.

In addition, the major accommodation problems facing metropolitan areas at this time are high prices and a shortage of housing stock. Although there is a desire to plan more attractive and effective communities, this is not a priority issue with either city councils or the general public.

Public land banking could be an effective tool in the planning process. It is not an effective tool for reducing housing costs in large urban centres, nor is it an effective means of reducing the time-consuming planning process. Urban land banking is a long-term process. Therefore, it will do little to ameliorate today's housing problems. Under the circumstances, it would seem that the benefits of public land banking do not justify the expenses involved and opportunities foregone.
APPENDIX A

To Chapter II

Summary of Planning Procedures in Canadian Provinces other than Ontario


Municipal Planning:

Step I Minister must approve and authorize the preparation of a planning scheme.

Step II a) An advisory planning commission is appointed.
     b) A planning scheme is prepared.
     c) A public hearing is held--the ratepayers must grant assent if money is to be spent.

Step III Minister grants final approval of planning scheme.

Objections are heard by the Manitoba Municipal Board whose decisions are binding.

Land Acquisition:

Sec. 31(1) "A local authority may purchase and, in accordance with, and subject to the provisions of, The Expropriation Act, expropriate land for the purpose of a planning scheme."

Sec. 31(2) "A local authority acquiring land under subsection (1) may, subject to such terms and conditions as it considers fit to impose, resell such land and use the proceeds to defray the expenses of the planning scheme."

Municipal Planning:

Step I  Town council can set up a town planning board, consisting of mayor and six other persons, three of whom must be councillors.

Step II  "Subject to the approval of the Minister any council shall have power:  a) to prepare a plan or plans for development," using technical advice.

Step III  Council adopts plan. Public hearings held.

Step IV  "Every official town plan and every bylaw, resolution, plan or other document or proceeding made by a council in the exercise of its powers ... shall be subject to the approval of the Minister, and when so approved shall have the force of law."

Land Acquisition:

Sec.11(1) The town council may, a) purchase land to carry out a project.  b) purchase land adjacent to a project.  c) "any lands which may be injuriously affected by the project."  d) "any lands which would prejudicially affect the full enjoyment of any building forming part of the project or the architectural effect thereof" if it were built upon.  e) "any lands which the council is of the opinion could be conveniently and profitably subdivided or re-arranged and developed as part of the project."

Sec.11(2) "The Council, for the purpose of this Act, may purchase or otherwise acquire lands for town planning purposes."

Community Planning:

Sec. 696 "The council may have community plans prepared or revised from time to time."

The community plan becomes official when it is passed in the form of a bylaw by two-thirds of council members and receives the approval of the Lieutenant-Governor in Council.

Sec. 700 "The Minister may, upon request by a council, furnish advice or assistance in community planning matters."

Sec. 823 provides for use of a reploting scheme and the realottment of land.

Land Acquisition:

Secs. 464-476 deal with the acquisition of property by towns, or local districts. If the agreement to acquire real property contains any "restrictive covenant," the municipality requires the approval of the Inspector of Municipalities. Municipal councils can use acquired property for residential, commercial or industrial purposes.

Municipal Planning:

Step I  The municipal council can appoint a municipal planning commission which in turn can retain the services of special consultants.

Step II  When an application for subdivision is received by the municipal planning commission, it is reviewed and sent to the council.

Step III  Council sends the application for subdivision to the Provincial Planning Director.

Step IV  After approval by the Director, plans for subdivision are prepared, sent to the planning commission, then council and finally to the provincial Director for approval.

Secs. 28-52 provide for the use of a Replotting Scheme.

Land Acquisition:

Sec.117(1) "When a development scheme comes into force, the council may acquire by expropriation or otherwise any lands or buildings the acquisition of which is essential to the carrying out of the scheme . . . ."

The Minister may require a municipality to conform to the provisions of its general plans or development schemes.
Planning:

Step I "The council may by bylaw, approved by the Minister, appoint ... a community planning commission," which is made up of the mayor plus three to nine other members, the majority of whom are not council members or public servants.

Step II The Planning Commission prepares a municipal planning scheme with the assistance of a technical planning board. (Composition discussed in section dealing with the Saskatoon Land Bank).

Step III Council approves planning scheme which is then put on public view. Public hearing held.

Step IV Ministerial approval.

Land Acquisition:

Sec.30(1). "For the purpose of carrying out a community planning scheme or ensuring that any proposal contained in a scheme will be carried out according to the scheme, the council may purchase or otherwise acquire land ..."

Municipal Planning:

Step I Council applies to Minister for definition of planning area.

Step II Municipal Plan is prepared under direction of qualified planners or planning consultants who have been approved by the Minister. It is based on "surveys and studies of land use, population growth, the economic base of the municipality, its present and future transportation and communication needs, public services, social services and other factors."

Step III Plan is authorized by Municipal Council, and displayed for public scrutiny. Hearings held by a commissioner appointed by the Minister.

Step IV Application for final approval from Minister.

Land Acquisition:

Sec. 33(1) "When a Municipal Plan or any further plan or scheme comes into force, the Authorized Council may acquire by expropriation or otherwise any lands or buildings the acquisition of which is essential to the carrying out of the plan or scheme, together with lands a) that are the remnants of parcels, portions of which are necessary for carrying out the plan or scheme, or b) that may be injuriously affected by the plan or scheme."
## Appendix B

Chapter III - Saskatoon Case Study

### Table 1

**Census Counts and Estimated Populations of the Census Metropolitan Areas of Canada 1966-1974**

<table>
<thead>
<tr>
<th>Metropolitan Areas</th>
<th>1966</th>
<th>1969</th>
<th>1971</th>
<th>1974</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>(population in thousands)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Canada</td>
<td>20,015</td>
<td>21,001</td>
<td>21,569</td>
<td>22,446</td>
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<tr>
<td>Total Metro. Areas</td>
<td>10,684</td>
<td>11,444</td>
<td>11,876</td>
<td>12,335</td>
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<tr>
<td>% of Cdn. pop.</td>
<td>53.4</td>
<td>54.5</td>
<td>55.1</td>
<td>55.0</td>
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<td>Calgary</td>
<td>331</td>
<td>378</td>
<td>403</td>
<td>444</td>
</tr>
<tr>
<td>Chicoutimi-Jonquière</td>
<td>133</td>
<td>133</td>
<td>134</td>
<td>137</td>
</tr>
<tr>
<td>Edmonton</td>
<td>425</td>
<td>470</td>
<td>496</td>
<td>529</td>
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<tr>
<td>Halifax</td>
<td>210</td>
<td>219</td>
<td>223</td>
<td>224</td>
</tr>
<tr>
<td>Hamilton</td>
<td>457</td>
<td>488</td>
<td>499</td>
<td>520</td>
</tr>
<tr>
<td>Kitchener</td>
<td>192</td>
<td>213</td>
<td>227</td>
<td>238</td>
</tr>
<tr>
<td>London</td>
<td>254</td>
<td>276</td>
<td>286</td>
<td>296</td>
</tr>
<tr>
<td>Montreal</td>
<td>2,571</td>
<td>2,700</td>
<td>2,743</td>
<td>2,798</td>
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<tr>
<td>Ottawa-Hull</td>
<td>529</td>
<td>574</td>
<td>603</td>
<td>626</td>
</tr>
<tr>
<td>Québec</td>
<td>437</td>
<td>461</td>
<td>481</td>
<td>499</td>
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<tr>
<td>Regina</td>
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<td>141</td>
<td>151</td>
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<td>285</td>
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<td>303</td>
<td>311</td>
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<tr>
<td>St. John's</td>
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<tr>
<td>Saint John</td>
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<td>106</td>
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<td>112</td>
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<tr>
<td>Saskatoon</td>
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<td>130</td>
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<tr>
<td>Sudbury</td>
<td>137</td>
<td>148</td>
<td>155</td>
<td>154</td>
</tr>
<tr>
<td>Thunder Bay</td>
<td>108</td>
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<tr>
<td>Toronto</td>
<td>2,290</td>
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<tr>
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<td>1,025</td>
<td>1,082</td>
<td>1,137</td>
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<tr>
<td>Victoria</td>
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<tr>
<td>Windsor</td>
<td>238</td>
<td>252</td>
<td>259</td>
<td>266</td>
</tr>
<tr>
<td>Winnipeg</td>
<td>509</td>
<td>526</td>
<td>540</td>
<td>570</td>
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Source: Statistics Canada.
## Chapter III - Saskatoon Case Study

### TABLE 2

**PERCENTAGE INCREASE IN POPULATION OF CANADA AND THE METROPOLITAN AREAS 1966-1974**

<table>
<thead>
<tr>
<th>Location</th>
<th>Percentage Increase</th>
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<tbody>
<tr>
<td>Canada</td>
<td>12.5%</td>
</tr>
<tr>
<td>Metropolitan areas</td>
<td>17</td>
</tr>
<tr>
<td>Calgary</td>
<td>34</td>
</tr>
<tr>
<td>Chicoutimi-Jonquière</td>
<td>3</td>
</tr>
<tr>
<td>Edmonton</td>
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<td>Halifax</td>
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<td>Hamilton</td>
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<td>London</td>
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<td>Montréal</td>
<td>8</td>
</tr>
<tr>
<td>Ottawa-Hull</td>
<td>18</td>
</tr>
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<td>Québec</td>
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</tr>
<tr>
<td>Regina</td>
<td>13</td>
</tr>
<tr>
<td>St. Catherines-Niagara</td>
<td>8</td>
</tr>
<tr>
<td>St. John's</td>
<td>12</td>
</tr>
<tr>
<td>Saint John</td>
<td>7</td>
</tr>
<tr>
<td>Saskatoon,</td>
<td>12</td>
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<tr>
<td>Sudbury</td>
<td>13</td>
</tr>
<tr>
<td>Thunder Bay</td>
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<td>Toronto</td>
<td>18</td>
</tr>
<tr>
<td>Vancouver</td>
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<td>Victoria</td>
<td>17</td>
</tr>
<tr>
<td>Windsor</td>
<td>11.5</td>
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<td>Winnipeg</td>
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Percentages given are estimated from a graph prepared by Statistics Canada. The estimates from June 1, 1972 on, will be subject to revision after the 1976 Census.
### APPENDIX C

**Case Study No. III - Red Deer, Alberta**

**HISTORICAL RESIDENTIAL LAND PRICES**

<table>
<thead>
<tr>
<th>Subdivision</th>
<th>Year</th>
<th>Price/front ft.</th>
<th>55 ft. Lot</th>
</tr>
</thead>
<tbody>
<tr>
<td>West Park</td>
<td>1961</td>
<td>$39.26</td>
<td>$2,159.30</td>
</tr>
<tr>
<td>Mountview</td>
<td>1961</td>
<td>46.92</td>
<td>2,758.60</td>
</tr>
<tr>
<td>Sunnybrook</td>
<td>1962</td>
<td>50.50</td>
<td>2,777.50</td>
</tr>
<tr>
<td>Fairview</td>
<td>1962</td>
<td>44.00</td>
<td>2,420.00</td>
</tr>
<tr>
<td>Oriole Park</td>
<td>1963</td>
<td>47.10</td>
<td>2,590.50</td>
</tr>
<tr>
<td>Morrison</td>
<td>1964</td>
<td>50.90</td>
<td>2,799.50</td>
</tr>
<tr>
<td>Morrison</td>
<td>1966</td>
<td>56.00</td>
<td>3,080.00</td>
</tr>
<tr>
<td>Morrison</td>
<td>1967</td>
<td>61.00</td>
<td>3,355.00</td>
</tr>
<tr>
<td>Morrison</td>
<td>1969</td>
<td>65.00</td>
<td>3,575.00</td>
</tr>
<tr>
<td>Oriole Park</td>
<td>1969</td>
<td>51.64</td>
<td>2,840.20</td>
</tr>
<tr>
<td>Morrison</td>
<td>1971</td>
<td>72.40</td>
<td>3,982.00</td>
</tr>
<tr>
<td>Oriole Park</td>
<td>1971</td>
<td>58.02</td>
<td>3,191.10</td>
</tr>
<tr>
<td>Morrison</td>
<td>1972</td>
<td>78.40</td>
<td>4,312.00</td>
</tr>
<tr>
<td>West Park Extension</td>
<td>1972</td>
<td>80.75</td>
<td>4,441.25</td>
</tr>
<tr>
<td>Highland Green</td>
<td>1973</td>
<td>72.52</td>
<td>3,988.60</td>
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<tr>
<td>West Park Extension</td>
<td>1973</td>
<td>85.00</td>
<td>4,675.00</td>
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### RED DEER, ALBERTA

**SUBDIVISION INVESTMENT JANUARY 1, 1958 TO DECEMBER 31, 1972.**

<table>
<thead>
<tr>
<th>Subdivision</th>
<th>Land Costs</th>
<th>Land Returns</th>
<th>Net (over/under recovery)</th>
<th>Improvement Costs</th>
<th>Improvement Recoveries</th>
<th>Winter Works Recoveries</th>
<th>Improvement Recoveries Total</th>
<th>Improvement Net</th>
<th>Over-all Net</th>
</tr>
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<tbody>
<tr>
<td><strong>ACTIVE SUBDIVISIONS</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
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</tr>
<tr>
<td>1. RESIDENTIAL</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Morrisey</td>
<td>113,933</td>
<td>(169,851)</td>
<td>(56,918)</td>
<td>1,089,753</td>
<td>(1,200,448)</td>
<td>(7,910)</td>
<td>(1,208,358)</td>
<td>(116,650)</td>
<td>(174,623)</td>
</tr>
<tr>
<td>Fairview</td>
<td>52,316</td>
<td>(72,635)</td>
<td>9,319</td>
<td>484,497</td>
<td>(50,606)</td>
<td>(8,697)</td>
<td>(535,101)</td>
<td>(57,604)</td>
<td>(52,131)</td>
</tr>
<tr>
<td>Banff &amp;</td>
<td>178,077</td>
<td>(68,267)</td>
<td>109,770</td>
<td>232,425</td>
<td>(426,928)</td>
<td>(11,205)</td>
<td>(438,137)</td>
<td>(185,712)</td>
<td>(75,92)</td>
</tr>
<tr>
<td>Westbrook Ext.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Chote/Bryant</td>
<td>302,323</td>
<td>(22,931)</td>
<td>179,794</td>
<td>302,323</td>
<td>(29,023)</td>
<td>(8,262)</td>
<td>(310,586)</td>
<td>(40,775)</td>
<td>(39,775)</td>
</tr>
<tr>
<td>North Hill &amp;</td>
<td>122,222</td>
<td>(8,030)</td>
<td>104,192</td>
<td>112,222</td>
<td>(53,882)</td>
<td>(8,262)</td>
<td>(122,586)</td>
<td>(39,146)</td>
<td>(39,146)</td>
</tr>
<tr>
<td>General</td>
<td>122,222</td>
<td>(8,030)</td>
<td>104,192</td>
<td>112,222</td>
<td>(53,882)</td>
<td>(8,262)</td>
<td>(122,586)</td>
<td>(39,146)</td>
<td>(39,146)</td>
</tr>
<tr>
<td>Highland Green</td>
<td>183,745</td>
<td>(164,630)</td>
<td>39,115</td>
<td>1,182,422</td>
<td>(1,221,911)</td>
<td>(17,734)</td>
<td>(1,228,145)</td>
<td>(6,432)</td>
<td>(7,137)</td>
</tr>
<tr>
<td>Orloa Park</td>
<td>4,278</td>
<td></td>
<td>4,278</td>
<td>20,497</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ardena</td>
<td>2,731</td>
<td>(39,840)</td>
<td>(36,109)</td>
<td>13,773</td>
<td>(20,451)</td>
<td>(7,081)</td>
<td>(20,451)</td>
<td>(3,280)</td>
<td>(3,280)</td>
</tr>
<tr>
<td>Sylvan Lake</td>
<td>4,278</td>
<td></td>
<td>4,278</td>
<td>20,497</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>TOTAL</td>
<td>882,211</td>
<td>408,262</td>
<td>473,949</td>
<td>3,711,146</td>
<td>(3,886,524)</td>
<td>(53,471)</td>
<td>(3,930,992)</td>
<td>(228,946)</td>
<td>(167,103)</td>
</tr>
</tbody>
</table>

| 2. COMMERCIAL/INDUSTRIAL |            |              |                            |                   |                        |                         |                            |               |             |
| Hermary       | 49,090     | (59,411)     | (10,321)                   | 80,893            | (93,303)              | (93,303)                | (93,303)                  | (12,410)      | (22,731)    |
| South Hill    | 32,680     | (63,221)     | (30,541)                   | 222,669           | (227,432)             | (3,656)                 | (231,086)                 | (8,219)       | (17,476)    |
| Riverside     | 32,175     | (150,809)    | 118,634                    | 409,982           | (293,794)             | (19,688)                | (313,162)                 | 96,720        | 228,622     |
| TOTAL         | 145,810    | (273,441)    | 127,630                    | 753,864           | (614,529)             | (23,135)                | (637,654)                 | 76,091        | 247,660     |

| COMPLETED SUBDIVISIONS |            |              |                            |                   |                        |                         |                            |               |             |
| Eastview       | 76,310     | (76,943)     | (2,633)                    | 688,695           | (701,251)             | (4,556)                 | (705,807)                 | (17,129)      | (19,737)    |
| Mountview-Alton | 30,072    | (30,072)     | (6)                        | 152,096           | (250,659)             | (18,133)                | (268,792)                 | (116,068)     | (116,068)   |
| West Park      | 52,847     | (52,847)     | 0                          | 650,924           | (632,621)             | (5,523)                 | (638,144)                 | (7,701)       | (7,701)     |
| Sunnybrook     | 220,834    | (220,834)    | 0                          | 1,283,706         | (1,270,399)           | (28,307)                | (1,298,706)               | (115,205)     | (121,505)   |
| CN Industrial  | 169,592    | (251,722)    | (82,128)                   | 2,755,037         | (2,994,930)           | (27,888)                | (3,022,818)               | (268,991)     | (407,983)   |
| TOTAL         | 597,655    | (698,125)    | (100,470)                  | 7,179,927         | (7,455,980)           | (333,135)               | (7,489,115)               | (409,666)     | (7,660)     |

APPENDIX D

Case Study No. IV: Mill Woods

SCHOOL SYSTEM

<table>
<thead>
<tr>
<th>Type</th>
<th>Count</th>
</tr>
</thead>
<tbody>
<tr>
<td>Public Elementary</td>
<td>26</td>
</tr>
<tr>
<td>Public Junior High</td>
<td>8</td>
</tr>
<tr>
<td>Public Senior High</td>
<td>2</td>
</tr>
<tr>
<td>Separate Elementary</td>
<td>17</td>
</tr>
<tr>
<td>Separate Junior High</td>
<td>8</td>
</tr>
<tr>
<td>Separate Senior High</td>
<td>2</td>
</tr>
<tr>
<td>Public Special Education</td>
<td>1</td>
</tr>
<tr>
<td>Facility in Town Centre</td>
<td></td>
</tr>
<tr>
<td>Separate Special Education</td>
<td>1</td>
</tr>
<tr>
<td>Facility in Town Centre</td>
<td></td>
</tr>
</tbody>
</table>

OPEN SPACE SYSTEM

<table>
<thead>
<tr>
<th>Type</th>
<th>Count</th>
</tr>
</thead>
<tbody>
<tr>
<td>Neighbourhood Parks</td>
<td>26</td>
</tr>
<tr>
<td>District Parks</td>
<td>2</td>
</tr>
<tr>
<td>Town Centre Park</td>
<td>1</td>
</tr>
<tr>
<td>27 Hole Golf Course</td>
<td>1</td>
</tr>
</tbody>
</table>

COMMERCIAL (Gross Leasable Area)

<table>
<thead>
<tr>
<th>Type</th>
<th>Sq. Ft.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Regional Centre</td>
<td>1,000,000</td>
</tr>
<tr>
<td>Community Centres</td>
<td>1,168,000</td>
</tr>
<tr>
<td>Convenience Centres</td>
<td>72,000</td>
</tr>
<tr>
<td>TOTAL</td>
<td>2,240,000</td>
</tr>
<tr>
<td>Offices</td>
<td>180,000</td>
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</table>

HOTELS - MOTELS

1 Hotel in the Town Centre

EMPLOYMENT

<table>
<thead>
<tr>
<th>Category</th>
<th>Number</th>
</tr>
</thead>
<tbody>
<tr>
<td>Estimated Work Force (30%)</td>
<td>40,000</td>
</tr>
<tr>
<td>Employed Downtown (33%)</td>
<td>12,000</td>
</tr>
<tr>
<td>Estimated Mill Woods Employment Potential</td>
<td>10,000+</td>
</tr>
<tr>
<td>Number of Persons Employed Internally</td>
<td>6,000</td>
</tr>
</tbody>
</table>

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APPENDIX D

Case Study No. IV: Mill Woods

LAND AREAS

<table>
<thead>
<tr>
<th>Type</th>
<th>Acres</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Residential</td>
<td>2,652</td>
<td>47.7</td>
</tr>
<tr>
<td>Commercial</td>
<td>220</td>
<td>3.9</td>
</tr>
<tr>
<td>Schools</td>
<td>570</td>
<td>10.2</td>
</tr>
<tr>
<td>Open Space</td>
<td>230</td>
<td>4.1</td>
</tr>
<tr>
<td>Institutional</td>
<td>335</td>
<td>6.0</td>
</tr>
<tr>
<td>Major Roads</td>
<td>364</td>
<td>6.5</td>
</tr>
<tr>
<td>Internal Roads</td>
<td>1,185</td>
<td>21.3</td>
</tr>
<tr>
<td>TOTAL</td>
<td>5,556</td>
<td>100.0%</td>
</tr>
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</table>

POPULATION

<table>
<thead>
<tr>
<th>Area</th>
<th>Population</th>
</tr>
</thead>
<tbody>
<tr>
<td>Northwest Mill Woods</td>
<td>19,000</td>
</tr>
<tr>
<td>Mill Woods West</td>
<td>14,000</td>
</tr>
<tr>
<td>Southwest Mill Woods</td>
<td>13,000</td>
</tr>
<tr>
<td>Mill Woods South</td>
<td>13,000</td>
</tr>
<tr>
<td>Southeast Mill Woods</td>
<td>13,000</td>
</tr>
<tr>
<td>Mill Woods East</td>
<td>15,000</td>
</tr>
<tr>
<td>Northeast Mill Woods</td>
<td>13,000</td>
</tr>
<tr>
<td>Mill Woods North</td>
<td>10,000</td>
</tr>
<tr>
<td>Town Centre</td>
<td>10,000</td>
</tr>
<tr>
<td>TOTAL</td>
<td>120,000</td>
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OVERALL DENSITY

<table>
<thead>
<tr>
<th>Density Type</th>
<th>Density</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gross Density</td>
<td>21.95 persons/gross acre</td>
</tr>
<tr>
<td>Net Density</td>
<td>45.61 persons/net acre</td>
</tr>
</tbody>
</table>

HOUSING COMPONENT

<table>
<thead>
<tr>
<th>Type</th>
<th>Dwelling Units</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Low Density Dwellings</td>
<td>11,200</td>
<td>38.2</td>
</tr>
<tr>
<td>Horizontal Multiple Dwellings</td>
<td>7,300</td>
<td>25.1</td>
</tr>
<tr>
<td>Vertical Multiple Dwellings</td>
<td>8,000</td>
<td>27.1</td>
</tr>
<tr>
<td>Public Housing Horizontal Dwellings</td>
<td>1,600</td>
<td>5.7</td>
</tr>
<tr>
<td>Public Housing Vertical Dwellings</td>
<td>1,200</td>
<td>4.2</td>
</tr>
<tr>
<td>TOTAL</td>
<td>29,200</td>
<td>100.0%</td>
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<tr>
<td>Type</td>
<td>Dwelling Units</td>
<td>%</td>
</tr>
<tr>
<td>---------------------</td>
<td>----------------</td>
<td>-------</td>
</tr>
<tr>
<td>Vertical Multiple Dwellings</td>
<td>1,500</td>
<td>32.5</td>
</tr>
<tr>
<td>Vertical Apartments</td>
<td>1,700</td>
<td>37.5</td>
</tr>
<tr>
<td>High-Rise Apartments</td>
<td>1,400</td>
<td>30.0</td>
</tr>
<tr>
<td>TOTAL</td>
<td>4,600</td>
<td>100.0%</td>
</tr>
</tbody>
</table>
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Articles and Books


Ellwood, P.; (Mill Woods Project Director). Notes for a speech at TPIC Annual Conference, Saskatoon, June, 1972.


Hamilton, S. W.; Public Land Banking--Real or illusionary benefits? University of British Columbia, January, 1974.


Ricketts, Mark. "Hearth of matter is: most of us can't afford one," Financial Post, April 19, 1975.


Spurr, Peter. The Land Problems' Problem. A Report Submitted to CMHC.


Tomorrow's Capital: Invitation to Dialogue. Regional planning concept proposed by the NCC, 1974.


Provincial Planning Acts


____. Housing Development Act, R.S.O., 1960.

____. Ontario Planning Act, R.S.O., 1960.


Unpublished Manuscript


Interviews

Mr. Jaap Schouten, Planner, NCC. Involved with Mill Woods Project, Alberta.

Mr. John W. P. Cole, Director, Land Use Projects, Ontario. NCC.

Mr. W. D. Cook, Land Development Committee, Planning Department, RMOC.

Telephone Conversations

CMHC, Assembly Division, Ottawa.

Director, Land Speculation Tax Act Division, Government of Ontario, Toronto.

McLeod, Young, Weir Investment Co., Sparks Street Mall, Ottawa.