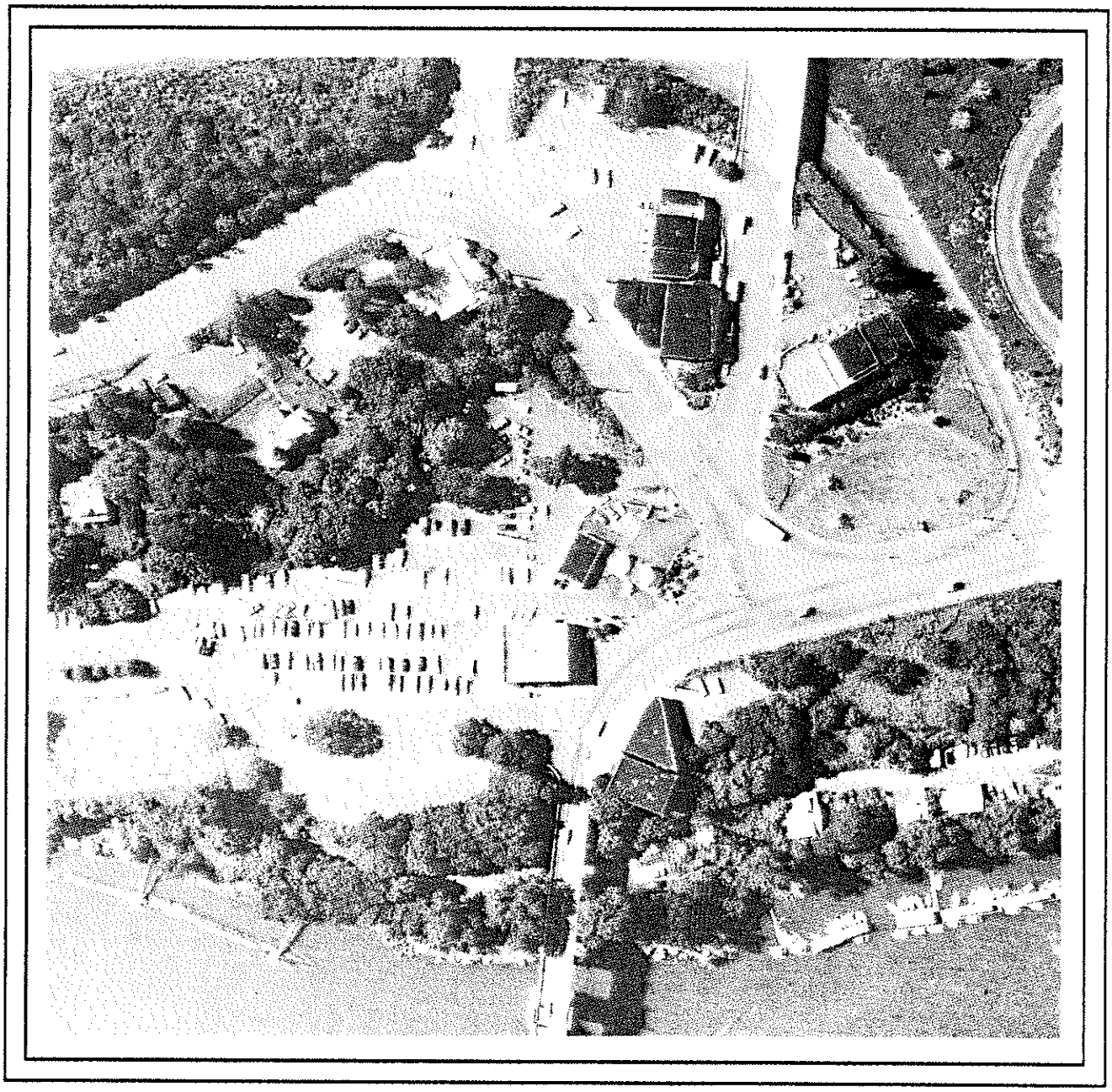
West Linn Waterfront Study

Market Analysis and Concept Design



August 1988

WEST LINN WATERFRONT STUDY:

MARKET ANALYSIS AND CONCEPT DESIGN

FINAL REPORT

Submitted to:
City of West Linn

Submitted by:
ECO Northwest
99 West 10th, Suite 400
Eugene, Oregon 97401

August 1988

TABLE OF CONTENTS

SUMMARY

PURPOSE

In February 1988 the city of West Linn hired ECO Northwest and its subcontractors to help the city evaluate the feasibility of commercial development near Highway 43 at the West Linn-Oregon City bridge and at the 10th Street interchange with I-205. The major impetus for the study was the city's desire to evaluate the possibility of creating a development around city hall at Highway 43 and along the Willamette River. The city's idea was that such development would create a city center that now does not exist.

METHOD

To meet the purposes of this study ECO and its subcontractors proposed a work program that included an evaluation of: (1) the regional and local demand for the types of land uses that might locate in West Linn, (2) the physical characteristics of the city's waterfront property, (3) a conceptual design for the development of the waterfront property, and (4) a preliminary feasibility analysis of the conceptual design.

MARKET CONDITIONS

West Linn's population is forecasted to grow by 2.9 percent per year between 1986 and 1990, from 15,084 to 16,956 people, and by 2.1 percent per year from 1990 to 2005, to 23,278 people.

The forecasts of housing growth in West Linn parallel those of population growth. In 1986, West Linn had 5717 housing units. This number is expected to grow by 2.6 percent per year until 1990, and by 2.1 percent per year until 2005, when it will reach 8730. West Linn's locational characteristics will continue to keep it active in the market for upper-end, single-family development, assuming no

significant increases in interest rates. Multi-family development, which has flucutated but been genrally strong in the 1980s, will begin to taper off in a few years as zoned land disappears.

The most obvious category of retail demand that will grow with the growing population is for necessities: food--groceries, specialty foods (wine, coffee, pastries), and restaurants (fast foods and traditional)--drugs, and sundries. The second category of retail demand that the upper-income demographics of residents suggest that West Linn could supply is for specialty items: e.g., flowers, gourmet foods, books, etc. Because of competition from existing regional shopping centers (Clackamas Town Center, Tualatin, Washington Square, and downtown Portland), its location on the perifery of the metropolitan area, and its lack of large tracts of flat buildable land, West Linn is unlikely to be selected as a location for regional retailing.

The softness of the office market in the metropolitan area makes development in West Linn both less likely and more risky in the short run. In the longer run, as the population in and around West Linn grows and existing office space is absorbed, some land in West Linn has the locational characteristics (freeway access, good public services, views) to make it competitive for office development.

DESIGN PROGRAM

Our purpose is to design a preliminary development concept that is compatible with the characteristics of the site, the dictates of the market, and the desires of the city. In summary, site and market considerations led us to specify the following program for the designers:

1. Government Offices. An ideal use because it accomplishes several objectives at the same time: creates a downtown center, consolidates city services, creates a firm employment base to support retail, and reduces risk. Our estimate of demand: 11,000 square feet (s.f.) by the city of West Linn.

2. Offices. Potential relocation of existing uses: (1) the credit union, which would be demolished as part of the proposed realignments of Highway 43 and I-205: 4000 s.f., (2) the James River Corporation, which might move some of its administrative and off-site sales functions to new office space, 10,000 s.f.

   In addition, other professional offices could choose the location: medical/dental (@ 900-1500 s.f. each); financial, including, perhaps, a bank (@ 2500-4000 s.f. each), real estate and title insurance (@ 900-1500 s.f. each), lawyers (given the location of the County Courthouse just across the river). All of these uses are consistent with what the site offers and general trends in downtown redevelopment (toward office development). Together, these uses might occupy an additional 10-20,000 s.f.

3. Retail. The employees in the area in addition to local customers and visitors will generate much of the demand for retail development. Together, these consumers should be able to support a quick-food delicatessen (2500 s.f.), a tavern (3000 s.f.), a restaurant (5000-15000 s.f.), and 5-10 specialty retail stores (@ 1500-2500 s.f.). The total retail square footage would be about 25,000-40,000 s.f.

Our design program had to contend not only with the constraints imposed by the market, but also those imposed by site characteristics. In particular, we found that any significant redevelopment of the waterfront site would depend on (1) the realignment of Highway 43, under consideration by the Oregon Department of Transportation, and (2) the ability of the design to accommodate the needs of James River for access, parking, and security. The limited buildable space in the waterfront area made parking considerations critical to the design. We experimented with and rejected as too costly several designs that used parking structures. Figure 1 shows the concept design we took forward for financial evaluation. South of a realigned Highway 43 is an addition to City Hall, and new office space at the bridge across from City Hall. North and east of City Hall is retail space.

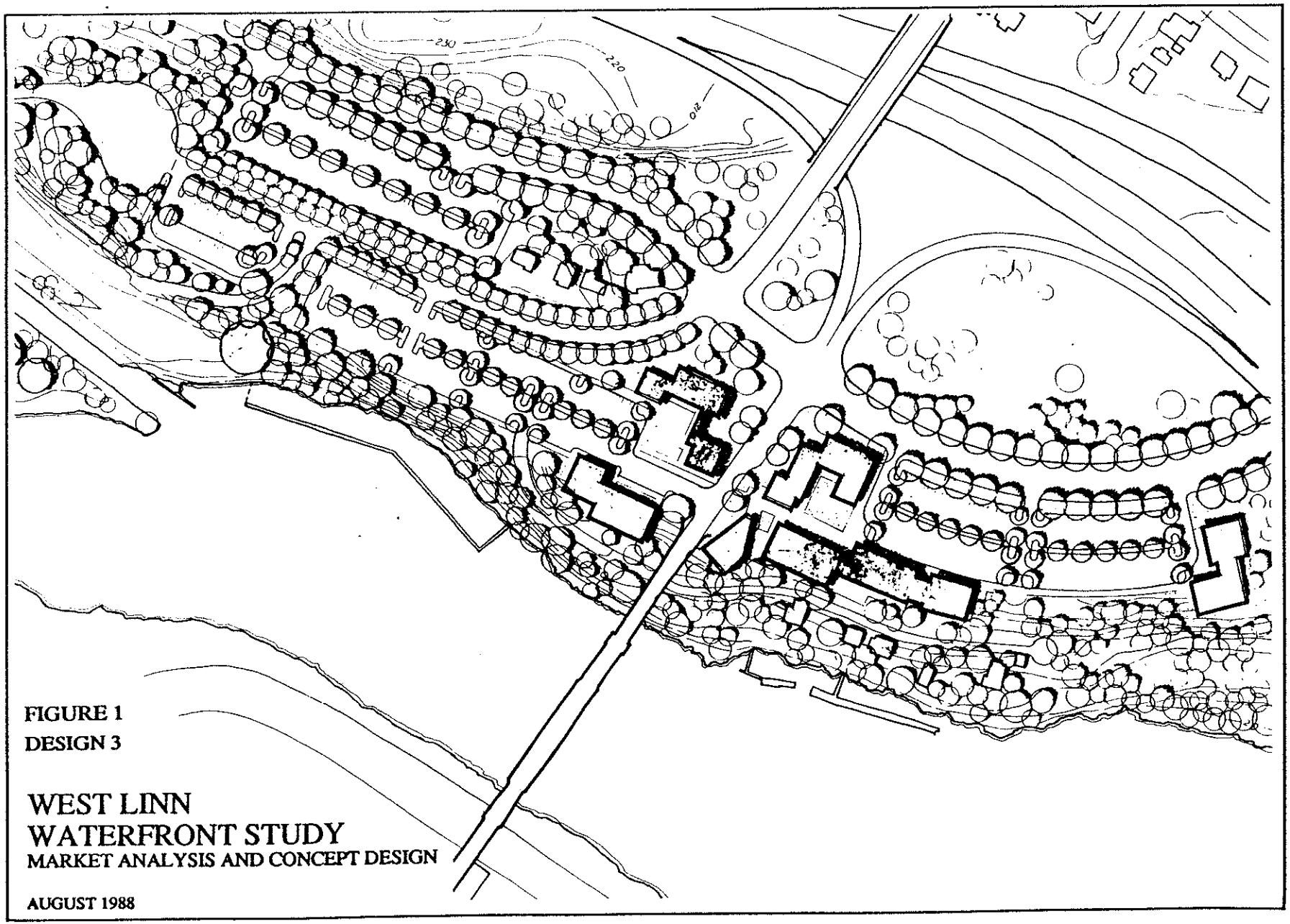


FIGURE 1
DESIGN 3

WEST LINN
WATERFRONT STUDY
MARKET ANALYSIS AND CONCEPT DESIGN

AUGUST 1988

FINANCIAL ANALYSIS

Even with what we consider rather favorable assumptions, the development barely pencils out in its third year of operation. We tested the sensitivity of our analysis to reasonable changes in assumptions. The most important result of our sensitivity analysis is its identification of expected rent as the key to the project's feasibility. If rents fall even $1 per square foot short of our expectations, the project fails without subsidy from the City. The following table summarizes the results of our sensitivity analysis.

SENSITIVITY TO CHANGES IN ASSUMPTIONS

	Assumptions	After-tax Return on Equity	% Change from Base Case
(0)	Base case	8.5%	0.0%
Changes that decrease the return			
(1)	Land @ 125% of assessed value	8.0%	-5.9%
(2)	Rent $1 lower	5.6%	-34.1%
(3)	Operating costs 10% higher	7.5%	-11.8%
(4)	(1), (2), and (3) above	4.3%	-49.4%
Changes that increase the return			
(5)	ODOT land free	9.5%	+11.8%
(6)	Rent $1 higher	11.4%	+34.1%
(7)	Operating costs 10% lower	9.4%	+10.6%
(8)	(5), (6), and (7) above	13.9%	+63.5%
Ways that the City might increase the return			
(9)	Finance @ 9%	10.8%	+27.1%
(10)	Write down land, system development, and hookup fees	11.1%	+30.6%
(11)	Write down land, system development, hookup, site prep, and parking	16.4%	+92.9%

Source: ECO Northwest

RECOMMENDATIONS

Despite its very attractive locational characteristics, the site has many constraints that make its development problematic: (1) steep slopes, rock, and limited land carved into small pieces by highways and historic buildings, and

(2) several actors and actions that must work together (the city, ODOT, James River, a developer).

Together, these problems make the timing and design of any future development uncertain, but as our financial analysis showed, under favorable assumptions the project can be made to pencil-out. If the city is willing to continue devoting its resources to trying to make the project happen. The basic choices are: (1) table discussion and study of the site, at least for a few years, or (2) continue discussions with ODOT and James River to proceed toward agreement on redevelopment, either aggressively (by pushing to establish an urban renewal district, to press ODOT to commit to undertaking the realignment soon, to work out a design with James River, to find a developer) or less actively.

The city's decison should consider (1) the urgency of its need for additional space for municipal functions, and (2) the likelihood that taxpayers would be willing to subsidize any part of the development, now or in the future, in return for the public benefits it provides.

In our judgment, of the options we have described, the most cost-effective is for city staff to continue discussions with James River and ODOT, to press ODOT for the realignment of Highway 43 (which the city probably wants even if it chooses not to redevelop the waterfront site), to stay abreast of any land sales or construction in the area, to make sure that local realtors and developers know that the city is open to development ideas for the area, and to develop schedule for bringing back additional information to city decision makers. We do not see a need for additional studies at this time; rather, the city makes a commitment of perhaps 10% of a planner's time over the next year to answer some pending questions and to make sure that the city's options for development of the site are not prematurely foreclosed.

For the parcel next to West Linn High School, either a hotel or office use at the property would be compatible with and would enhance any of the designs we have proposed for the waterfront site; neither poses the threat of unmitigatable nuisance to surrounding property. Thus, we recommend that the city let the market take its course. If land for hotels is in demand, this property should compete well. If not, the owner must either hold it vacant until demand arrives, sell it at a

discount to someone who will, or develop it for a different use. Though a hotel is a good, and perhaps best, use of the property in terms of the boost it may give to the redevelopment of the waterfront site, it is not the only good use: office development and multi-family housing are also possibilities. Because of the physical characteristics of the site, we think any of these high-density uses would be more likely to pencil-out than dispersed ones.

The policy decision for the city about the 10th Street area turns on its consideration of short-run versus long-run development. In the short run the city can probably get commercial development on the flat land at the interchange. In the short- to intermediate-run (within five years) it could probably get additional housing (either single- or multi-family) to creep down the slope from the heights. In the intermediate- to long-run, it could probably get offices in the land near the interchange and on the lower slopes (perhaps even faster if it wants to use any of the subsidies we discussed for the waterfront site). An important policy question is whether any commercial or residential development in the short run will preclude the possibility of office development later.

The city can legitimately answer these questions about zoning any number of ways. Since we have been asked, however, to give our opinion about an optimal solution, we will. We would change the zoning around the interchange to General Commercial to encourage more rapid development. All development should be subject to design review to make sure that any disamenities are mitigated; offices could still go there if the market for them develops. Land north of Blankenship on the lower slope could stay as Office/Business Center. If the demand for housing stays strong, the city should consider requests for zone changes on the upper slopes to allow some additional housing development, making clear to developers and buyers its intentions to allow future office development on the lower slopes.

CHAPTER 1
INTRODUCTION

1.1 PURPOSE

The City of West Linn is located along the Willamette River about 12 miles south of downtown Portland (Figure 1-1).

In February 1988 the City of West Linn hired a team of consultants to help the city evaluate the feasibility of commercial development near Highway 43 at the West Linn-Oregon City bridge and at the 10th Street interchange with I-205. The team consisted of the following firms:

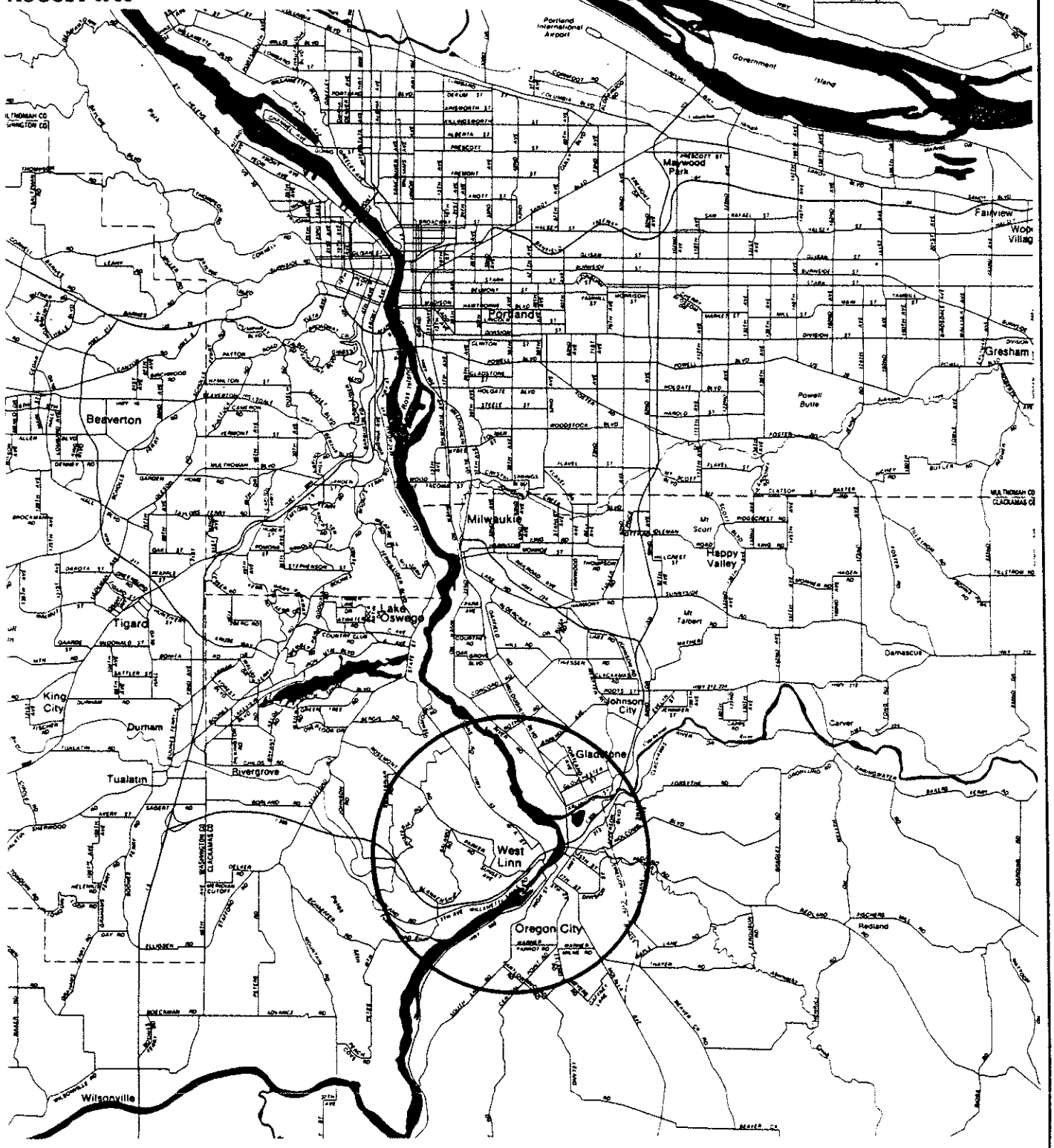
1. ECO Northwest (prime contractor): project management, and all aspects of economic, market, and financial analysis
2. SRG Partnership: architecture and site design
3. Walker & Macy: landscape architecture and site design
4. Cooper Engineering: preliminary design and cost estimating for public facilities, especially improvements related to transportation
5. Tom Giesen Consultant, Inc.: cost estimation
6. Government Finance Associates: review of various aspects of public finance

The city had several objectives for the study. The major impetus for the study was the city's desire to evaluate the possibility of creating a development around city hall at Highway 43 and along the Willamette River. The city's idea was that such development would create a city center that now does not exist. The location was a logical one: in the geographic center of the city, at the major crossroads of north-south and east-west traffic, and along the waterfront. Figure 1-2 shows the location and existing land uses of the study area.

FIGURE 1-1
LOCATION OF WEST LINN

WEST LINN
WATERFRONT STUDY
MARKET ANALYSIS AND CONCEPT DESIGN

AUGUST 1988



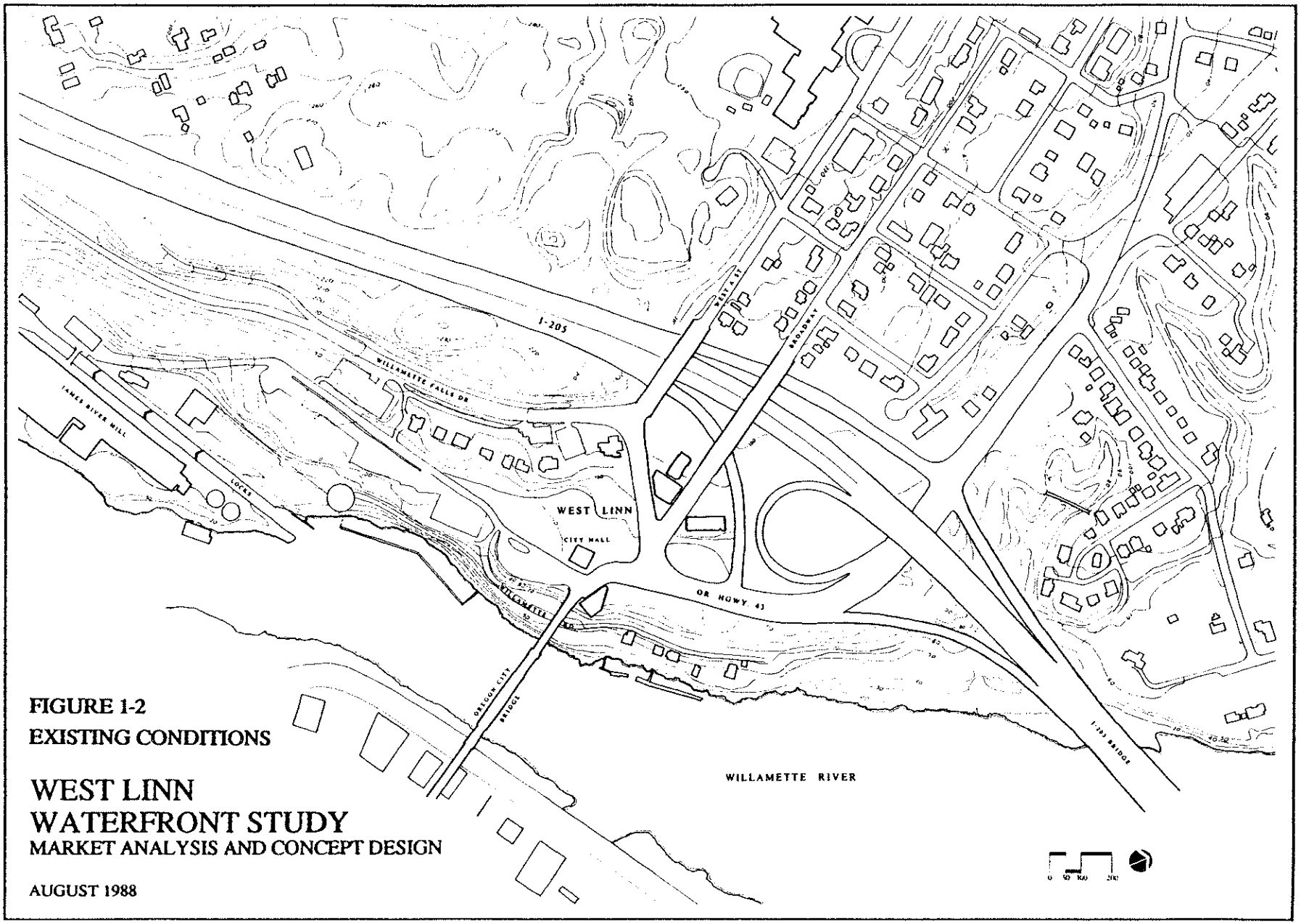


FIGURE 1-2
EXISTING CONDITIONS

WEST LINN WATERFRONT STUDY

MARKET ANALYSIS AND CONCEPT DESIGN

AUGUST 1988

Of secondary importance to the study were the city's desires to evaluate generally the market for retail, office, and residential development: such an evaluation would help planning for development in the 10th Street area and would allow the city to meet some of the requirements imposed on it by Oregon's Land Conservation and Development Commission as part of the periodic review of the city's comprehensive plan.

1.2 METHOD

To meet the purposes of this study ECO and its subcontractors proposed a work program that included an evaluation of:

1. The regional and local demand for the types of land uses that might locate in West Linn in general and the waterfront area in particular

2. The physical characteristics of the city's waterfront property (more accurately, of the property in the city's proposed waterfront urban renewal zone)

3. A conceptual design for the development of the waterfront property based on the results of "1" and "2"

4. A preliminary feasibility analysis of the conceptual design

We began our evaluation with an analysis of the market for governmental, commercial, and residential space in West Linn. That general analysis is applicable to the 10th Street area as well as the waterfront area. We describe the method of our market analysis in detail in Appendix A of this report.

Our early review of the waterfront property suggested, and subsequent analysis documented, that commercial development of the waterfront could not occur without

accommodating two constraints: the desire of the Oregon Department of Transportation (ODOT) to redo the interchange of I-205 and Highway 43 to improve safety, and the requirements of the James River Corporation for access, parking, and security. By May we and city staff had had several meetings with ODOT and James River and had secured their approval to proceed to a more detailed analysis of the tentative design schemes we presented them.

The constraints imposed by access (the proposed ODOT redesign of the interchange), topography and ownership (James River owned the majority of the only land suitable for any major development in the waterfront area), and the market (which suggested that locating city functions and employment in the development was highly desirable, if not essential) sharply focused the scope of our conceptual design. With that design defined, we then proceeded to conduct a more detailed feasibility analysis, looking at the likely costs and revenues the conceptual design would generate if implemented.

1.3 ORGANIZATION OF THE REPORT

The organization of the report parallels the method we just described. To meet the several purposes the city intends it to serve, we organize the report as we would any feasibility analysis.

In **Chapter 2** we begin by describing the external factors that set the boundaries within which development in West Linn must occur: national, state, and regional economic trends; and national trends in retail and commercial development. The information we summarize in Chapter 2 is described in more detail in Appendix B.

In the light of these market forces we focus in **Chapter 3** on the demand for governmental, commercial, and residential space in West Linn. The analysis serves several purposes simultaneously: it is applicable to both the 10th Street and waterfront areas, and it contains the information West Linn needs to demonstrate to the Land Conservation and Development Commission that it has made a serious

effort to understand and encourage economic development in West Linn. Chapter 3 summarizes from more detailed socio-economic data we present in Appendix C. It contains an analysis of the local supply of vacant land and space by type (retail, office, residential, and moorage). After reviewing demand and supply conditions for each type of use we present our conclusions about the strength of the market in West Linn.

In **Chapter 4** we focus on the waterfront area: its locational, physical, and administrative characteristics, and the likely market demand for the uses for which it might be suitable. Chapter 4 contains the information and analysis we used to define a design program and the appropriate scope of our more detailed feasibility analysis that follows. Here we deal only with the waterfront commercial development--we do not conduct a feasibility analysis for a conceptual development in the 10th Street area. We describe with text and figures a conceptual design for the waterfront development. The site analysis we summarize in Chapter 4 is described in more detail in Appendix D.

The conceptual design in Chapter 4 coupled with the market analysis in Chapter 3 serve as the basis for our feasibility analysis in **Chapter 5**, where we estimate the likely costs and revenues the development will produce. The details of the engineering and cost analyses are contained in Appendix E.

In **Chapter 6** we present our conclusions and recommendations, commenting on the likely impacts of the proposed development and describing the next steps the city should take if it decides to pursue some version of the conceptual development we present.

CHAPTER 2
EXTERNAL FACTORS AFFECTING RETAIL TRADE, OFFICE SPACE, AND RESIDENTIAL DEVELOPMENT IN WEST LINN

2.1 INTRODUCTION

The strength of demand in for retail, office, and residential space in West Linn depends strongly on economic conditions in the larger Portland metropolitan area.

For example, retail demand depends principally on the income of households in its market area and opportunities for purchases inside and outside the market area. Both of these factors depend in turn on other factors that are beyond the control of developers and public agencies operating in the market area. Local income depends on local employment, which depends on national and statewide economic conditions that affect the demand for the products of the basic (export) sectors of the local economy.

In this section we summarize how general economic conditions and national and regional development trends are likely to influence the demand for retail, office, and residential space in West Linn, and forecast key economic variables for the Portland metropolitan area.

2.2 NATIONAL, STATE, AND REGIONAL ECONOMIC CONDITIONS

The depreciation of the dollar in world currency markets will have a large impact on Oregon. With its location on the Pacific Rim and its major port facilities, Oregon should play a major role as foreign trade becomes an increasingly greater portion of the U.S. economy. The first shipment of American-made Hondas

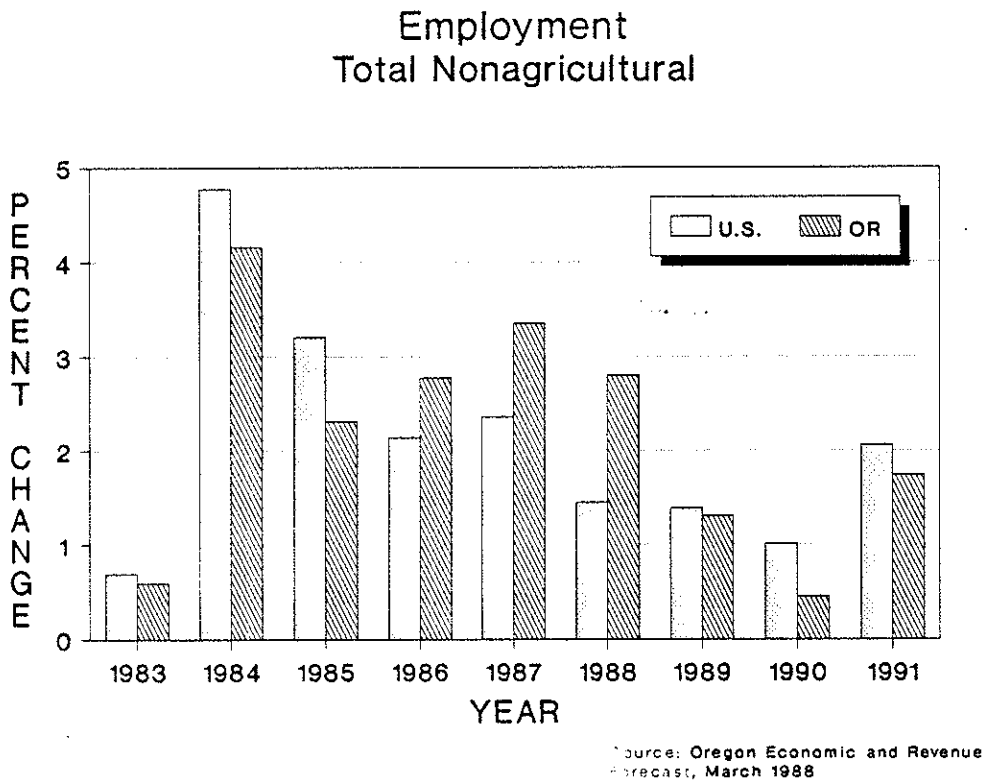
to Japan left Portland in March; while not significant when viewed from the perspective of the still-enormous trade imbalance, this shipment is symbolic of emerging trade patterns and Oregon's role in them.

For the nation, 1987 marked the beginning of the transition from a consumption-led to an investment- and export-led economy. Consumer expenditures, a large portion of which were for imported consumer goods, combined with government purchases (largely defense-related) to pull the economy out of the 1982 recession. Consumer spending probably will not grow nearly as fast in the foreseeable future as it has in the last several years. Over the last four years, real (i.e., adjusted for inflation) consumer spending grew at an average rate of 4.5 percent, even though real wages barely grew at all. The level of household debt reached a historical peak in 1987 while the savings rate fell to an all-time low. As consumers push their credit limits and exhaust their savings, spending must slow, as it began to do in 1987.

Oregon's economy fared better than the national economy in 1987, in sharp contrast to its relative performance throughout most of this decade. Oregon's economy has been strengthened by low interest rates and by continued depreciation of the U.S. dollar on world markets which has made goods produced in Oregon less expensive to domestic and foreign consumers. Oregon's economy is heavily dependent on sales of durable goods and raw resources that are purchased with credit (e.g., transportation and electronic equipment), are inputs to final goods (e.g., housing) that are purchased with credit, or are affected by the international exchange rates (e.g., logs and wheat).

Employment increased by 35,500 and Oregon had the eleventh-highest employment growth rate among all states. There were only half as many unemployed persons in the state as during the recession in the early 1980s. The increase in employment was broadly distributed over all sectors of the economy: notably 3,000 jobs in durable manufacturing and 1,500 in non-durable manufacturing. Until 1987, the rate of employment growth in manufacturing in Oregon lagged behind the national rate. With 18,000 new jobs, services and trade accounted for most of the increase in employment. Figure 2-1 compares state and national employment growth in the recent past and gives a forecast for the near future.

FIGURE 2-1



Most of last year's increased employment came in the service and trade sectors, but manufacturing employment increased by 6,600 jobs or 3.3 percent, reversing losses in the last few years. The lumber-and-wood-products industry increased employment by 4.4 percent in 1987, responding to increased exports and strong remodeling demand. Housing starts increased 5.71 percent in Oregon in 1987 compared to a 9.22 percent drop nationwide.

Many economic signals indicate that the state's economy should continue to grow faster than the US economy this year, but then fall behind. For example, the Oregon Economic and Revenue Forecast of March 1988 shows nominal (i.e., not adjusted for inflation) personal income increasing 6.23 percent in Oregon and 5.83 percent nationwide in 1988. Total nonagricultural employment is expected to grow

2.80 percent in Oregon, compared with 1.45 percent for the nation as a whole. Lumber-and-wood-products employment will not grow much in Oregon, only a 0.32 percent increase is forecast, but this compares favorably with an expected decline of over one percent in the rest of the country.

A large share of Oregon's recent employment growth has been in the service and trade sectors. Since 1950, manufacturing's share of total employment has fallen from 31.5 percent to 18.7 percent and service's has grown from 9.8 to 22.2. These changes in the structure of Oregon's economy result in part from changes in the way people live and in what they consume; they have also contributed to social changes. In general, wages in the trade and service sectors are lower than those in manufacturing.[1] In many cases, they are too low to support a family, so that many families require more than one wage earner.

As one would expect, the economy of the Portland metropolitan area accounted for much of the success of the state economy. Our recent forecasts of key economic indicators for the Portland area show nonagricultural employment in the Portland metropolitan area growing from 554,500 in 1987 to 597,800 in 1990, 60% of Oregon's employment growth and an average annual growth rate (AAGR) of 2.51%. The equivalent growth rate is 2.03% for the U.S.

During the same period, Portland metropolitan area population is forecast to increase from 1.16 million in 1987 to 1.18 million in 1990. Per capita incomes will rise at an AAGR of 4.46% from $15,199 in 1987 to $17,377 in 1990. Aggregate personal income in the area will increase at a 5.21% AARG.

All of the data we have cited suggest continued growth of employment, population, and income in the Portland metropolitan area, at least in the short run. As we discuss later, West Linn is in a good position to take advantage of this growth, primarily as a suburban residential community with excellent locational characteristics. In short, as long as the state economy is stable or growing, West Linn should grow.

---

[1]This relationship has many complex roots and must be viewed with care. Many new manufacturing enterprises, for example the assembly of electronic goods, are characterized by low wages, while many services, such as medical, legal, and business services, exhibit high wages.

2.3 NATIONAL TRENDS IN COMMERCIAL AND RESIDENTIAL DEVELOPMENT[2]

2.3.1 OFFICE SPACE

In the 1980s developers built office space rapidly, paying little attention to demand. In 1982, only a few cities in the U.S. had problems with high office vacancy rates; by the end of 1987, office vacancy rates had climbed to 20 percent nationwide. From a peak of $18 billion dollars in 1985, developers reduced construction of new office space by 24 percent in 1986: many experts argued the construction should have stopped all together.

Although the square footage of excess capacity is now greater than it was in 1974-76, three factors will allow the industry to survive with less damage. First, today's excess office space is of higher quality. Recent office projects in downtown and suburban markets are well designed and constructed. Second, new office projects are owned by investors who can continue to finance buildings that are leasing slowly. Third, the greatest overbuilding has been in the fastest-growing areas of the country.

Industry analysts are predicting a decline in office construction in 1988 coupled with lower office vacancy rates across the nation; however, the oversupply will continue to suppress effective office rents.

The Portland market mirrors these national trends. Of importance to West Linn is the fact that Portland's suburban office vacancy rates were around 20 percent in 1987 (Portland Metropolitan BOMA, 1988 Metropolitan Office Leasing Guide. We examine this situation in the next chapter.

---

[2]This section summarizes a more detailed description of these trends presented in Appendix B of this report.

2.3.2 RETAIL DEVELOPMENT

For most of the country, the boom period for building suburban shopping malls has ended. In the five year period from 1982-1987 (post-recession economy) only 77 regional malls (the size of Clackamas Town Center) were built compared to 120 in the five years preceding 1982. The development of strip malls has also declined. These trends are the result of over-building during the 1970s and shifts in merchandizing.

The form of the mall has shifted from the very large regional malls and the very small strip malls to the medium-sized community mall and discount malls. Community malls are populated by national chain stores that tend to sell near the middle of the price spectrum and provide full service (e.g., showrooms, trained staff, after-sale services). Discount malls are also populated by chain stores (e.g., Target, Toys R Us) but these chains sell at the lower end of the price spectrum and do not offer full customer services.

Retail trends in the Portland metropolitan area are consistent with those we have observed on the national level. With the addition of Clackamas Town Center in 1981, there are few, if any, suitable sites remaining for regional mall development. A regional mall in West Linn is out of the question. On the demand side, it would probably not compete well with the established and more centrally located retail at Clackamas Town Center (only five miles away), Washington Square, and Downtown Portland, all which are located in more densely populated regions of the metropolitan area. On the supply side, West Linn has no space for it.

If retail development is to occur in West Linn, it will serve primarily a local market. We examine the market for neighborhood retail in the next chapter.

2.3.3 RESIDENTIAL DEVELOPMENT

High interest rates of the early 1980s led to suppressed demand for housing by first-time buyers. As interest rates declined in 1984 housing starts increased, reaching 1.2 million in 1986.

Demand for multi-family units has not been as strong. Rental apartment vacancy rates rose from 6.5 percent in 1982 to 11 percent in 1987. Industry analysts argue that oversupply will keep rental rates down in the short term.

We examine the Portland housing market in the next chapter.

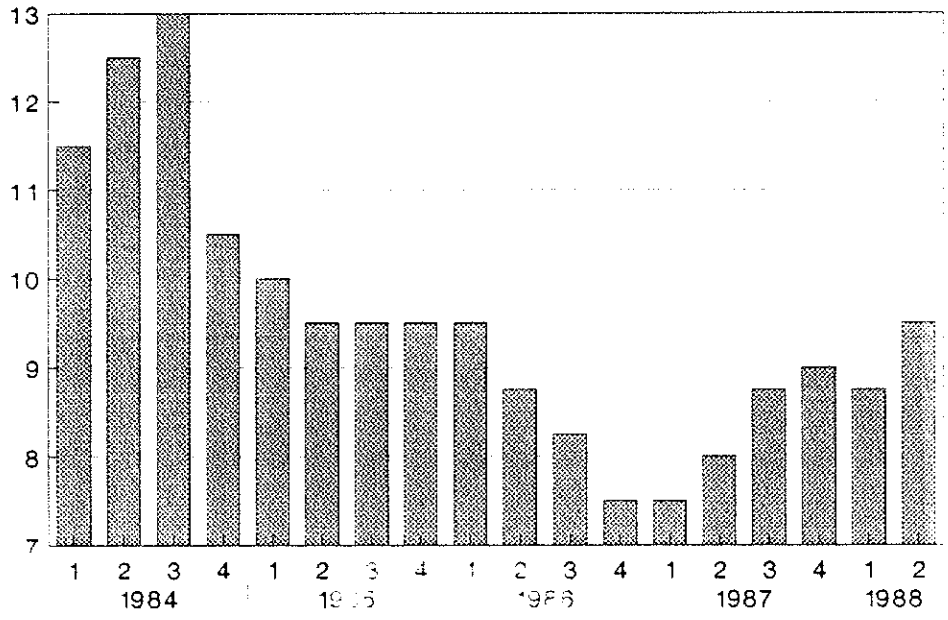
The truism that rising interest rates decrease housing starts unfortunately gives no equally valid pronouncement on when interest rates will rise. Any forecast for more than a year is little more than a guess. Figure 2-2 shows recent changes in interest rates.

Some analysts predict higher inflation rates in the coming years. The likelihood of this occurring depends in part on the policies of the next administration, which has yet to be elected. But expectations of higher inflation rates, whether founded or not, will put upward pressure on long-term market interest rates. If rates rise, construction will become more expensive, fewer homes and buildings will be built, housing will become more expensive, and the lumber and wood products industry will suffer.

FIGURE 2-2

The Prime Lending Rate

In Percent, 1984-1988



Source Associated Press

CHAPTER 3
THE MARKET FOR GOVERNMENTAL, COMMERCIAL, AND RESIDENTIAL SPACE IN WEST LINN

3.1 INTRODUCTION

The demand for land derives from the demand for the uses it allows; in turn, the demand for those uses derive from the goods and services they allow businesses to provide. For example, when a city's population grows, so does its demand for food and medical services. In response to this increase in demand, either existing food stores and doctors offices expand or new stores and offices are built on vacant land or occupy existing vacant space. Changes in other factors affecting demand, such as personal income, demographics, and consumer preferences also affect the demand for commercial land and buildings.

In this section we describe the West Linn market in terms of these underlying determinants of demand and discuss their implications for development in West Linn. We will describe the past and likely future values for such determinants of demand as population, income, and employment in the West Linn area, which will provide the basis for the demand for commercial and residential land. In most cases we use data generated for this study by the Metropolitan Service District. These data are based on the 1980 Census and updated by building permit and other local information, and are consistent with overall population forecasts for the Portland metropolitan area. We have also reviewed several locally produced documents, including two Clackamas county reports: Clackamas County Economic Profile Background Report and Clackamas County Commercial Development Background Report, both released in October of 1985. These documents for the most part support the data from the Metropolitan Service District and reinforce the conclusions we reach below.

Changes in how retail goods and services are supplied also affect the demand for commercial land. For example, since the mid-1960s, community and regional shopping centers have become the predominant form of supplying building and parking space for retail stores. In the 1980s a new trend started: off-price retailing (e.g., Target, Silo). We evaluated these and other trends to determine how

they will affect demand for commercial land in West Linn (see Chapter 2 and Appendix B).

3.2 DEFINITION OF THE MARKET AREA

In Appendix A we discuss at length the problems one encounters in defining market areas for retail, office, and residential development. We incorporate these ideas into our designation of the market areas for West Linn by defining and gathering data for several areas surrounding West Linn, and then combining the data for these areas as appropriate, depending on the particular good or service we are evaluating. We base our definitions on the following assumptions:

1. Retail development in West Linn will be primarily to serve the residents of West Linn. The basic theory of retail market analysis distinguishes between three classes of retail goods:[1]

   a. Convenience Goods are needed quickly and frequently. Consumers will not travel far for convenience goods (like food, drugs, and other items frequently purchased with a low cost per unit); as a result, businesses cannot expect to penetrate into areas that are at a greater distance from them than from their competitors.

   b. Comparison Goods are more expensive items, usually durables or hard goods. Consumers will travel great distances to do comparison shopping for high-priced goods (e.g., automobiles, major appliances) to get a larger selection, better quality, or lower prices. Retail stores offering such goods tend to concentrate in retail centers, either in downtowns or suburban shopping malls.

   c. Specialty Goods have no clear characteristics or trade area in general. Specialty goods may be either convenience or comparison goods; we address them as such in this study.

---

[1] Urban Land Institute, 1985, Shopping center development handbook, p 3.

Because of the distribution of existing regional centers offering comparison goods (particularly downtown Portland, Clackamas Town Center, and Washington Square), the locational and site characteristics of land in West Linn, and city goals, we do not believe that West Linn should consider the unlikely possibility of trying to establish a regional retail center for comparison goods. The main retail market is for convenience goods and specialty goods. Since specialty goods have no clear trade area, we believe the retail market area should be defined to focus on West Linn and areas within a ten-minute travel time to West Linn.

2. For office development, the relevant primary market area is only slightly larger, for reasons similar to those that we explained for retail development. The principal market is probably for small professional offices that would be populated by local professional people who do not need or want downtown locations. The secondary market may be much larger--as large as the metropolitan area--if West Linn believes it can compete for larger office developments (like those in Beaverton and at Kruse Way) that do not require central locations.

3. For housing development, the relevant market area is probably the Portland metropolitan area. West Linn's location relative to downtown Portland and businesses along the semi-circle defined by Highway 217 and Interstate-205 make it a very competitive location, the commute time to all major metropolitan area employment locations is less than 20 minutes[2].

For these reasons, we present most of the economic and demographic data relating to consumer characteristics at several levels: for West Linn; for concentric rings defined by straight-line distance and isochrons (rings defined by travel time rather than straight-line distance) around the intersection of I-205 and Highway 43; for Clackamas County, for the area within the Clackamas County Urban Growth Boundary (UGB), and for the metropolitan area.

---

[2]City of West Linn. 1984. Comprehensive Plan Inventories, Land Use, page 4.

3.3 ECONOMIC AND DEMOGRAPHIC CHARACTERISTICS OF THE WEST LINN MARKET AREAS

3.3.1 POPULATION

Metro forecasts that the average annual rate of growth (AARG) for West Linn's population will continue to exceed those of Clackamas County, the metropolitan area as a whole, and the other sub-areas for which we collected demographic data. West Linn is a growing in a county that has consistently been one of the fastest growing in Oregon. The West Linn area's population is forecasted to grow by 2.9 percent per year between 1986 and 1990, from 15,084 to 16,956 people, and by 2.1 percent per year from 1990 to 2005, to 23,278 people. Table 3-1 shows the lower AARGs for the same period for Clackamas County (2.2 percent and 1.9 percent), the metropolitan area (1.6 percent and 1.4 percent), and smaller areas around West Linn. These recent forecasted rates of growth for West Linn are higher than those of just five years ago for the time period through the year 2000; in 1982 the city forecast an average annual growth rate of less than 2.0 percent through 2000.[3]

The clear conclusion is that Metro expects West Linn to be a fast-growing area in the Portland region, and one of the fastest-growing areas within the immediate study area, an area of historically high growth rates itself.

---

[3]City of West Linn. 1984. Comprehensive Plan Inventories, Population, housing, and Buildable Lands, page 9.

TABLE 3-1
POPULATION TRENDS IN WEST LINN AND SURROUNDING AREAS

Area	Population 1986	1990	2005	% Change 1986-2005
West Linn	15,084	16,956	23,278	54.3%
AARG[a]		2.9%	2.1%	
5 Min. from 205/43	36,221	38,878	48,841	34.8%
AARG		1.8%	1.5%	
5-10 Min. from 205/43	90,093	97,698	126,232	40.1%
AARG		2.0%	1.7%	
Clackamas County	251,000	274,466	362,474	44.4%
AARG		2.2%	1.9%	
Metro Area	1,086,000	1,157,214	1,424,257	31.1%
AARG		1.6%	1.4%	

Source: Metropolitan Service District, Data Resource Center, April 1988.
a Average Annual Rate of Growth

3.3.2 HOUSING CHARACTERISTICS

Table 3-2 shows building permit activity in West Linn for 1986 and 1987; Table 3-3 shows the number of housing units in West Linn and surrounding areas in 1986, and a 20-year forecast. The forecasts of housing growth in West Linn parallel those of population growth, not surprising since the two variables are directly related both in theory and by Metro's forecasting method. Metro uses trends in residential construction, as estimated by building permits, as the principal variable for allocating the expected metropolitan growth in both housing and population.

Figure 3-1 shows graphically the basis for Metro's expectations that West Linn will be a regional growth area. Note how residential construction between 1980 and 1986 has suburbanized, falling roughly along the semi-circle described by Highway 217 and I-205.

TABLE 3-2
BUILDING PERMITS ISSUED
CITY OF WEST LINN, 1986 - 1987[a]

House Value in $	1986	1987
40,000 - 100,000	n/a[b]	27
100,001 - 150,000	116	94
150,001 - 200,000	16	40
200,001 - 250,000	1	6
>250,000	1	5
Total	232	172

Source: Metropolitan Service District

[a] MSD's data by house value is incomplete for 1986; however, the total figure of 232 permits issued in 1986 is accurate. In 1986, two of the permits issued were for construction of multi-family dwellings. No multi-family units were constructed in 1987.

[b] Not available

TABLE 3-3
HOUSING FORECASTS FOR WEST LINN
AND SURROUNDING AREAS

Area	Total Housing Units 1986	1990	2005	% Change 1986-2005
West Linn	5,717	6,352	8,730	52.7%
AARG		2.6%	2.1%	
5 Min. from 205/43	14,310	15,243	18,732	30.9%
AARG		1.6%	1.4%	
5-10 Min. from 205/43	49,956	53,843	68402	36.9%
AARG		1.9%	1.6%	
Clackamas County	98,228	106,809	138,985	41.5%
AARG		2.1%	1.8%	
Metro Area	463,260	493,778	608,163	31.3%
AARG		1.6%	1.4%	

Source: Metropolitan Service District

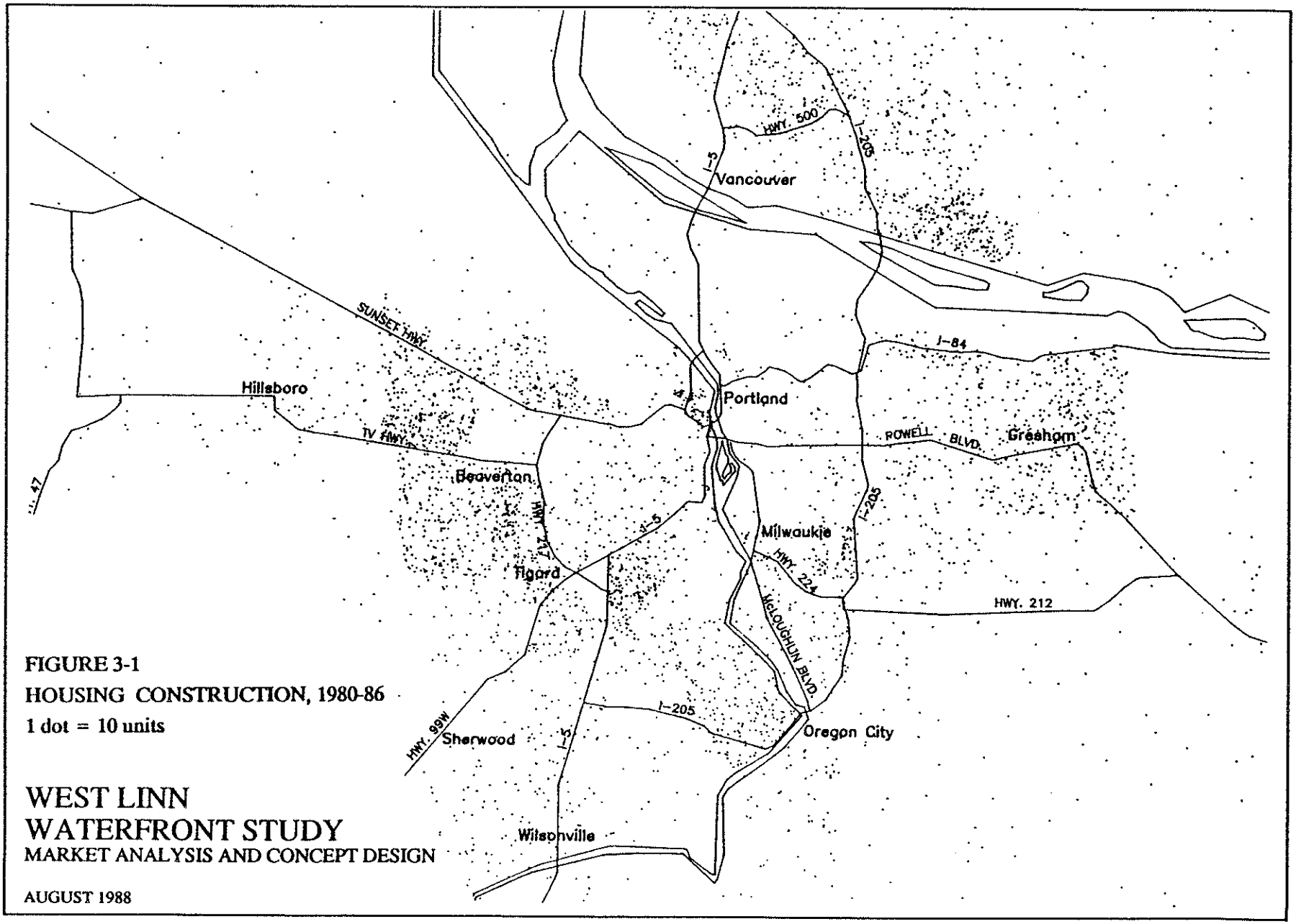


FIGURE 3-1
HOUSING CONSTRUCTION, 1980-86
1 dot = 10 units

WEST LINN WATERFRONT STUDY

MARKET ANALYSIS AND CONCEPT DESIGN

AUGUST 1988

Growth has slowed since 1985, however, and according to Metro's projections the number of housing units in West Linn will grow at a decreasing rate through 2005. In 1986, West Linn had 5717 housing units. This number is expected to grow by 2.6 percent per year until 1990, and by 2.1 percent per year until 2005, when it will reach 8730.

What will those new housing units look like? The long-run trends have been for West Linn to supply predominantly single-family housing. The area within the city limits of West Linn has the lowest percentage of multi-family and renter-occupied housing of all the areas defined in our data. Of the housing units in the West Linn city limits in 1986, 17.4 percent were multi-family and 82.6 percent were single-family.

Data for concentric isochrons (areas defined by equal travel times: 5, 10, and 15 minutes away from the I-205/Highway 43 intersection) show that areas farther away from the intersection of I-205 and Highway 43 have higher percentages of multi-family and renter-occupied housing than closer areas. The areas 0-5 and 5-10 minutes away from the intersection both had roughly 20 percent multi-family housing in 1986; the area 10-15 minutes away from the intersection had 27.7 percent multi-family housing. The owner-renter pattern is similar: in 1980, the three isochrons had 28.0 percent, 28.4 percent, and 36.8 percent renter-occupied housing, respectively, moving out from the intersection.

Looking at data in concentric bands around the I-205/Highway 43 intersection gives similar results. In 1986, the area 0-5 miles from the intersection had 20.8 percent multi-family housing and 27.7 percent renter-occupied housing (1980); the area 5-10 miles from the intersection had 37.8 percent multi-family housing and 45.8 percent renter-occupied housing (1980).

But these aggregate numbers do not illustrate well the recent growth in multi-family housing. Between 1980 and 1985, West Linn experienced a surge of multi-family housing construction, growing 4.9 percent per year. This was the second highest rate of all the surrounding areas for that period, almost matching the average annual rate for Clackamas County as a whole (5.0 percent). In 1986-87,

however, only two multi-family building permits were issued in West Linn. But in 1988 94 units are now under construction along Highway 43 south of the Robinwood shopping district. And according to Michael Butts, West Linn planning director, their are currently two applications for permits for a total of 174 units south of Mary S. Young state park near Highway 43. Tom Hamann of OTK, Inc. said these two multi-family developments will have one- and two-bedroom apartments (950 sq. ft.) with a limited view of the Willamette River. Hamann could not predict the future rental rates for the units but suspected that tenants would be middle- to upper-income households. He also felt that the future market for multi-family housing in West Linn would be weak.

Whether multi-family housing will grow in the future depends primarily on the demand for that type of housing in the Portland metropolitan area and the availability of appropriately priced land in West Linn for multi-family housing. The question is not whether West Linn is a good location for multi-family housing (it is) but whether those multi-family units can rent at prices that cover the relatively high land prices, development costs, and taxes. Most of the land planned and zoned for multi-family housing is not on the flat land along Highway 43 and I-205, but in the hills above the Willamette area. Assuming that the City maintains the multi-family zoning, those properties could become more attractive, even at relatively high prices, if no other land is available in West Linn for multi-family development.

3.3.3 HOUSEHOLD SIZE

Historically, both in the United States and the Portland metropolitan area, household size has been decreasing. All available sources forecast the continuation of this trend through at least the year 2000. While the actual number of persons per household in West Linn is not significant in the context of this report, the overall trend is. Household size can be an important point to consider since the decision unit for many purchasing decisions is the household, rather than the individual. Retail sales of items purchased on a household basis rather than an individual basis (e.g., housewares, appliances, furniture) will continue to increase

even in the absence of population growth as long as the number of households increase.

3.3.4 INCOME

Income data support the previous conclusion about housing. West Linn had the highest mean household income of all the areas defined in our study in 1985. West Linn's mean household income was $36,791, compared to $33,688 in Clackamas County and $29,749 in the metropolitan area as a whole.

Mean household income drops as one moves farther away from the I-205/Highway 43 intersection. It goes from $33,457 in the area within 5 minutes from the intersection, to $32,263 in the area within 10 minutes of the intersection, to $27,791 in the area within 15 minutes of the intersection. Mean household income is $33,032 within 5 miles of the intersection, but it drops to $26,792 in the area within 10 miles from the intersection.

The city of West Linn has a wealthier population than any of the other areas we defined. In 1985, 39.7 percent of its households had an income of $35,000 or more, compared to 33.9 percent in Clackamas County as a whole, and 27.4 percent in the entire metropolitan area.

The latest figures available from the U.S. Bureau of the Census illustrate the same point. Of the over 200 cities in Oregon, West Linn rates seventh in per capita income ($12,879). All cities with greater incomes are in the Portland metropolitan area, most of them in the suburban southwest: Lake Oswego, Wilsonville, King City, and Durham.

3.3.5 OCCUPATION

In all the study areas we defined, the administrative support occupation category is the largest, with an average of about 18 percent of the employed population over 16 years old employed in this category in each study area.

Of the areas we defined for this study, the city of West Linn has the highest percentages of people employed in executive and managerial professions (17.6 percent) and professional specialties (16.6 percent). In Clackamas County as a whole 12.4 percent of the population is employed in executive and managerial occupations, and 11.8 percent is employed in professional specialties. In the metropolitan area, 15.2 percent of the population is employed in executive and managerial occupations, and 12.8 percent is employed in professional specialties.

These data are consistent with the data about housing and income: the population of West Linn exceeds the regional average for professional and, hence, higher-income households.

3.3.6 EDUCATION

West Linn's population is better educated than the population of other areas in our study. 88.7 percent of West Linn's population of persons 25 or older had a high school diploma in 1980, and 30.9 percent had a college degree. In Clackamas County as a whole, 79.4 percent of the population had at least a high school diploma, and 19.2 percent had a college degree.

3.3.7 EMPLOYMENT BY SECTOR

Table 3-4 shows that three sectors provide more than half of the jobs in West Linn: services employ 21.8 percent; government, 18.3 percent; and retail, 16.4 percent. The percentage of jobs in the service sector is about the same as in the surrounding area. The percentage of retail employment is about the same as in Clackamas County and the metropolitan area, but it is lower than the area within 15 minutes of the I-205/Highway 43 intersection. The percentage of government jobs, 18.3 percent, is the highest of all our defined study areas. West Linn also has a smaller share of self-employed people, 7.8 percent compared to 15.5 percent in Clackamas County as a whole.

We present these data as illustrative rather than definitive. Persons familiar with West Linn will realize that the estimated employment for manufacturing (7% = 177 employees) must be incorrect given that James River has around 600 employees.[4] Thus, both the percentages presented above illustrating the distribution of employment, and those in section 3.3.5 (Occupation) should be viewed with this discrepancy in mind. However, taking into account the additional manufacturing employment at the James River plant would not significantly alter our conclusions. Even though the paper mill is one of the largest single employers in the city, it is also the only large industrial employer. The majority of West Linn residents are employed in the non-industrial sectors and will continue to be since West Linn has little land suitable for industrial development.

---

[4]We discussed this problem with Dick Bolan of the Metro Data Resources Center. The error might have occurred because of either (1) incorrect geocoding (the most likely explanation), or (2) employment being reported at a different address (e.g., a main office elsewhere in Oregon).

TABLE 3-4
1985 EMPLOYMENT BY SECTOR (PERCENT)
IN WEST LINN AND SURROUNDING AREAS

	West Linn	5 Min. from I-205/43	5-10 Min. from I-205/43	Clackamas County	Metro Area
Services	21.8	20.7	14.4	16.4	20.1
Retail	16.4	21.5	21.6	16.6	16.1
Government	18.3	14.3	14.5	14.3	12.8
F.I.R.E.	8.6	7.1	5.0	5.5	7.3
Wholesale	7.2	3.2	8.6	7.3	8.1
Manufacturing	7.0	11.0	10.9	14.2	11.7
Self-Employed	7.8	13.4	17.9	15.5	9.7
Other	12.9	8.8	7.1	10.2	14.2
Total	100.0%	100.0%	100.0%	100.0%	100.0%
Total # Employed	2,511	10,887	32,561	85,061	553,913

Source: Metropolitan Service District

3.3.8 General Conclusions

The overall picture across all economic and demographic variables we studied is consistent: compared to most surrounding areas we studied (Lake Oswego is the exception), the West Linn area has faster growth, more affluence, a better-educated populace, a higher percentage of people employed in professional positions, a higher percentage of single-family residences, and higher average housing values. Also, the forecasts of these variables point to the continuation of these conditions in the West Linn area.

The implications for this study are clear: the West Linn area will appeal to higher-line retailers, and up-scale office and residential developments. While, as mentioned earlier in this chapter, we do not recommend the development of a regional shopping center selling comparison goods, the market demand should be strong for high-end specialty goods and high quality comparison goods that are not

readily available in other convenient locations in the metropolitan area. Whether that demand can be channeled toward new space in the waterfront area depends on how much competition that new space faces, a question we address in the next section.

3.4 ANALYSIS OF MARKETS BY TYPE

3.4.1 INTRODUCTION

The demand for land in the study area (the proposed West Linn urban renewal district) is not homogeneous across types of uses. The only way the demand can be described and analyzed is by dividing it by type of use.

Many different types of uses might locate in the urban renewal district: it has locational characteristics suitable for almost all types of use. But we know in advance that the waterfront site in particular will be expensive to develop and has several constraints. Moreover, for some regional uses (like comparison shopping, convention centers, hotels, corporate headquarters) there is obvious competition from other areas in the metropolitan region.

For these reasons we concentrated our analysis on types of uses that could probably be developed at the waterfront site in the next few years. The likely uses at the waterfront site are different from those that might locate around the 10th Avenue/I-205 interchange or on the land off of West A Street and northwest of I-205. At the city's request, however, we kept our market analysis general so that it would cover all uses that might go in at either location. We discuss the market for each of these general uses (government, office, neighborhood and specialty retail, housing, and marina) in the rest of this chapter. In Chapter 6 we discuss briefly other uses that might be appropriate on land adjacent to but outside of the immediate waterfront study area.

3.4.2 THE MARKET FOR INSTITUTIONAL OFFICE SPACE

Three considerations strongly suggested that we investigate the possibility of putting local government functions into any new development in the waterfront area. First, from its inception the study of the waterfront parcel has had as an objective the creation of a sense of identity, a city center, for West Linn. Putting government uses at the site would be a great help in establishing a sense of identity and a West Linn downtown. Second, many city functions are currently in leased space in the shopping center at 10th Avenue. Thus, those uses are footloose. Moreover, the city may gain directly from consolidation through reduced costs and increased convenience. Third, government uses are stable. Having the city as a tenant reduces the riskiness of the development. Putting city government in a new development creates a stable cash flow and a critical mass of employees for supporting related retail uses. In short, the City of West Linn becomes an anchor for any development at the waterfront site.

We had no trouble estimating the city's potential demand for space: someone had already done it. In June 1986 Barrentine, Bates, and Lee, Architects, evaluated West Linn's likely space requirements in 2000. We discussed these estimates with Rob Barrentine (who believes they are accurate but may slightly overstate requirements because department heads were allowed to specify the amount of space they wanted without cost constraints) and with Mike Butts (who thinks the analysis accurately reflects the city's needs). Thus, we believe the estimates are sufficiently accurate for our purposes in this report.

The Barrentine report estimated a demand for 16,955 square feet (s.f.) in 1986, and for an additional 1,255 s.f. by 2000, a total requirement of 18,210 in 2000. We estimated the space available at the town hall at about 7,000 s.f. We assume that the city will continue to occupy the town hall building that exists in the waterfront site. Whether it choose to reallocate the space in the town hall to other departments is irrelevant to our analysis. If we also assume that all city services except fire (which will stay at stations) are consolidated at the waterfront site, then the net demand for new space in 2000 is 11,200 s.f.

This estimate does not include the library: the Barrantine report estimates a demand for 16,550 s.f. by 2000. Though we believe the library would have been a good use for the waterfront site, the City recently bought property near the post office for a new library and has engaged architects to begin design.

Government uses need not be limited to those of local government. It may be possible that special districts and county, state, or federal agencies would want space. We considered the U.S. Post Office for West Linn a likely candidate because it has to locate locally, it is an obvious and high-profile civic function for a downtown, and it generates traffic. Lee Schafer of the real estate division of the U.S. Post Office said the post office has about 4580 s.f. now, will need to expand, but has provisions for expansion at the existing building it now leases. He would consider moving to new space if he didn't have to pay more than the $2.46 per s.f. per year he pays now. As our cost analysis in Chapter 5 demonstrates, the city would have to subsidize this use to entice the post office to the waterfront area. If it did move, Schafer said the post office would want about 10,000 s.f.

3.4.3 THE MARKET FOR OTHER OFFICE SPACE

The majority of West Linn's available office space is located in small single-story projects in the Robinwood district. According to Alan Pynn, who manages the majority of the 50,000 square feet of office space in Robinwood, demand in West Linn traditionally comes from self-employed professionals (chiefly doctors, dentists, and lawyers), who can move their offices back into their houses when economic times are bad. This phenomenon was observed during the recent recession. The late 1970s was characterized by low vacancy rates; however, as the economic health of the nation deteriorated many professionals could not afford their offices. The market bottomed out in 1985 with 30 percent vacancy rates and has improved marginally since then.

Most of the office space outside of the Robinwood district is occupied by governmental agencies. The City of West Linn rents 4,220 square feet of office

space in the Willamette district, and the U.S. Post Office occupies nearly 5,000 square feet in the West Linn Shopping Center. With the exception of banks, the balance of the city's office space is owned and occupied by private individuals. Existing office developments in West Linn range from 10 to 15 years in age. The current supply of both office and retail space in West Linn is outlined in Table 3-5.

TABLE 3-5
COMMERCIAL SQUARE FOOTAGE BY DISTRICT

District	Retail	Office	Other[a]
Robinwood	90,590	47,447	5000
West Linn Shopping Center	67,538	25,004	--
Willamette	33,730	2,710	--
Willamette Square	26,133	7,000	--
Sunset	3,800	--	--
Total	221,971	82,161	5,000
Total Commercial 309,132			

Source: Development Services, The City of West Linn
[a] Kinder Kare/ Child Care

There is very little attractive commercial land available should the city wish to expand its office space supply. The Robinwood district contains approximately 10 acres of commercial land that is well suited for office space, which is priced between five and ten dollars per square foot. Alan Pynn thinks that new office space in this district would have to rent for at least $12 per square foot per year to make the development profitable. Table 3-6 shows land prices in West Linn and neighboring communities.

In the Willamette district at the 10th Street interchange of I-205 there are more than 20 acres of commercially zoned parcels. Although land prices are as low as three dollars per square foot, the lots have remained vacant for several years. Much of the property is on a steep slope, making development costs very high.

TABLE 3-6
LAND PRICES IN WEST LINN
AND SURROUNDING COMMUNITIES, 1988

Land Type	Location	Price per Square Foot
Commercial		
	West Linn	$8.00
	Lake Oswego	
	Old Town	10.00
	City Hall	14.85
	Kruse Way	7.50
	Lake Grove	5.00-7.00
	Oregon City	
	Molalla Avenue	3.50-7.00
	McLoughlin	4.50-5.00
Residential		
	West Linn	
	Hidden Springs Summit	3.00-4.00
	Haverhill	3.00-4.00
	Barrington Heights	4.00
	Stafford Hill	2.00
	Lake Oswego	
	River Property	2.00
	Multi-Family	3.50-4.00
Industrial		
	West Linn	2.50

Source: Complied by ECO Northwest, based on information provided by Rod Scamahorn, Clackamas County Assessor's Office

In general, developers do not expect to see major office space development in the short-term future. Office development in West Linn is hindered by the proximity of the popular Kruse Way, Highway 217, and Washington Square office complexes. When combined with the Sunset Corridor, these office markets are the

strongest in the Portland suburban area and account for nearly 2.2 million square feet of office space. Although vacancy rates are still in the 20 percent range, local developers expect the vacancy rates to fall as new construction slows and absorption begins. Vacancy rates and rents for office space in West Linn and Lake Oswego are outlined in Table 3-7.

TABLE 3-7
RENTS AND VACANCY RATES FOR OFFICE SPACE IN WEST LINN AND SURROUNDING REGIONS, 1988[a]

Location	Rent	Vacancy
West Linn		
Robinwood	$6.00-12.00	25%
Willamette	8.50	0
Lake Oswego		
Downtown	9.50-12.00	N/A
Kruse Plaza	11.00	N/A
Kruse Way	15.00	30
Center Point 1	14.50	30

[a] Rent in dollars per square foot per year

Source: Complied by ECO Northwest, based on information provided by Rod Scamahorn, Clackamas County Assessor's Office

We admit that even in a weak market, quality space provided at competitive prices in a good location can lease up. But the softness of the current office market makes development in West Linn both less likely and more risky in the short run. In the longer run, as the population in and around West Linn grows and existing office space is absorbed, some land in West Linn has the locational characteristics (freeway access, good public services, views) to make it competitive for office development.

3.4.4 THE MARKET FOR RETAIL SPACE

West Linn has three major retail districts (Robinwood Shopping Center, West Linn Shopping Center, and Willamette), which have nearly 200,000 square feet of retail space. The three centers have very similar tenants and cliental. All are anchored by a medium-to-large sized grocery/drug stores with specialty and service stores providing support. Shopping center managers and local developers believe West Linn's retail business is supported almost exclusively by the residents of West Linn. The market area for each shopping complex may extend two to three miles. Customer demographics match those for the city itself: families of upper middle-class professionals with one to two children.

The Robinwood shopping district, which is located in north West Linn on Highway 43, has 90,000 square feet of retail space. It is youngest of the three shopping districts with most of the buildings completed within the last 8 to 15 years. Zupan's Super Center, which offers groceries and hardware, accounts for nearly half the space at 40,000 square feet. By far the largest retail outlet in the city, Zupan's draws customers from all of West Linn. In addition to Zupan's the Robinwood district has a travel agency, tanning salon, and other service and specialty tenants. The Robinwood Shopping Center includes the majority of the district's retail space and has a one percent vacancy rate. Ester Herring, manager of the Robinwood Shopping Center, said the low vacancy rate is somewhat deceiving because triple net rental rates at eight dollars per square foot per year are below market value. The Shopping Center had high vacancy rates three to four years ago, but an improved retail market coupled with low rents brought the vacancy rates down.

South of the Robinwood district, an additional 65,000 square feet of retail space are located in the 25-year-old West Linn Shopping Center. The Shopping Center is 98 percent leased, with rental rates ranging between six to ten dollars per square foot. The Thriftway grocery store at 32,000 square feet is the anchor. The center also includes a yogurt shop, video rental outlet, apparel store, and a Hallmark card and gift store. The smaller specialty and service shops range in size

from 1,000 to 3,000 square feet. Due to its central location, retailers in this area primarily compete with retailers in the Robinwood and Willamette districts.

The Willamette shopping district offers 60,000 square feet of retail space. The district has vacancy rates near nine percent with rental rates averaging $8.50 per square foot per year. The relatively small Sentry Market (22,000 square feet), which sells groceries and drugs, is the anchor of the Willamette shopping district. Additional stores fall primarily in the service and specialty category and include a bike shop and a weight loss center.

The shortage of commercial land discussed in the office section likewise hinders further retail development. If zoned commercial, two old single-family homes in the West Linn Shopping Center district could provide an additional acre of commercial land should developers show an interest. In addition, five to seven acres of "tourist commercial" land are vacant east of the Willamette Center, adjacent to I-205. Some developers we interviewed believe the parcel, which is on low land, would be ideal for a motel. Currently there are no plans for development.

Developers forecast improvement in West Linn's retail market; however, they believe this will bring few changes to the city's landscape, as the improved retail market will simply result in absorbtion of the existing retail space. As with office space development, local developers suspect any major retail development in the future will occur in the Rosemont district where new housing construction will occur. However, the current plan and zoning maps show that area as exclusively low-density residential; the zoning ordinance does not list any commercial uses as permitted or conditional--the City will have to address the issue of where to direct future retail growth.

The residents of West Linn spend a great proportion of their retail dollar outside of West Linn. Alan Pynn estimates that 35 to 40 percent of the expenditures made by West Linn residents on retail goods and services are made outside the city. Standard sources provide no data that would allow us to corroborate this estimate; only a consumer survey could do that.

Tualatin probably profits the most from the exported business. Located at the junction of I-205 and I-5 (10 miles from West Linn), Tualatin's retail businesses

have easier access for West Linn residents than do some businesses in West Linn itself. G.I. Joe's, Fred Meyer, and K-Mart are all popular destinations for West Linn residents. All three provide a diversity of general merchandise at discount prices.

Oregon City provides the closest community shopping center for residents of eastern West Linn. The 250,000-square-foot Oregon City Shopping Center has three anchors: the Emporium, Larry's Sporting Goods, and Payless. The anchors alone offer a wide selection of apparel, accessories, variety, and sporting goods that are not available in West Linn.

Lake Oswego attracts many customers from the northern sections of West Linn. Lake Place Shopping Center, Lake Oswego Center, Country Square, and the Village Shopping Center combine for more than 210,000 square feet of retail space in downtown Lake Oswego. Tenants include supermarkets, lawn and garden stores, dry cleaners, variety shops, and apparel stores.

A local developer speculates the new Costco in the City of Clackamas will also take business from West Linn. The wholesale warehouse chain sells everything from bulk groceries to television and stereo equipment.

Finally the multi-level Clackamas Town Center, which is the second largest regional mall in the Portland metropolitan area (1.2 million square feet), houses a number of department, furniture, jewelry, and clothing stores. The mall's location on I-205 makes it easily accessible for residents of West Linn.

In summary, West Linn offers no advantages for large retailers: its land is limited, and it faces a lot of established competition close by. West Linn's retail niche is for neighborhood commercial. The most obvious category of retail demand that will grow with the growing population is for necessities: food--groceries, specialty foods (wine, coffee, pastries), and restaurants (fast foods and traditional)--drugs, and sundries. The second category of retail demand that the upper-income demographics of residents suggest that West Linn could supply is for specialty items: e.g., flowers, gourmet foods, books, etc.

3.4.5 THE MARKET FOR MOORAGE

A recent[5] report shows demand for boat slips far exceeding supply on the Portland area portion of the Willamette River. Each of the six marinas on the river reported full occupancy and lengthy waiting lists.

Our interviews with marina employees confirms that the boat slip shortage persists. Waverly Yacht Club, which is one of only two marinas that has adequate space for boats over 25 feet in length, has 90 boat-owners on its waiting list. Riverplace Marina, which has 88 boat slips, estimates they have a six year waiting list. With monthly boat slip rates ranging between 75 to 210 dollars a month, one marina manager speculates that supply is short simply because marinas are not extremely profitable when compared to other waterfront property uses. This concern is not important for our project, however: the waterfront at Highway 43 is so steep that no other uses are feasible.

The steepness of the waterfront near the Highway 43 bridgehead is a real limitation on moorage development. Boat owners want slips with convenient parking and easy access (ramps, not stairs) for loading, unloading, and maintaining their boats. Trying to develop a marina off of Territorial Road would be difficult, as would be getting access slightly north (downstream), where a ravine passes under I-205.

In our concept design we show a floating dock for day-use tie-ups, but not a full marina with slips for permanent moorage. Moorage is usually a break-even use at best. It's chief purpose is to make land-based uses more attractive and profitable. Despite the market for that moorage, the waterfront site looks too difficult.

---

5 Hobson & Associates. 1986. Milwaukie Riverfront Market Analysis. Prepared for the City of Milwaukie.

3.4.6 THE MARKET FOR RESIDENTIAL SPACE

West Linn is currently experiencing a period of strong new home construction. Fueled by the ample supply of attractive lots in the Rosemont district, developers have four major projects underway: Hidden Springs Summit, Barrington Heights, Haverhill, and Rosemont Heights.

Prices for new single-family homes generally range between $150,000 and 350,000. The prices have remained in this range due to three factors. First, high developmental fees, which exceed $15,000 in some cases, make the development of houses in the $80,000 to 100,000 range unprofitable. Second, property taxes, which have risen to $28 per thousand in West Linn, are also not conducive to small home development. These two factors set the floor for new house prices, while the ceiling is set by a third one: West Linn's competition with neighboring Lake Oswego. As house prices exceed the $350,000 mark, buyers are lured to the more prestigious Lake Oswego area.

In general, the houses in these new developments share the same characteristics. The homes are built on lots ranging from 9,000 to 22,000 square feet in size and $35,000 to $65,000 in price. Most lots have a spectacular view of the Cascades and surrounding communities.

Of all the projects Hidden Springs Summit I and II appear to be the most successful. The majority of the houses in the Summit I project have nice views and sell for an average price of $230,000. After one year on the market, 41 of the 43 lots were purchased. Since January of 1988, 18 of the 36 Summit II houses have sold in the $300,000 range.

Other developers have had to be more patient. Mike Duncan, who has been involved with the Haverhill project for more than two years, says lots finally went on sale this year. Haverhill offers three to four bedroom houses for $200,000 on average. The slower purchasing rate may be attributed to the fact that only 40 percent of the Haverhill homes have a view. Since last January, ten of the 25 houses have been sold.

Also having some troubles are the developers of the Barrington Heights neighborhood near I-205. The large homes (3,500 - 5,000 square feet), which approach a half million dollars in price, may be adversely affected by Lake Oswego competition and highway noise.

With homes priced in this range, buyer demographics are predictable. Most buyers are in their early 40s with household incomes in excess of $70,000 a year. The average household size matches the Clackamas County average at 2.77. Although no precise occupational breakdown is available, Mike Barkley, a local house designer, describes the buyers as entrepreneurs. Very few new home buyers work in West Linn. Besides the spectacular views and attractive neighborhoods, new residents cite West Linn's excellent school system and easy highway accessability as two factors that weighed heavily in their location decision.

Due to the ample supply of attractive land in the Rosemont district, developers predict moderate to heavy building for some years to come. In the long-run if the Rosemont district becomes too congested, developers are already looking at the Stafford Hill area across Interstate 205. Five to 20 acre lots with attractive views range in price from $120,000 to 210,000. So far doctors have been the primary buyers and have no short-term plans for housing developments.

In summary, the market for upper-end single-family homes is strong in West Linn. Multi-family development is also strong in the short run, due to the building of a single developer. In the longer run the expected population growth in the metropolitan region should maintain average demand for new multi-family units. Whether they come to West Linn or not will depend on the price of land: the many desirable characteristics of West Linn (views, access, schools, other services) make its land prices relatively high.

We did not consider housing as part of the development we evaluated around city hall: the high-income market is for single-family homes with views and space; given the construction costs and the prices new housing at the waterfront would have to rent or sell for, it would not compete well with other housing in and around West Linn.

CHAPTER 4
DESIGN PROGRAM FOR THE WATERFRONT SITE

4.1 INTRODUCTION

In Chapter 2 we examined the national and state economies, and national trends in commercial and residential development to set the context for our market analysis of West Linn. In Chapter 3 we narrowed our focus to the Portland area and West Linn, looking at the types of growth that one might reasonably expect to occur in West Linn. In this chapter we narrow our focus further, looking at what we will refer to as the "Waterfront Site": approximately eleven acres of land on a bench above the Willamette River extending for about 300 yards on either side of the Highway-43 bridgehead and bordered on the west by Highway 43 and Willamette Falls Drive.

Our purpose is to design a preliminary development concept that is compatible with the characteristics of the site, the dictates of the market, and the desires of the City.

4.2 SITE OPPORTUNITIES AND CONSTRAINTS

Appendix D contains a report prepared by SRG Partnership, in corroboration with Walker & Macy, describing the characteristics of the waterfront site. Figure 4-1 shows the potential redevelopment area.

The site has four major constraints that severely limit the amount of developable land available:

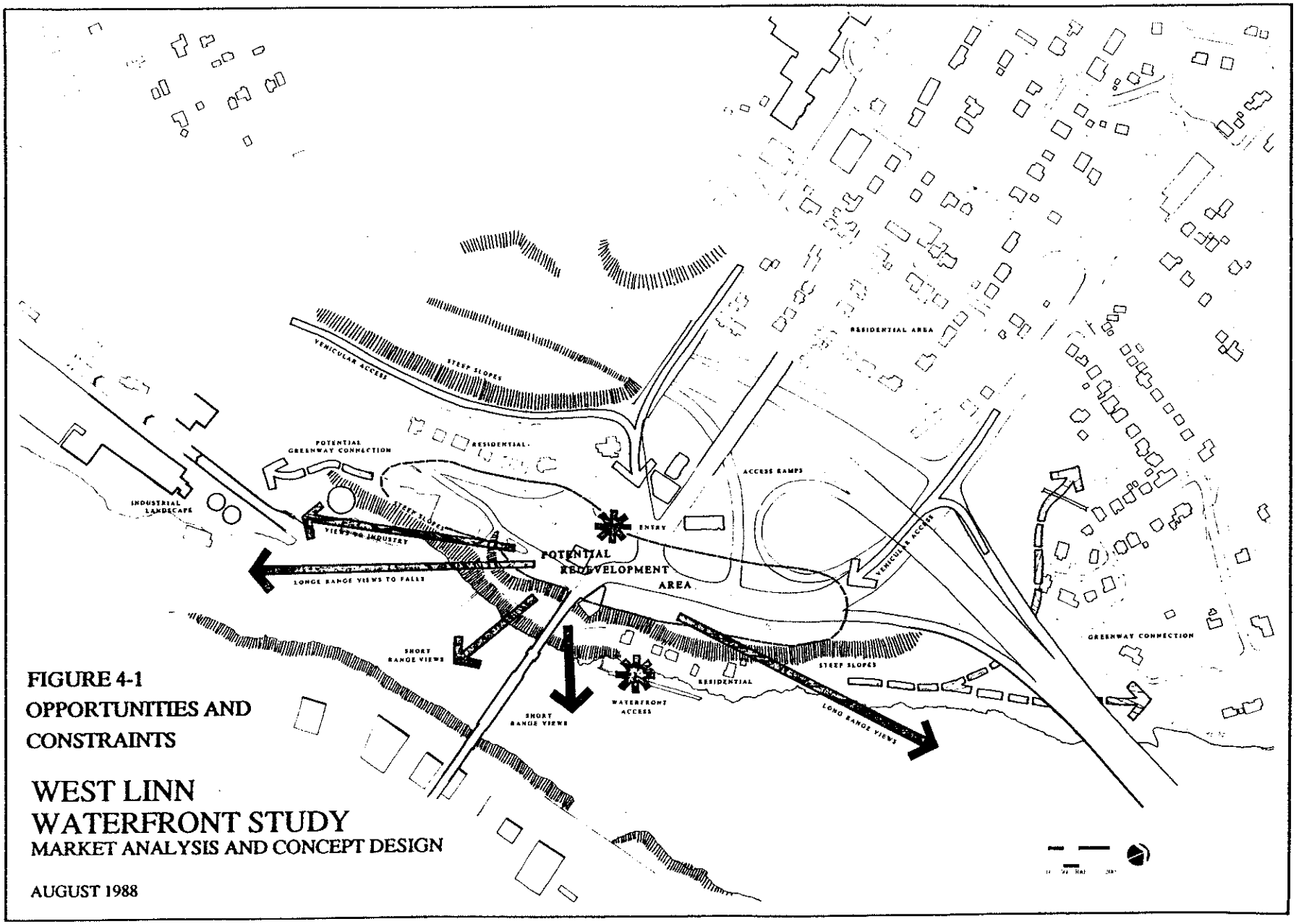


FIGURE 4-1
OPPORTUNITIES AND CONSTRAINTS

WEST LINN WATERFRONT STUDY

MARKET ANALYSIS AND CONCEPT DESIGN

AUGUST 1988

1. Highway uses. Between I-205 and the Willamette River most of the developable land is given to transportation uses: ramps and attendant rights-of-way; a knot of intersections around the bridge and city hall; parking and circulation for James River.

2. Multiple ownerships. James River owns the most suitable property for development, which it now uses for parking that it needs for its mill employees. Figure 4-2 shows the ownership pattern.

3. Small amount of developable land. Even if the James River property were available for development, there is not much of it. The land between I-205 and the Willamette River slopes sharply to the river, with an average slope of about 1:4 (a 200-foot elevation loss in about 800 feet). The steep slopes strongly suggest that commercial development at the river bank (i.e., along Territorial Drive) will not be feasible because of problems of access and construction costs. The flood-plain area is well suited, however, for recreational use. Nonetheless, any commercial development will have to occur on the small bench above the river (roughly at the elevation of Highway 43) that averages less than 100 yards wide.

4. Bedrock. Even that bench is expensive to develop because it is solid rock at or near the surface.

Recognizing these constraints, we decided early in our analysis that development of the scale that West Linn wanted us to consider would probably be impossible unless the James River property were available. We met with the plant manager at James River to see whether the company would even consider the possibility of selling, trading, or giving some of its property to the city for development. In meetings between our consulting team, the city, and the management of James River's West Linn mill, we agreed to the following points:

1. The mill operation is competitive and likely to continue at the existing site at the same level of employment and up to a 30% increase in truck traffic.

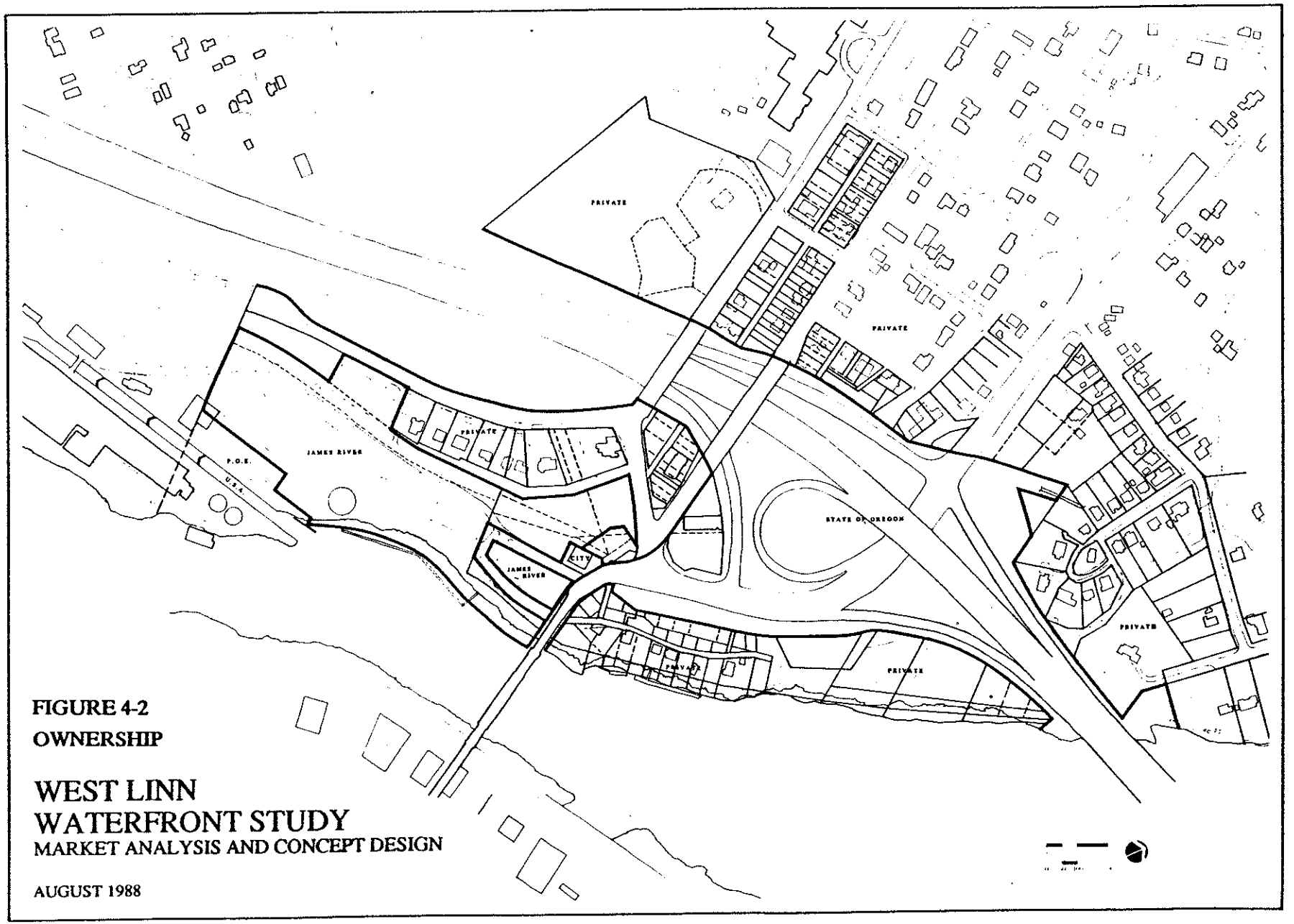


FIGURE 4-2
OWNERSHIP

WEST LINN WATERFRONT STUDY

MARKET ANALYSIS AND CONCEPT DESIGN

AUGUST 1988

2. James River wants to be a good neighbor in West Linn and to support civic improvement, but it could not support any project that threatened its profitability, either by diverting its capital from scheduled investments in equipment, by worsening its existing handicaps relating to truck access and employee parking, or by allowing surrounding uses that may later object to its operation.

3. Given point 2, our job as consultants was to see whether we could design a project and financial package that gives James River equivalent or better truck access, employee parking, security, and buffering from unacceptable land uses.

4. For its part, James River agreed that it has no unalterable policies or plans that would preclude it from disposing of some of its land used for parking if we could meet the goals we list in point 3. In other words, if we can provide a design that gives James River equivalent or better access, parking, and security at costs no greater than those it otherwise would have been willing to incur to improve those services itself, the fact that we can do that on less land than James River now owns is irrelevant.

5. Nothing we discussed obligated James River to any plan or policy. The essential result of our conversations was James River's indications that the type of the development the city is considering is not out of the question for James River, and that if the design can reduce some of James River's handicaps at the same time it benefits West Linn, James River will consider it.

These conditions became key in our design program. Unlike many urban renewal projects, where an analyst may assume that compensation at fair market value is a sufficient estimate of the cost of land acquisition, in this project we were committed to finding a design alternative for the major employer in West Linn. In other words, the cost to the City of getting the James River property would be the cost of building whatever improvements were necessary to ensure the mill that its operations would not be harmed.

Designing to not harm James River is overly pessimistic: we believe a good design can actually be beneficial. Circulation and parking for James River could be improved in many different ways that are compatible with commercial-government uses on the site. James River may also receive benefits from improved image and new urban amenities. The difficult question, which we address in Chapter 5, is whether the proposed improvements can be made at a cost that allows the total development to pencil-out.

James River's emphasis on access relates to our discussions with the city and the Oregon Department of Transportation (ODOT) about improvements to the I-205 interchange. ODOT wants to improve its on- and off-ramps at the I-205/Highway 43 interchange to eliminate documented problems with safety and level of service. As part of our design, we evaluated several alternatives for the new interchange. The one we selected was evaluated as feasible by two traffic engineers we consulted informally; Tom Schwab of ODOT reviewed the design and generally concurred that it would serve the purposes of the state both in terms of anticipated grades and projected traffic counts. In addition to reducing traffic problems, the new design opened some of the existing right-of-way of Highway 43 for development.

In summary, the design program we present in the next section depends on both (1) the acquisition of some property now owned by James River (which, in turn, depends on the degree to which our design is acceptable to James River) and (2) the implementation of the redesigned interchanges by ODOT. Thus, our design program and analysis takes a long view: we are evaluating a project that might not be ripe for several years.

4.3 DESIGN PROGRAM FOR THE WATERFRONT SITE

The physical characteristics of the site we described in the previous section gave us some criteria for our design; market considerations that we evaluated in Chapter 3 gave us others.

A key concept of the development is that it combine government functions with retail and office uses of the private sector. We had several reasons for making this concept a condition on development:

1. A principal concern of the city at the outset of this study was its image: it wanted to see if the waterfront development could create a sense of identity for West Linn, a city center. Government uses do that.

2. Given that city services are now dispersed at several sites, it may want a site at which at which to consolidate those services; i.e., there is potentially a strong demand from the public sector for local office space.

3. The city as a tenant provides stability to any proposed development.

4. Government uses can provide a critical mass for supporting retail and service uses.

Other market considerations also influenced our design of the waterfront site. West Linn and the area immediately surrounding it is predominantly a high-income, single-family, suburban residential area. But because of its limited land availability and regional competition, West Linn is not a competitive location for large-scale, regional retail development. The market for retail development in West Linn is likely to be for convenience goods, specialty stores, and restaurants. The market for office space is likely to be for small professional offices, not larger corporate headquarters. For reasons we described in Chapter 3 we did not include housing as part of the development.

In summary, site and market considerations led us to specify the following program for the designers:

1. Government Offices. An ideal use because it accomplishes several objectives at the same time: creates a downtown center, consolidates city services, creates a firm employment base to support retail, and reduces risk (since the project then has a firm tenant). In Chapter 3 we described how we calculated our estimated demand for at least 11,000 additional s.f. by the City of West Linn.

2. Offices. We talked with the credit union, which owns 4000 s.f. and would be willing to relocate into the same amount of space. We talked with Dave Haskett, plant manager of James River, who said that he would consider taking some office space in the new development: as a rough figure he said 10,000 s.f. Because both of these uses relate to James River's operation and can be used to screen that operation from the rest of the development at the waterfront site, they should be located at the southern end of the site, abutting James River property.

   In addition, other professional offices could choose the location: medical/dental (@ 900-1500 s.f. each); financial, including, perhaps, a bank (@ 2500-4000 s.f. each), real estate and title insurance (@ 900-1500 s.f. each), lawyers (given the location of the County Courthouse just across the river). All of these uses are consistent with what the site offers and general trends in downtown redevelopment (toward office development). Together, these uses might occupy an additional 10-20,000 s.f.

3. Retail. The employment in the area will generate much of the demand for retail development. At full development the City will have 70-80 employees; James River has about 600 employees; new offices would contribute another 100 employees. To this base of employees we can add (1) people who come to the waterfront development to conduct business, (2) local consumers, and (3) consumers passing on the freeway. Together, these consumers should be able to support a quick-food delicatessen (2500 s.f.), a tavern (3000 s.f.), a restaurant (5000-15000 s.f.), and 5-10 specialty retail stores (@ 1500-2500 s.f.). The total retail square footage would be about 25,000-40,000 s.f.

4.4 CONCEPT DESIGNS

Figures 4-3 and 4-4 show two versions of the concept design. Both figures show our assumed redesign of the I-205 ramps and Highway 43. Figure 4-3 shows a

design that allows approximately the amount of development specified in section 4.3. On the south of Highway 43 are the existing city hall and expanded city offices. Across the existing Mill Street and next to the bridge overlooking the river is 20,000 s.f. of office space. At the southwest end of the parking lot are two buildings: the larger 10,000 s.f. of office for James River; the smaller 4,000 s.f. for the credit union. Immediately behind these buildings begins the employee parking for James River, which includes an expanded upper lot and a parking structure below (we explain the need for the parking structure shortly). On the north and east side of the realigned Highway 43 is retail space and its required parking. The apartment at the bridge remains, with retail uses filling in next to it and close to city hall. The pedestrian connection across Highway 43 is at grade, though an overpass may be desirable (we do not include it in our cost analysis). The building at the north end of the parking lot could be a restaurant or tavern: the location provides good views, access, and visibility.

Figure 4-4 shows identical uses south of Highway 43, but intensified development to the northeast of Highway 43 by adding a second deck of parking.

The figures make clear many of the constraints of the waterfront site. Lack of buildable land coupled with the requirements by both James River and any new development for parking are the chief constraint. To get some of James River's land to make development south of Highway 43 possible, we must find a way to give back to James River the parking stalls it loses. Ken Burnett, the plant engineer, said James River has about 435 parking spaces now, which are "just about a minimum"; James River would like to have about 500 stalls. We took that last estimate as a preliminary design criterion.

We got some additional stalls by expanding the lot accessed from above off Willamette Falls Drive. But as we add new office buildings to the development we also add to the requirements for parking. A well-designed parking lot with adequate but not expansive stalls and minimal landscaping could accommodate no more than 3 cars per 1000 s.f. (tighter designs are possible but may violate local codes and would probably not be acceptable for this type of project). Eventually the buildable surface area is simply used up: the only way to accommodate more parking is with a structure that effectively creates more land.

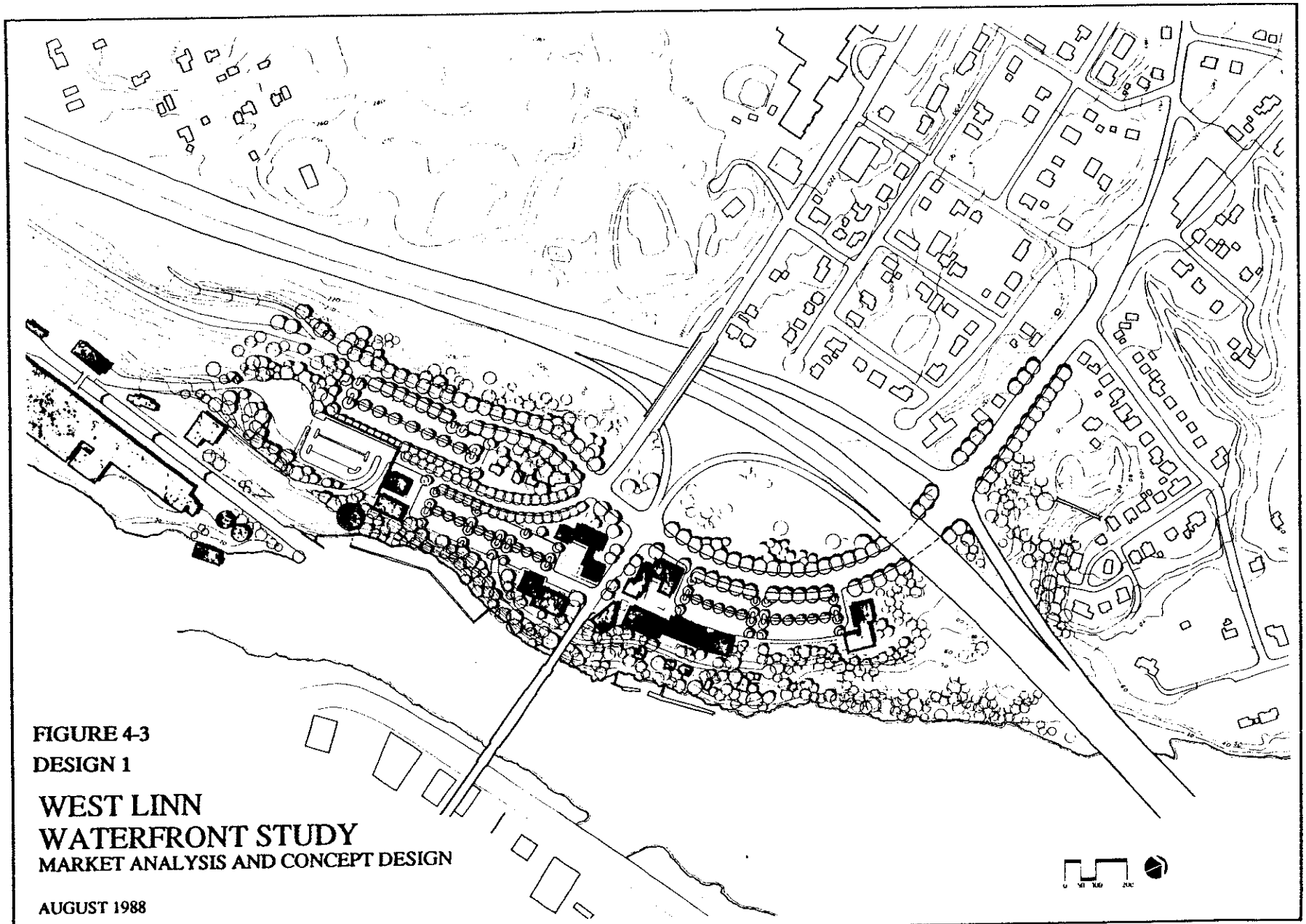


FIGURE 4-3
DESIGN 1

WEST LINN WATERFRONT STUDY

MARKET ANALYSIS AND CONCEPT DESIGN

AUGUST 1988

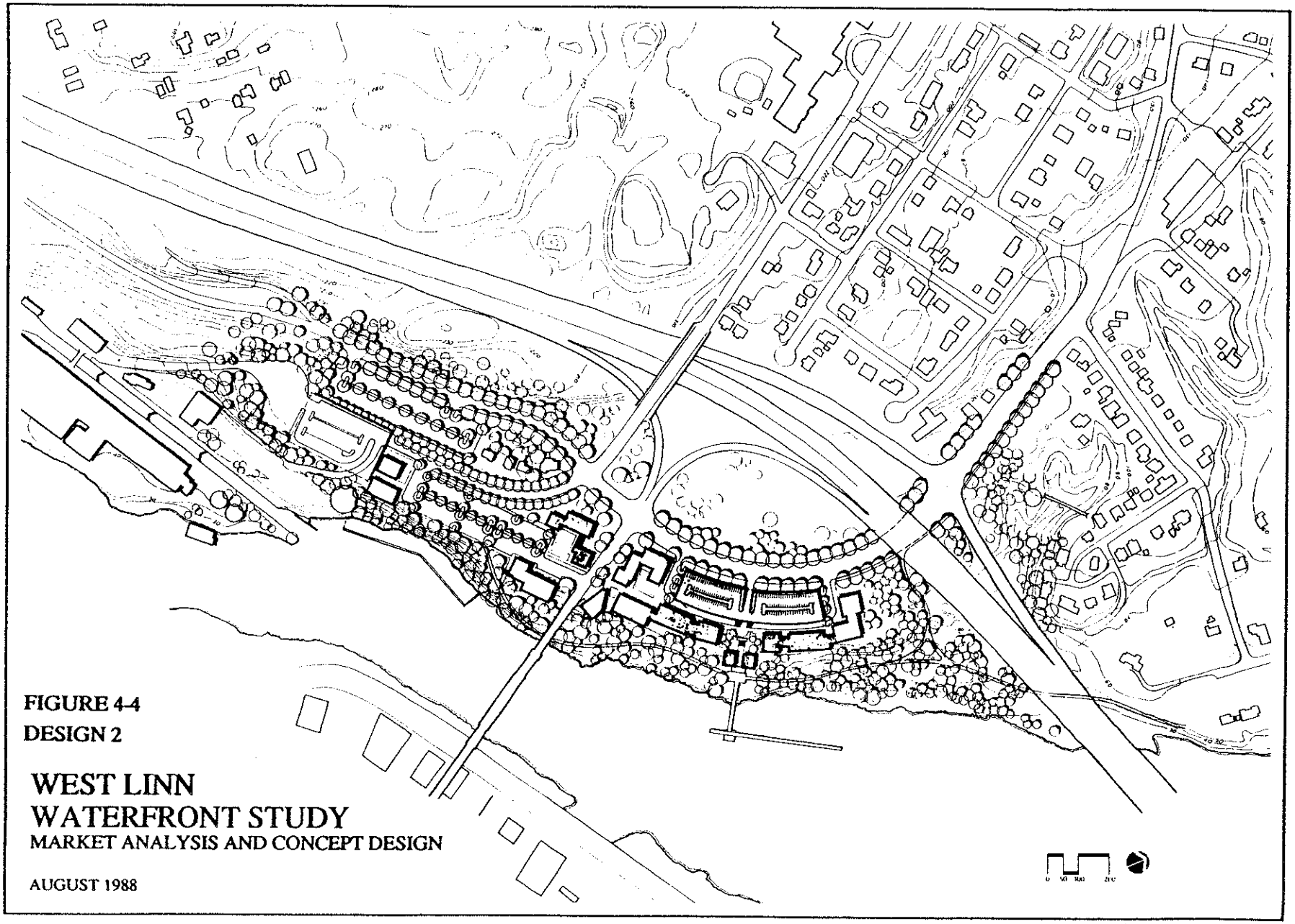


FIGURE 4-4
DESIGN 2

WEST LINN
WATERFRONT STUDY
MARKET ANALYSIS AND CONCEPT DESIGN

AUGUST 1988

In the figures we show this structure on James River's property. In fact, it could go in any of several places. The exact design and location does not affect the financial analysis in the next chapter. But the fact that a structure that must accommodate another 50-100 cars must go somewhere does affect the analysis. Getting space for another 100 cars on the second deck of a parking structure adds roughly $1.5 million in costs to the project (based on $20-$25 per s.f. for a parking structure and a need for two levels of 100 stalls each).

Similar though less severe problems occur to the northeast of Highway 43. Figure 4-3 shows a design that balances built space on the north with the parking it requires. Figure 4-4 shows that the only way to intensify the use is to build a parking deck.

The parking problems on the land south of Highway 43 caused us to reevaluate the design to see if we could find a solution that did not require a parking structure. Given the requirements of James River for parking and the fixed amount of buildable land at the site, we could make things fit only by reducing the amount of new office development that would require parking.

Table 4-1 shows the amount of land at the waterfront site by area (it also shows assessed values, which we use to estimate acquisition costs in Chapter 5). Table 4-2 shows some rough calculations of the amount of parking that could be accommodated on the waterfront site without building a second deck of parking. To provide James River with approximately 450 spaces and still provide adequate parking for all the other development on the south of Highway 43, that development cannot exceed about 40-45,000 s.f.

We calculated that number by making an assumption about how much of the remaining land would go to parking. We assumed that the land taken by the proposed James River administrative offices and the relocated credit union would revert to parking, yielding an additional 45 stalls: all of those stalls plus 35 of those in the central lot of the city-hall complex would go to James River to bring its total to 450 stalls (more than the 435 they house now). All the rest of the site would be left with 175 stalls. If we assume a need for 4 stalls per 1000 s.f. of office space (a standard assumption), then all the rest of the development can total

TABLE 4-1
SIZE AND ASSESSED VALUE OF PROPERTIES AT THE WATERFRONT SITE

LOT LOCATION	LOT SIZE (SQUARE FEET)	ASSESSED VALUE		
		LAND	IMPROVEMENTS	TOTAL
Along Willamette Falls Drive				
22E31BA01300	14,375	26,080	58,040	84,120
22E31BA01200	10,840	23,600	35,690	59,290
22E31BA01100	14,375	26,080	58,920	85,000
Subtotal	39,590	75,760	152,650	228,410
East and North of Hwy 43				
22E30DC02100	3,300	0	0	0
22E30DC02600	2,720	3,150	0	3,150
22E30DC02700	1,100	550	0	550
22E30DC02500	2,720	640	0	640
City of West Linn	610	0	0	0
22E30DC01900 (part)	2,625 (est.)	5,610 (est)	0	5,610
22E30DC02900	6,050	5,940	0	5,940
Subtotal	19,125	15,890	0	15,890
Vacated Right-of-Way, Hwy 43	213,750 (est.)	209,475 (est.)		
James River				
22E31BA00400 (part)	70,550 (est.)	113,650 (est.)		
22E31BA01800 (part)	85,000 (est.)	58,550 (est.)		
Subtotal	174,685 (est.)	172,200 (est.)		
22E31BA01800 (waterfront)	83,125 (est.)	57,260 (est.)		

Source: West Linn City Center and Waterfront Development Report; and estimates by ECO Northwest based on maps and average assessed values per square foot for surrounding properties.

TABLE 4-2
AREA AVAILABLE FOR PARKING
ASSUMING NO PARKING STRUCTURE

Location	Square Feet	Stalls @ 3 per 1000 sq ft
SOUTH		
James River		
As Designed in Figures 4-3 & 4-4		
Upper Lot w/Expansion	65,600	195
Lower Lot w/o Second Deck	33,750	100
Lot at Locks (existing 70 stalls)	25,000	75
Subtotal	124,350	370
Potential		
Site of New Admin & Credit Union	15,000	45
Subtotal James River	139,350	415
City Hall Complex		
As Designed in Figures 4-3 & 4-4		
Central Lot	60,000	180
Other Area Near City Hall Addition	10,000	30
Subtotal	70,000	210
Potential		
Site of City Hall addition	22,250	65
Site of New Office Building	21,875	65
NORTH		
New Retail Center	52,500	155

Source: Estimated by ECO Northwest

43,750 s.f. The existing city hall and the proposed expansion will take about 18,000 s.f., leaving about 25,000 s.f. for other new office development that could take the form of some combination of new administrative offices for James River, the credit union, additional government functions, or general office development of the type we described in section 4.3.

Figure 4-5 shows one of several concepts that could meet the criteria we just listed. It shows the additional office space located across from city hall, though some of that office space could also be shifted to the south end of the city-hall parking lot if James River decides to locate in a separate building abutting its property.

Because this last design avoids the killing cost of a parking structure, we use it as our basecase for the financial analysis in the next chapter.

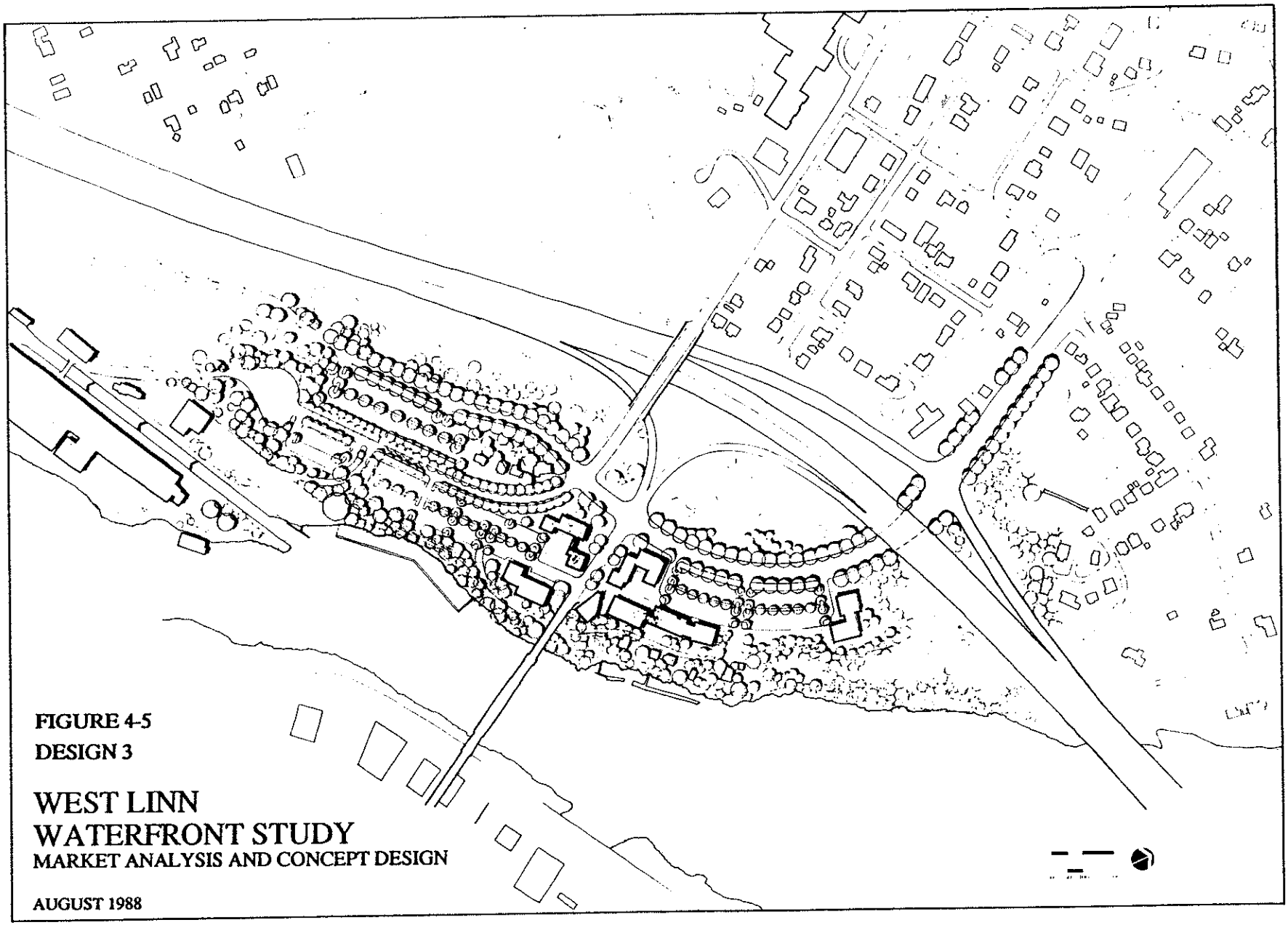


FIGURE 4-5
DESIGN 3

WEST LINN WATERFRONT STUDY

MARKET ANALYSIS AND CONCEPT DESIGN

AUGUST 1988

CHAPTER 5
FINANCIAL EVALUATION OF THE CONCEPT DESIGN

In this chapter we present and discuss the results of our pro-forma evaluation. We begin with the concept design (Figure 4-3 without a parking structure for James River) and a number of assumptions about development and operating conditions. We then change some of these assumptions, one at a time and in combinations, and present the impact of those changes on the developer's after-tax return on equity in a sensitivity analysis. This aids in the identification of those aspects of the project most crucial to its financial feasibility and the evaluation of the effectiveness of some potential actions the City could take to make the project more attractive to developers.

Figure 5-1 shows the details of our financial evaluation of the base case scenario; it begins on page 5-2 and continues for three pages. Appendix E describes in detail how the spreadsheet we used to produce the evaluation works. The base case embodies the following assumptions:

1. Construction will take place over 24 months and will be 80 percent financed by a construction line of credit carrying an 11 percent interest rate (compounded monthly. and a 1.5 percent origination fee. The developer will draw the same amount every month.

2. When construction is complete, a mortgage loan will be obtained for 75 percent of total development costs and the construction line of credit will be paid off (including accumulated interest.. The mortgage will be amortized over 30 years and will carry a 10.5 percent interest rate and a 1.25 percent origination fee.

3. Land and existing structures will be purchased for assessed value. All the normal system development and hookup charges will be paid.

4. Rents will be $13 per square foot of office space (full service. and $11 per square foot of retail or restaurant/tavern space (triple net.. Beginning in the third year of operation, loss of potential rental income due to vacancy will average five percent of potential income.

5. Both rental income and operating expenses will increase at a rate of four percent per year.

6. The developer will have sufficient taxable income from other sources that negative taxable income from this project will result in tax savings for the developer.

In the base case we conducted our analysis from the point of view of a private developer. Some of the analysis would change if the city were to be involved, either as the developer or as part of a public/private partnership. Table 5-1 shows how some of the costs might change if the city took actions to reduce them.

FIGURE 5-1
PRO FORMA FINANCIAL ANALYSIS OF SELECTED CONCEPT DESIGN

```
FINANCING ASSUMPTIONS:

  CONSTRUCTION LINE OF CREDIT:
    Duration                    24  months
    Interest rate            11.00%
    Origination fee           1.50%
    Loan/cost ratio             .80

  MORTGAGE LOAN:
    Amortization period         30  years
    Interest rate            10.50%
    Origination fee           1.25%
    Loan/cost ratio             .75
```

DEVELOPMENT SECTION

ACQUISITION COSTS:					
Land					225,365
Other					360,710
TOTAL ACQUISITION COSTS					586,075
Per square foot of GBA	7.71				
DIRECT CONSTRUCTION COSTS:					
Clearing, demolition, and earthwork					115,600
Parking, lighting, and landscaping					450,800
Utilities					13,800
Utility relocation					74,500
Buildings:	Gross building area		Construction cost		
Gov. Office	11,000	sq.ft. @	58.19/sq.ft. =		640,090
Office	25,000	sq.ft. @	62.19/sq.ft. =		1,554,750
Retail 1	15,000	sq.ft. @	36.23/sq.ft. =		543,450
Rest./Tav.	15,000	sq.ft. @	40.32/sq.ft. =		604,800
Retail 2	10,000	sq.ft. @	36.23/sq.ft. =		362,300
System development and hookup					63,700
Contingency fund @	10.0%				442,379
Gross building area (GBA)	76,000	square feet			
TOTAL DIRECT CONSTRUCTION COSTS					4,866,169
Per square foot of GBA	64.03				
INDIRECT CONSTRUCTION COSTS:					
Architect/engineer @	6.5% of building costs				240,850
Legal/accounting @	.5% of direct costs				22,119
Marketing/leasing	5.0% of 1st-year GEI				38,590
Construction line of credit				4,196,195	
Interest on construction l.o.c.					473,570
Construction l.o.c. origination fee					62,943
TOTAL INDIRECT CONSTRUCTION COSTS					838,072
Per square foot of GBA	11.03				
TOTAL DEVELOPMENT COSTS					6,290,316
Per square foot of GBA	82.77				

OPERATIONS SECTION
(Year 1 dollars)

ANNUAL RENTAL INCOME:

	Type	Gross leasable area		Rent		
Gov. Offic	FS	11,000	sq.ft. @	13.00/sq.ft. =		143,000
Office	FS	25,000	sq.ft. @	13.00/sq.ft. =		325,000
Retail 1	TN	15,000	sq.ft. @	11.00/sq.ft. =		165,000
Rest./Tav.	TN	15,000	sq.ft. @	11.00/sq.ft. =		165,000
Retail 2	TN	10,000	sq.ft. @	11.00/sq.ft. =		110,000
GROSS POTENTIAL INCOME						908,000
Per square foot					11.95	
Adjustment for vacancy:			5.0% of GPI			
GROSS EFFECTIVE INCOME						862,600
Per square foot					11.35	

Full service (FS)	36,000	square feet
Triple net (TN)	40,000	square feet

ANNUAL OPERATING EXPENSES:

Building utilities	36,000	sq.ft. @	.40/sq.ft. =	14,400
Housekeeping	36,000	sq.ft. @	.70/sq.ft. =	25,200
Property taxes	36,000	sq.ft. @	2.30/sq.ft. =	82,800
Insurance	36,000	sq.ft. @	.20/sq.ft. =	7,200
Outdoor utilities	76,000	sq.ft. @	.80/sq.ft. =	60,800
Maintenance	76,000	sq.ft. @	.30/sq.ft. =	22,800
Management	76,000	sq.ft. @	.40/sq.ft. =	30,400
Leasing	51,000	sq.ft. @	.25/sq.ft. =	12,750
Other	76,000	sq.ft. @	.00/sq.ft. =	0
TOTAL OPERATING EXPENSES				256,350

FINANCING COSTS:

Mortgage loan principal	4,776,709	
Annual debt service (principal and interest)		527,962

BEFORE-TAX PRO-FORMA EVALUATION
First year of stable operation
(Year 3 dollars)

GROSS POTENTIAL INCOME (GPI)		982,093	
Per square foot of GBA	12.92		
Expected vacancy rate	5.0%		
GROSS EFFECTIVE INCOME (GEI)			932,988
Per square foot of GBA	11.35		
Operating expenses			277,268
NET OPERATING INCOME (NOI)			655,720
Per square foot of GBA	8.63		
Debt service			527,962
NET SPENDABLE INCOME (NSI)			127,758
Per square foot of GBA	1.68		

Total development costs	6,290,316
Mortgage loan amount	4,776,709
Equity amount at end of year	1,601,441

EVALUATION RATIOS:

	Calculated	Standard	
Return on Investment (ROI)	10.4%	9.5%	Pass
Return on Equity (ROE)	8.0%	7.5%	Pass
Debt Coverage Ratio (DCR)	1.24	1.20	Pass
Default Ratio	.86	.80	Fail

Return on investment = (NOI)/(total development costs)

Return on equity = (NSI)/(equity amount)

Debt coverage ratio = (NOI)/(debt service)

Default ratio = (operating expenses + debt service)/(GEI)

AFTER-TAX PRO-FORMA EVALUATION

ASSUMPTIONS:

Depreciation life	31.50 years
Federal tax rate	34.0%
State tax rate	9.0%
Inflation	4.0% per year

% leased	85.0%	90.0%	95.0%	95.0%	95.0%	95.0%
	YEAR 1	YEAR 2	YEAR 3	YEAR 4	YEAR 5	YEAR 6
Cash inflow	771,800	849,888	932,988	970,308	1,009,120	1,049,485
Oper. exp.	256,350	266,604	277,268	288,359	299,893	311,889
Interest	561,263	498,782	495,718	492,332	488,591	484,457
* Fed.tax	(46,361)	(32,839)	(7,169)	2,900	13,447	24,498
* State tax	(8,100)	(5,737)	(1,252)	507	2,349	4,280
Principal	26,408	29,181	32,245	35,630	39,372	43,506
Cash outflow	789,560	755,990	796,809	819,728	843,651	868,629
Net cash	(17,760)	93,898	136,179	150,580	165,469	180,856
Loan balance	4,750,301	4,721,120	4,688,875	4,653,245	4,613,873	4,570,367
Equity	1,540,015	1,569,196	1,601,441	1,637,071	1,676,443	1,719,949
Pre-tax:						
GEI	771,800	849,888	932,988	970,308	1,009,120	1,049,485
NOI	515,450	583,284	655,720	681,949	709,227	737,596
NSI	(72,221)	55,322	127,758	153,986	181,264	209,633
ROI	8.2%	9.3%	10.4%	10.8%	11.3%	11.7%
ROE	-4.7%	3.5%	8.0%	9.4%	10.8%	12.2%
DCR	.88	1.10	1.24	1.29	1.34	1.40
DR	1.09	.93	.86	.84	.82	.80
Post-tax:						
GEI	771,800	849,888	932,988	970,308	1,009,120	1,049,485
NOI	569,911	621,860	664,141	678,542	693,431	708,818
NSI	(17,760)	93,898	136,179	150,580	165,469	180,856
ROI	9.1%	9.9%	10.6%	10.8%	11.0%	11.3%
ROE	-1.2%	6.0%	8.5%	9.2%	9.9%	10.5%
DCR	.97	1.18	1.26	1.29	1.31	1.34
DR	1.02	.89	.85	.84	.84	.83

* Tax expense (savings)

Even with what we consider rather favorable assumptions, the development barely pencils out in its third year of operation. We tested the sensitivity of our analysis to reasonable changes in assumptions. Table 5-1 summarizes the results by showing the effect of each change or combination of changes on the developer's after-tax return on equity and the percent change from our base case.

TABLE 5-1
SENSITIVITY TO CHANGES IN ASSUMPTIONS

	Assumptions	After-tax Return on Equity	% Change from Base Case
(0)	Base case	8.5%	0.0%
Changes that decrease the return			
(1)	Land @ 125% of assessed value	8.0%	-5.9%
(2)	Rent $1 lower	5.6%	-34.1%
(3)	Operating costs 10% higher	7.5%	-11.8%
(4)	(1), (2), and (3) above	4.3%	-49.4%
Changes that increase the return			
(5)	ODOT land free	9.5%	+11.8%
(6)	Rent $1 higher	11.4%	+34.1%
(7)	Operating costs 10% lower	9.4%	+10.6%
(8)	(5), (6), and (7) above	13.9%	+63.5%
Ways that the City might increase the return			
(9)	Finance @ 9%	10.8%	+27.1%
(10)	Write down land, system development, and hookup fees	11.1%	+30.6%
(11)	Write down land, system development, hookup, site prep, and parking	16.4%	+92.9%

Source: ECO Northwest

The first three changes in assumptions reflect slightly less optimistic views of development and operating conditions. Land often sells for more than its assessed value, particularly when residential land is purchased for commercial use. The rents we assumed in the base case are higher than those that prevail in the West Linn area. Operating costs often turn out to be higher than anticipated. The fourth line in Table 5-1 reflects the combined effect of all three of these changes. It shows an after-tax return of only 4.3 percent, an unacceptable return by any standard. Most of the impact stems from the assumption of lower (by $1) rents which by itself lowers ROE from 8.5 to 5.6 percent.

Lines 5, 6, and 7 reflect changes in the opposite direction and line 8 represents a combination of the previous three. Again, changes in expected rent dominate. If land now owned by the Oregon Department of Transportation could be obtained for free, that could more than offset the effects of having to pay higher-than-appraised value for the remaining land. Doug Leuth, property manager for ODOT), said that how ODOT would handle this particular right-of-way would require more research. If ODOT actually bought the right-of-way, then it would probably sell it at fair market value. If, however, the right-of-way was transferred to the state from the county, perhaps as long ago as the 1920s (a good possibility), then the right-of-way may go back to the county: West Linn would have to work out some arrangement with Clackamas County for the land. In summary, though we cannot say for sure what would happen with the abandoned right-of-way, it is not inconceivable that the city could acquire it at below market value.

Lines 9-11 show what the city might be able to do to reduce the costs of development to a private developer (see Appendix G for a discussion of the types financing arrangements typically available to Oregon municipalities for a project like this one). Line 9 shows the effect of obtaining more favorable financing terms. Lines 10 and 11 show the effect on the developer's return of actions the City could take to indirectly subsidize the project. Such actions could have a substantial impact on the feasibility of the project, although many would amount to enrichment of private developers at the taxpayers' expense.

The most important result of our sensitivity analysis is its identification of expected rent as the key to the project's feasibility. The City should determine exactly how much it is willing to pay in rent and discussions with prospective tenants should occur before a decision is made to commence development.

CHAPTER 6
CONCLUSIONS AND RECOMMENDATIONS

We organize our conclusions and recommendations to correspond to the three principal zones that we examined as part of our study: the waterfront site southeast of I-205, the vacant parcel across from the waterfront site northwest of I-205, and vacant land around the 10th Street/I-205 interchange.

6.1 WATERFRONT SITE

Our conclusions derive directly from the analysis we presented in Chapters 4 and 5. In short, despite its very attractive locational characteristics, the site has many constraints that make its development problematic:

1. Steep slopes, rock, and limited land carved into small pieces by highways and historic buildings

2. Several actors and actions that must work together (the City, ODOT, James River, a developer)

Together, these problems make the timing and design of any future development uncertain, and its costs high compared to sites typically used for redevelopment in cities of West Linn's size.

But as our financial analysis showed, under favorable assumptions the project can be made to pencil-out. In our judgment the tough policy choice for the City at this point is whether to continue devoting its resources to trying to make the project happen and, if so, at what level. The basic choices are:

Option 1: Table discussion and study of the site, at least for a few years. Full development of the site, as we have designed it, depends on ODOT's decision to realign Highway 43. That may not happen for several years. By choosing this option the City saves the costs of labor (staff, consultants, attorneys) until conditions for development look more favorable.

Option 2: Continue discussions with ODOT and James River to proceed toward agreement on redevelopment. The city can further choose the amount of resources it wishes to devote to this option. **Option 2A** is for the City to direct its staff to **push for the comprehensive redevelopment:** to continue with the steps necessary to establish an urban renewal district, to press ODOT to commit to undertaking the realignment soon, to work out a design with James River, to find a developer. **Option 2B** is for the City to **pursue pieces of the project independently.** For example, it might limit its scope to an expansion of city hall. The problem with this limited scope is that it would not achieve its initial purpose of funding (at least partially) some of its expansion with returns from other parts of a larger project. If it limited itself to just the land southwest of the Highway 43 bridgehead, it might still be able to proceed without any work from ODOT, but it would require negotiations with James River and a less-than-optimal solution to access problems. In that case, unless James River changes its parking requirements, the best the City could hope for would be a small project: about 10,000 s.f. of new government offices and 25,000 s.f. of new office space.

The City's decision should be influenced by its evaluation of **the need for additional and consolidated office space.** If it is content with its existing space for the next five years, it can afford to wait. If, however, it wants to consolidate its services soon, then it must make a decision about where to do that. If it decides not to go to the waterfront site, then the possibility of a future development at the waterfront are further diminished.

The decision should also be influenced by the City's consideration of the likely **cost to the City of the development if it were to occur.** Chapter 5 illustrates many of the indirect ways that the City might have to subsidize the development to make

it pencil-out: land write-down, waiver of system and hook-up charges, high rents for the space it leases for government functions, and tax-increment financing. If City decision makers believe now that such subsidies will be unacceptable to the taxpayers of West Linn, now or in the future, then the project looks highly unlikely.

The City's decision about whether to establish an urban renewal district is clearly tied to its decision about whether to pursue further the potential redevelopment of the waterfront site. Under Option 1 the City would not bother with the expense of establishing an urban renewal district: it would allow such development as gets proposed provided it met typical City zoning and development requirements. An urban renewal district would be unnecessary because the City would have chosen not to be active in the waterfront development: it would let the market direct development. Under Option 2A, if the City commits to redeveloping the site, then it should probably establish the urban renewal district, which will allow it to freeze the tax base and begin capturing any tax increment that might occur.

But if the City is not ready for the commitment (for example, because of the uncertainty about the future actions of ODOT or James River, or about the extent to which it will have to subsidize the project) then establishing the urban renewal district costs money that could have been saved (for example, on studies and legal fees) and creates exaggerated expectations about how soon development will occur. One way for the City to deal with this uncertainty is to make studies necessary for the establishment of an urban renewal district contingent on the reduction of some of those uncertainties: for example, on commitments from ODOT, James River, or other property owners or developers. The City could set aside money for those studies (Michael Butts estimates the amount necessary to be about $50,000) which it would undertake when, for example, it looked like some type of development was about to occur in the waterfront area.

Even if it decides to forgo comprehensive commercial development, we think the City should consider developing as open space the waterfront. By making minor adjustments to James River's existing parking, the City may be able to acquire land along the edge of the escarpment (between the Mill and Territorial Street rights-of-way) to create public open space around city hall that will give residents a sense of

place and access to the riverfront and locks. All the designs we proposed show how the waterfront might be developed for public access.

In our judgment, of the options we have described, the most cost-effective is Option 2A, in which City staff would:

1. Continue discussions with James River and ODOT

2. Press ODOT for the realignment of Highway 43 (which the City probably wants even if it chooses not to redevelop the waterfront site)

3. Take preliminary steps toward the establishment of an urban renewal district (set aside funding, ask counsel for legal opinions) but postpone the full studies for the establishment of such a district until development looks more likely

4. Stay abreast of any land sales or construction in the area

5. Make sure that local realtors and developers know that the City is open to development ideas for the area

6. Develop a schedule for bringing back additional information to City decision makers.

We do not see a need for additional studies at this time; rather, the City makes a commitment of perhaps 10% of a planner's time over the next year to answer some pending questions and to make sure that the City's options for development of the site are not prematurely foreclosed.

6.2 PARCEL AT WEST A STREET, NORTH OF I-205

This parcel is almost eight acres. It is vacant except for one single-family dwelling. It is bounded by I-205, West A Street, West Linn High School, and the

Camassia Natural Area. It is zoned as Office/Business Center. We were asked by Michael Butts whether this zoning was appropriate in general, and in particular whether the site might be suitable for a hotel or motel.

The site has obvious advantages for development. Physically, the site is good sized and attractive (though the rock outcroppings will add somewhat to development costs), has good views, and proximate utilities. Locationally, it is visible from I-205, next to a major interchange, and abuts a designated natural area. Administratively, it is properly planned and zoned, and is under a single ownership with an owner interested in seeing the site developed. In our opinion, the site has all the characteristics necessary to make it suitable for the uses for which it is zoned.

That brief analysis is of the supply side of the market. But an analysis of supply is not sufficient to make a prediction about when the parcel will develop and for what use. For example, even with all these characteristics, if there are other sites in the vicinity with similar characteristics or lower prices, the parcel may not be selected for development. Moreover, even at competitive prices the parcel may take a while to develop if demand for the uses the owner wishes to accommodate is low.

We discussed in Chapter 3 the market for office/business center development. In the short run, the market is soft. It is possible, of course, but unlikely that a major employer can be found to establish a corporate headquarters at the site in the next few years. A complex of smaller offices is possible for exactly the same reasons that we believe such offices could work at the waterfront site.

Though we did not conduct an analysis of the demand for new hotel rooms, we can make some comments that put the potential of the parcel into perspective. First, as we described them above, the parcel's characteristics make it a good site for a hotel. Second, projecting demand for hotel rooms requires data not available from standard sources: one must interview hotels in a market area and trust their reporting of vacancy rates. We did not do that, but in a study of the Milwaukie riverfront, Hobson and Associates did. They were optimistic about the potential for a 75-100 room hotel with 3-5 meeting rooms. Third, while such general projections may be useful in getting leasing agents and hotel owners interested in developing a

hotel at the site, being interested is not the same as being built. All a market analysis can do is comment on whether the development is more or less likely: having an operator signed up is farther down the line.

Our predilection in questions of land-use policy is to have government provide good services, eliminate nuisances, and encourage agglomerative economies, and then let the market drive development. In the case of this parcel, we believe West Linn has accomplished those ends. Either a hotel or office use at the property would be compatible with and would enhance any of the designs we have proposed for the waterfront site; neither poses the threat of unmitigatable nuisance to surrounding property.

Thus, we recommend that the City let the market take its course. If land for hotels is in demand, this property should compete well. If not, the owner must either hold it vacant until demand arrives, sell it at a discount to someone who will, or develop it for a different use. Though a hotel is a good, and perhaps best, use of the property in terms of the boost it may give to the redevelopment of the waterfront site, it is not the only good use. Certainly office development is compatible with the plan we proposed, and so is multi-family housing (which would add consumers to the area but would not create the high visibility image for the area that a hotel or business headquarters would). Because of the physical characteristics of the site, we think any of these high-density uses would be more likely to pencil-out than dispersed ones.

We do not see a need for the City to make any zone changes for the property. City policy should be to encourage its development by supporting any efforts by the private sector to find a client for the property. As we discussed in section 6.1, the City should be prepared to establish an urban renewal district if it sees that this parcel is about to develop and wants to capture the tax increment for development of the waterfront area.

6.3 10TH STREET/I-205 AREA

The vacant land in this area extends from I-205 (with roughly 10-15 acres of relatively flat land around the 10th Street interchange) north, up the hill toward Barrington Heights. The flat land is suitable for all the types of uses one typically finds at a freeway interchange: service stations, auto-related commercial, fast-food, and lodging. The absence of these types of uses probably results from a combination of market forces (lack of demand) and public policy (the zoning for all this area is Office/Business Center).

If we were to make a recommendation for land uses in this area based strictly on our market analysis we would recommend zoning that would allow more commercial use because:

1. West Linn has only two freeway interchanges. The lack of space at the Highway-43 interchange makes the typical uses found at freeway interchanges difficult. If West Linn wants those types of uses in the city, the 10th Street interchange is the place to do it.

2. The market for office space is soft, and the land on the hillside will be expensive to develop.

3. A General Commercial zoning designation would allow more and different types of development and would cause the land to develop faster. It would still allow the uses allowed under the Office/Business Center designation if the market was for such uses.

4. This area, and the unincorporated area north of it at the top of the hill, is one of the future residential growth areas in West Linn. Traffic at the interchange, and the value of the land for commercial uses, will increase.

Note that we underlined that our recommendation was based on market conditions only. The City may have other public purposes it is trying to achieve with its zoning. For example, it may wish to avoid the kind of congestion and

disamenity that often accompanies auto-related development at interchanges so that the area will remain attractive for residential and office uses. If that is the case, the City may be trading-off current development of one type for the possibility of future development of a different type. In our opinion, assuming the City enforces the design and performance standards, the City may be able to have both.

One of the developers we interviewed mentioned that the vacant land in the northwest quadrant of the interchange, between I-205 and Blankenship, could be developed as a motel. We agree that the site has the supply-side characteristics to support such a use: access, visibility, and sufficient buildable land. As we noted in the previous section, however, the question of market demand remains open. Moreover, given the uncertainty about the market for a single hotel, the market for two (considering the desire for a hotel at the West A Street parcel) is even less likely.

As part of our market analysis we noted that the supply of zoned multi-family land in West Linn is diminishing rapidly. The only substantial parcels of high-density land are on the hill above 10th Street. If what appears to us as a temporary surge in multi-family building in West Linn continues, then the City should consider expanding its multi-family land. An obvious choice for upper-end multi-family housing is the land on the south-facing slope above 10th Street that is now zoned Office/Business Center.

The policy decision for the City about the 10th Street area turns on its consideration of short-run versus long-run development. In the short run the City can probably get commercial development on the flat land at the interchange. In the short- to intermediate-run (within five years) it could probably get additional housing (either single- or multi-family) to creep down the slope from the heights. In the intermediate- to long-run, it could probably get offices in the land near the interchange and on the lower slopes (perhaps even faster if it wants to use any of the subsidies we discussed for the waterfront site). An important policy question is whether any commercial or residential development in the short run will preclude the possibility of office development later.

The City can legitimately answer these questions about zoning any number of ways. Since we have been asked, however, to give our opinion about an optimal

solution, we will. We would change the zoning around the interchange to General Commercial to encourage more rapid development. All development should be subject to design review to make sure that any disamenities are mitigated; offices could still go there if the market for them develops. Land north of Blankenship on the lower slope could stay as Office/Business Center. If the demand for housing stays strong, the City should consider requests for zone changes on the upper slopes to allow some additional housing development, making clear to developers and buyers its intentions to allow future office development on the lower slopes.

Whether the 10th Street area can be included as part of an urban renewal district requires answers to at last two questions:

1. Are noncontiguous zones permitted, especially when cross-subsidies are likely? Our tentative answer is Yes, the law appears to permit noncontiguous areas. ORS 457.085(b) states that an urban renewal plan applies to the urban renewal areas of the plan. Whether the potential cross-subsidies are politically feasible is a different question that the City's decision makers will have to answer.

2. Does the 10th Street area meet the criteria for the establishment of an urban renewal district. Our tentative answer is Yes, the area can probably be shown to meet the legal criteria for "blight" despite the fact that it does not appear to meet any commonsense definition of blight (ORS 457.010(1)).

Whether the 10th Street area should be included is a question of both efficiency and equity. The efficiency aspect concerns market conditions: e.g., Will the establishment of an urban renewal district cause the 10th Street area or the waterfront to develop faster? For the 10th Street area, possibly yes, though in our opinion rezoning and standard City policies for the provision of services are probably adequate. For the waterfront area, probably yes, since the 10th Street area will probably develop more quickly than the waterfront area and would provide tax revenues needed to get improvements to the waterfront area. But the equity questions can only be answered by City decision makers, depending on how they feel about the fairness of such an arrangement: e.g., Should the increase in assessed value used to lower property taxes or improve all urban services, or should it be earmarked specifically for the waterfront?

APPENDIX A
DETAILED DISCUSSION OF THE METHODS OF RETAIL MARKET ANALYSIS AND THEIR LIMITATIONS

A.1 THE METHODS OF A STANDARD MARKET ANALYSIS

A.1.1 INTRODUCTION

A **market analysis** is designed to answer the question, "If I enter this market, can I sell enough to be successful?"[1] It does this by examining factors of supply and demand to make an estimate of future sales. For retail development these sales projections are usually broken down by type of retail and often converted to square footages; for residential development, projections are for housing units by type and price.

A **feasibility analysis** is more detailed than a market analysis. It applies the results of a market analysis to a specific development to estimate whether that development will be successful. Success means profitability, which means that a feasibility analysis must estimate and compare the costs and revenues of development. The major costs are land acquisition and preparation, construction, operation, and maintenance. Revenues come from either sale or lease of the development, and will be a function at the rate at which units of the development are absorbed (sold or leased) in the market.

Most **retail market analyses** use roughly the same methods: using information about income and sales in a market area, analysts attempt estimate potential new sales and the square footage of new space they will require. This general method

---

[1] A developer typically is not concerned with his impact on the overall market or on specific competitors. He cares whether he can attract enough business to be successful, not whether that business comes from growth in local buying income, from customers who have been leaving the area, or from the sales of existing local retailers.

has two slightly different variations. The first method requires an estimate of a specific development's capture rate; the second method requires an estimate of the aggregate leakage of sales by type from the market area.

For both variations, the steps of the analysis are similar: (1) define the relevant market areas; (2) determine how much consumers living within the market areas spend on various categories of goods and how much is spent on those categories of goods at retail outlets in the market area, and determine how expenditures are likely to change in the future (3) allocate some portion of the expenditure to new development, considering the existing supply and location of retail space, likely new space competing with the proposed development, and other factors; and (4) convert potential sales to absorption rates measured in square feet per year of retail space by type.

In the first step, the market analyst considers existing travel patterns, existing and planned transportation routes, employment and commuting patterns, potential traffic problems, physical and social barriers, and the relative attraction of alternative retail centers to define market areas.

In the second step, the analyst considers population size and characteristics, employment and income, buying habits, tastes, preferences, and lifestyles. Future population and income levels must be forecasted and changes in habits, preferences, and lifestyles predicted. The analyst uses these economic and demographic characteristics and whatever sales data are available to estimate current and potential future sales.

In the third step, the analyst characterizes and evaluates the existing market not only in terms of dollar volume and square footage, but also in terms of location, access, parking, price, selection, amenities, and employee attitude.

In the fourth step, the analyst uses local, regional, or national averages for sales per square foot and typical square footages by type of retail tenant to convert potential sales to square feet of absorbable space.

Both the capture-rate and leakage methods of market analysis follow roughly these four steps. The key differences are in the third step: estimate of potential

sales. The first method, using capture rates, examines the economic and demographic characteristics of the relevant market area and from them estimates the amount spent on various goods and services by residents of the market area. It then estimates the share of those expenditures that a particular development can hope to capture. By combining the two, and adjusting for sales to customers who live outside the primary market area, it estimates the potential sales for the new development. By applying standard ratios for sales per square foot, it then estimates the number of new square feet that can be supported. Some analyses compute total supportable square footage by retail type for a market area, and then subtract an estimate of existing square footage to get new square footage that can be supported.

The second method, using leakage, attempts to compare the total retail purchases households in a market area probably make (based on income) to the actual sales in the market area: if sales are less than income, net leakage is said to have occurred. The implicit assumption of this type of analysis is that a lot of leakage means a lot of potential for new retail development to capture that leakage. The analysis then proceeds as in the first method, converting leakage (an estimate of potential sales) to square feet of supportable space.

The purpose of a standard market analysis is usually to determine the feasibility of a proposed development, although market analyses are often used to convince investors or bankers of the soundness of a business plan or to attract tenants to a development. In any case, what is being estimated (sometimes optimistically) is the potential for sales given a standard (usually implicit) set of assumptions about the development: sound management, effective marketing, reasonable prices, friendly clerks, and so on.

A **market analysis for office or residential** development is very similar in theory to one for retail development. The chief methodological difference is that for these markets less attention is paid to consumer income. For office space, consumer income is ignored since it is not an important variable in a firm's decision to buy or lease space. For residential space, most estimates of absorbable space are driven by forecasts of population and housing starts based on an analysis of past trends and expected changes in demographics.

In the rest of this appendix we discuss the components of a market analysis in more detail.

A.1.2 MARKET AREAS[2]

Market analyses start by defining a market area. The common-sense definition of a market area is correct in concept: it's the area from which a business will draw sales. But a more specific definition that allows quantification gets trickier.

In its definitive book on shopping centers, the Urban Land Institute defines a retail market (or trade) area as:

> that area containing people who are likely to purchase a given class of goods or services from a particular firm or group of firms. The size of a trade area will vary based on the shopping center type and tenant category.[3]

Three parts of this definition need clarification. First, note the phrase "who are likely to purchase": what probability does "likely" imply? It is certainly less than 100 percent (consumer behavior cannot be predicted that accurately) and no less than 50 percent (which would be "unlikely"). Second, note that a market area is usually defined for a class of goods, not a group of buildings: hence, market areas for firms in the same shopping center will vary depending on the goods and services they offer. Even more important for this study, the market area for widely divergent goods (e.g., retail space, office space, and housing) will have very different market areas. Third, the definition is unclear about whether a market area is defined from the perspective of the retailer (the area from which a majority of sales come) or the customer (the area in which a majority of customers shop at a particular facility): for retailers considering locations in central places the former definition will define a smaller primary market area.

---

[2] Our terminology differs slightly from that of the Urban Land Institute, 1984, The Shopping Center Development Handbook, page 4, which we describe in Chapter 2 of this report. We use "market area" where they use "trade area" and "comparison goods" where they use "shopping goods."

[3] Urban Land Institute. 1985. Shopping center development handbook, 2nd. p. 3.

As the definition implies, the boundaries of a market area depend on an analysis of existing travel patterns, existing and planned transportation routes, employment and commuting patterns, potential traffic problems, physical and social barriers, and the relative attraction of alternative retail centers to define market areas.

The theory of market areas is most clearly defined for retail development. The primary market area may be defined as the area in which residents are likely to make their purchases at the firm or group of firms in question. Several factors determine the size and shape of the primary market area. The nature of the good being offered and the distance to alternative suppliers of that good will determine its size. Goods that consumers are familiar with, that they purchased regularly, and that are relatively inexpensive (i.e., convenience goods) will have smaller market areas than goods that consumers are likely to comparison shop for or that are purchased infrequently.

The primary market area's boundary usually lies between the site and its nearest close competitor since few consumers are willing to spend extra time and money traveling to a store just like one that is nearer. For example, a large department store in Albany would be unlikely to draw customers for whom stores in Salem or Eugene would be more convenient, unless it offers other clear advantages to customers (more selection, better prices, the attraction of its newness).

For shopping centers, the relative size of two centers affects the location of the boundary between market areas with the boundary falling closer to the smaller center. Over the years, analysts have developed formulas to account for these factors.

One main exception to the above rule occurs when sellers of comparison goods locate very near to each other. They then share a market area larger than what either could command on its own. Customers who want to compare products or prices before they buy would rather make one long trip to a location with several stores than several short trips to locations with only one. For this reason auto dealers often try to locate near other auto dealers.

Transportation routes, physical barriers, and social barriers also shape the primary market area. Analysts sometimes use surveys to refine market area definitions, but experience and knowledge of local geography and competition usually suffice.

Secondary market areas also supply customers to the site in question, but residents of secondary market areas are less likely to shop at that site than elsewhere. Some analysts consider the secondary market area to be the whole world except for the primary market area, others will define it more narrowly. In either case the concept is the same: the analyst expects the development to capture a lower percentage of the disposable income at greater distances from the development.

For office and residential space market areas are typically larger because people are accustomed to and expect to travel 15-60 minutes to get to work. For example, many state employees with jobs in Salem live in Portland and Eugene.

In Chapter 3 we incorporate the ideas in this section into our definition of market areas for West Linn for retail, office, and residential space.

A.1.3 EXPENDITURES BY RESIDENTS AND SALES IN THE MARKET AREA

For a retail market analysis, once a market area has been defined, an analyst makes estimates of consumer expenditures by household, by income group, or by type of good by combining the results of the Bureau of Labor Statistics' Consumer Expenditure Survey with information from the U.S. Census. Estimates calculated in this manner are available from an on-line computer data services like that offered by the Metropolitan Service District or by the National Planning Data Corporation. One can define a market area (by metropolitan statistical area, by county, by census tract, or by defining a polygon with latitudes and longitudes) and obtain a report detailing estimated consumer expenditure patterns from these services.

Forecasts of consumer expenditures for future years need to be produced to predict the viability of a development over time. Market analysts produce these

estimates with varying degrees of rigor: some use sound techniques to forecast expenditures, some simply extrapolate from current trends, and others make no forecast at all (implicitly assuming that nothing will change). The most important factor in determining future expenditures is future real disposable income. However, further adjustment may be needed to account for changing consumer preferences and lifestyles as well as for changes in consumer expenditure patterns that accompany changes in real per-capita income. As a typical household's real income increases, they will spend less on hamburgers and used cars and more on steaks and luxury cars.

A thorough market analysis will consider a wide range of economic and demographic variables. It will look at national and regional trends as well as local trends because local conditions depend on what happens in the rest of the world.

A market analysis typically compares the estimate of consumer expenditures by type with an estimate of sales by existing retail establishments. In states with sales taxes, these estimates are available by county and city from state agencies. In Oregon, which has no sales tax, the only standardized source for sales information is published in Sales and Marketing Management, which uses information from the Oregon Department of Revenue about corporate profits to update its proprietary estimates of retail sales by county.

One difficulty facing market analysts arises from the differences in categories between expenditure data and sales data. Expenditure data is grouped by class of good, sales data by class of establishment. Many goods are sold in several types of establishments and some establishments sell many types of goods.

For office and residential development this step is usually skipped, though some information on the percentage of income spent on housing can be useful in an analysis of the residential market.

A.1.4 POTENTIAL SALES ESTIMATED BY CAPTURE RATES

In the capture-rate method for estimating demand for retail space, once the market analyst has estimated how much is being spent by the residents of the

market area he must estimate what portion of those expenditures will be captured by the development in question. Capture rates vary with the details of the proposed development. No standards exist for generic development and no reliable quantitative method exists for estimating capture rates.[4] The analyst must rely in experience and judgment to make assumptions like "a grocery store at this site will capture between eight and ten percent of the expenditures on food in the primary market area."

Since the analyst cannot know exactly how well-managed, competitively-priced, adequately-staffed, and well-marketed a shop will be, he must make assumptions. Analysts for chains of stores have an advantage here because they can assume that their new store will capture a share of the market similar to that captured by their other stores located in comparable markets. Similarly, estimates of capture rates for smaller primary markets (like those for convenience goods) are more likely to be accurate than those for larger ones. For both of these reasons, large grocery chains like Safeway and Albertson's have been able to develop successful, in-house methods for predicting market penetration. When the proposed development has no track record, most analysts prefer to make conservative assumptions. If the report is intended to impress investors, bankers, or potential tenants, less conservative assumptions are sometimes made.

To calculate potential sales from the primary market area, an analyst simply multiplies the estimated capture rate by the estimated consumer expenditures in the market area. An additional step that is important but often ignored by market analysts is analysis of variance.

The product of two estimates, each containing elements of random error, will itself be subject to random errors. Market analysts usually report estimates of potential sales without giving a clue as to their reliability. It makes a great deal of difference to users of the report whether there is a 95 percent chance that the

---

[4] The ULI Shopping Center Development Handbook, after describing a general method for market analysis similar to what we have just described, then gives a detailed description of methods and data sources for each step of the analysis except the estimation of capture rates. To date, we have never seen a description of methods or data sources for estimating capture rates anywhere in the professional literature.

estimate is within 5 percent of the true value (a very reliable estimate) or there is only a 10 percent chance that it is within 5 percent of the true value.

Sales to customers from secondary market areas may be handled several ways. The first and simplest approach is to ignore them, making the estimate deliberately conservative. A second approach involves estimating what portion of total sales will come from the primary market area and multiplying the estimate of potential sales from the primary market area by the inverse of that proportion. For example, if sales from the primary market area are expected to be $1 million and the primary market area is expected to account for 80% of total sales, total sales should be $1.25 million ($1 million/80%). A third approach involves estimating both expenditures and capture rates for each secondary market area.

Each of the above methods of accounting for sales to secondary market areas adds uncertainty to the estimate of potential sales. The first deliberately biases the result; the others add sources for random errors. Again, the analyst should communicate to the reader of his report how reliable he believes his estimates to be.

The capture-rate method is also applied to office and residential markets. Having made a forecast of the amount of development likely to occur in a relevant market area, analysts make an assumption about the percentage of that development that a specific project can capture.

A.1.5 POTENTIAL SALES ESTIMATED BY LEAKAGE

In the leakage method, the analyst uses estimates of leakage instead of capture ratios to estimate the sales potential. Where the first method goes directly to an estimate of sales for a particular development by assuming a capture rate, this second method first looks at the potential of the market area as a whole, and then at the potential of the particular development.

With estimates expenditures by area residents by type of good and sales actually made in the market area, it is tempting to consider the difference between these estimates as the amount of sales that are leaking out of the market area.

Some market analyses use just that difference as their estimate of potential sales. But there is more to consider.

Lack of data make the method tricky. First, sales include purchases by residents of the market area and nonresidents who come to the market area to shop. No standard data sources exist that allow one to determine the percentage of sales attributable to buyers from outside the primary or secondary market areas. Second, even if one is concerned only with the net leakage (i.e., whether the result of leakages of resident spending and injections of nonresident spending are more or less than the spending potential of residents), the assumption that any net leakage is somehow available for capture by the local market area is unsupportable without a more detailed analysis of the reasons for the leakage. For example, if all the leakage occurs for comparison goods because there is a large metropolitan area with a downtown and three large shopping malls within 40 minutes of the local market area, it is not very likely that the local market can capture much (much less, all) of that leakage. Third, an implicit assumption of this method is that the appropriate base for calculations is household income or buying power. But what about businesses in the area that may make significant retail purchases for some categories of retail goods? For a given market area total sales for some types of goods (e.g., office supplies) will exceed the amount of consumer expenditures on those goods, not because consumers are coming form outside the market area, but because businesses are buying retail. There's no way to know.

And that's exactly the point. One might be able to get some very gross estimate of the potential sales that might be captured, but to use such estimates for a mathematical calculation of a specific quantity of absorbable retail space would be going beyond the limits of the data.

A few of the best market analyses recognize some of the problems we have described and attempt to resolve them by producing estimates of (1) how much residents in a local market area spend in total on the retail goods of interest, and (2) how much they should spend in the market area. If what they should spend is greater than what they do spend, the difference is an estimate of sales that the market area could capture by offering more retail space.

In concept, this idea is sound; in practice, it's difficult. Total retail expenditures may be estimated by using the method we described above. But getting what they should spend is much more difficult. We reviewed one study where this number was estimated as a function of population, employment, household income, household size, and the square footage of regional shopping centers in the market area. This simple model, as specified, does not account for several important influences on where people will buy retail goods, most notably the location, size, and quality of competing retail centers outside the primary market area. Any simple estimate of what people should spend in a primary market area that does not account for their other shopping opportunities, travel patterns, and preferences is purely hypothetical. An alternative method for estimating what people should spend in an area is to examine what people spend in comparable areas. This puts the area's leakage in perspective and gives the analyst an idea of the extent to which comparable areas have been able to minimize leakages.

In short, the leakage method may give some indication of the magnitude of sales leaking from a market area, but it cannot move unambiguously from this indication to an estimate of potential sales and absorbable square footage.

The leakage method is not used for estimating the demand for office or residential space.

A.1.6 SQUARE FOOTAGES

Once potential sales have been estimated, the developer or leasing agent can apportion square footages based on potential sales for different types of retail stores by using standard sales/square foot ratios. For retail and office space, the Urban Land Institute's widely-used manual, Dollars and Cents of Shopping Centers, reports average sales/square feet for many different types and sizes of stores located in various sizes of shopping center in different regions of the country. Like all good statistical reports, it provides information about variations from the averages.

Residential space is usually report in units rather than square footages.

A.1.7 STRENGTHS AND WEAKNESSES OF THE STANDARD MARKET ANALYSIS

Market analysis has come a long way in the last twenty years. Given the limitations imposed by lack of reliable data and by the inherently unpredictable nature of consumer behavior, market analysts generally produce estimates that are as reliable as they can be. They cannot tell a retailer or developer if she will be successful--they can only attempt to determine if it is possible for anyone to be successful.

The main weakness of most market analyses is their false image of accuracy. For example, instead of reporting that potential sales for a particular store are probably between $200,000 and $600,000, they say that potential sales are exactly $423,129. Although the analyst may have a good sense of the range within which the true value is likely to fall, the reader is left without a clue. A retailer who wants potential sales of $400,000 to commit to the project and needs $300,000 to break even should be told what the chances are that the estimate of $423,129 is off by more than one-third. Any biases built into the estimate, whether upward (to aid in promotion) or downward (to be conservative) should be described in the report. They rarely are.

A.2 OUR METHOD

During the course of this study we determined, and the city of West Linn concurred, that because of the long-range and indefinite nature of the development we were to evaluate, a detailed market analysis was not appropriate. More important was to illustrate to the city some reasonable options for the development of the waterfront property and to evaluate whether the net costs to the city of these options would be likely to be small or large. Obviously, to do that we need some notion of the market for various types of uses; but detailed analysis to

estimate capture rates and absorbable square footage is beyond the needs of this project.

What we do instead is to describe the components of demand and supply that indicate whether West Linn could be a good location for various types of development in the short run (1-4 years) and in the longer run (5-10 years). Based on this description we then describe what kind of development we think could be successful at the waterfront site, assuming that it can be built at a cost no greater than that of similar space in the southwest suburban area of the Portland metropolitan area. We then (1) develop a conceptual plan for the waterfront parcel that provides that space, (2) calculate the actual costs of that development and estimate the rents it could probably command based on actual rents at similar developments, (3) evaluate the project's performance against several standard financial criteria, and (4) test the sensitivity of our results to the several assumptions we had to make in the financial analysis.

APPENDIX B
NATIONAL AND REGIONAL TRENDS IN COMMERCIAL AND RESIDENTIAL DEVELOPMENT

B.1 OFFICE SPACE

In the 1980s developers built office space rapidly, paying little attention to the demand. In 1982, only a few cities had problems with high office vacancy rates; by the end of 1987, office vacancy rates had climbed to about 20 percent on average in major metropolitan areas across the nation. From a peak of 18 billion dollars in 1985, office space construction dropped 24 percent in 1986, but experts argued the construction should have stopped all together. The trends in office space development are easy to foresee because the current supply should last for some years into the future.

The following sections discuss the office space development trends fostered during the construction boom of the early 1980s and their effects on national and local markets.

B.1.1 NATIONAL TRENDS IN OFFICE SPACE DEVELOPMENT

B.1.1.1 Overbuilding

Office space construction soared between 1983 and 1985, reaching 18 billion dollars in 1985 alone. The major metropolitan areas of the Sunbelt and Far West were first to feel the effects of overbuilding, experiencing office vacancy rates in excess of 15 percent. Despite clearly declining demand, developers pushed ahead

with construction. A report from the Real Estate Research Corporation (1985) explains why:

> A key reason for the construction excesses of the last few years is the fact that many developers are essentially merchant builders. In many of today's joint venture arrangements with investors, developers are guaranteed their fees without having to put up equity. In effect, this is not significantly different from the 100% and 120% financing of the early 1970s. The result is the same: the developer can walk away from a project unscathed--leaving the lender, or in this case the investor, holding the bag.

Table B-1 illustrates the rise in downtown office vacancy rates in between June 1982 and June 1985.

TABLE B-1
DOWNTOWN OFFICE VACANCY RATES, 1982 AND 1985
(IN PERCENTS)

City	June '82	June '85
Portland[a]	9.0	20.0
Denver	2.1	23.6
Houston	2.3	20.2
New York (Downtown)	2.6	10.4
New York (Midtown)	3.5	7.4
San Francisco	3.4	11.8
Boston	3.7	13.7
Los Angeles	3.8	12.8
Dallas	3.9	18.4
Washington, D.C.	3.9	10.4
Miami	5.3	22.7
Chicago	6.4	11.0
Philadelphia	8.3	8.2
St. Louis	9.4	10.9
Atlanta	15.2	15.6

Source: Coldwell Banker as quoted in Emerging Trends in Real Estate. 1986. Page 21.
[a] Portland's figures provided by the Portland Development Commission. Briefing Paper 3. 1986.

The excess office space in these downtowns drove effective rents down. New York, with the strongest office market in the nation, experienced an average rent decline of two dollars per square foot per year between 1984 and 1985. In Houston, where the sagging oil economy increased the severity of the overbuilding crisis, effective rents plunged from 24 dollars per square foot per year in 1981 to 14 dollars in 1985.

In addition to receiving lower rent for their office space, some investors must offer complex concession packages to attract tenants. The packages can include periods of free rent, paying tenant's moving expenses, and allowing large tenants to negotiate the purchase of their existing building.

Although the office overbuilding of today is more significant in terms of square footage than was the overbuilding of 1974-76, the Real Estate Research Corporation (1985) believes three factors will allow the industry to weather this situation more gracefully.

1. The quality of today's overbuilt real estate is <u>much</u> higher. Office projects in downtown and suburban markets are well designed and constructed. By and large, America's new jobs are performed in offices. So once the construction stops, absorption of existing space will occur.

2. New office projects are in the hands of substantial investors who can afford to carry buildings that are leasing slowly. Futhermore, when an institutional owner takes over a developer's interest in a project, the owner acquires a larger basis in the investment. That fact can be used to justify additional funding.

3. The greatest overbuilding this time is in the growth areas of the country. In the late 1970s and early 1980s, development was concentrated in the sunbelt. The older, northern cities weren't discovered as interesting markets until relatively late in the cycle.

Industry analysts are predicting a decline in office construction in 1988 coupled with lower office vacancy rates across the nation; however, the oversupply will continue to suppress effective office rents.

B.1.1.2 Suburban Migration

During the period of rapid construction, several trends emerged that will remain dominant until the current supply of office space is absorbed and new construction can begin. The most pronounced trend was a movement of offices out of the central business districts and into the suburbs. At the beginning of this decade fewer than half of all offices were located in suburbs. By 1985 suburban offices composed 57 percent of all office space; 64 percent of office construction was in suburban locations. An article in Urban Land (September 1986) identified three factors that aided the office migration from the city centers to the suburbs.

First, the service sector has grown to dominate the U.S. economy, with the service and trade industries accounting for almost all the nation's recent job growth. By the beginning of this decade more Americans were trading goods than were manufacturing them. Suburban office locations have traditionally been popular with firms in the growing service sector.

Second, federal financial deregulation and tax legislation made real estate investments even more attractive to lenders.

Third, the final group of baby-boomers has reached working age. For the first time, the workforce is dominated by persons who were born and who have settled in the suburbs. Many of them prefer to work in suburbs as well.

Although the vast supply of inexpensive suburban office space will probably limit development in the central business districts, suburban corridors will not put the downtowns out of business for two reasons (Economic Development Services, 1987):

1. Development of public infrastructure has traditionally moved more slowly than private development. Before a suburban office can function, adequate roads and sewers must be in place. In the wake of this decade's massive suburban office buildup, federal and local funding for infrastructure projects will be tight in the short-term future, hindering further growth.

2. In areas where private development is clearly outpacing the public sector's ability to provide services, local governments are demanding that developers pay "exactions." These "exactions" may include sewer linkage fees, traffic impact fees, or compulsory on-site land improvements.

B.1.1.3 Higher Quality

The quality of America's new office buildings is improving, due in part to the development of the "intelligent" building. The Grubb and Ellis commercial brokerage firm describe the comparative advantages of the intelligent building in its First Quarter 1987 Investor Outlook. They cited flexibility as the key to a successful intelligent building, which requires proper column spacing and higher ceilings to allow for innovation on the part of the tenant. Non-glare lighting, equipment rooms, temperature control systems, high-speed elevators, and increased live-load capacities also differentiate the intelligent building.

In addition to improved design features, the intelligent building may include shared tenant services. These services, which include telecommunication and office automation systems, are in great demand by small firms that could not afford to pay for them independently. The communication services include shared teleconferencing facilities, in-office intercoms systems, off-site paging services, modem pooling, and access to satellite transmission facilities. Though less popular than the communication services, office automation equipment is also shared in some

intelligent buildings. Tenants may share word processors, high-speed copiers, facsimile machines, data bases services, and laser printers.

The current demand for completely intelligent buildings is low; however, Grubb and Ellis predicts the cost savings realized in these buildings due to increases in worker productivity and shared communication systems will attract new tenants.

B.1.1.4 Back-Office Work Moved to Smaller Cities

Although they have leveled off recently, office rents rose sharply over the past 15 years. With office rent now composing about ten percent of total operational costs, businesses are searching for ways to cut this cost. One popular solution has been to move back-office labor, which includes clerical and technical assistance, to offices in smaller cities or suburbs. Citibank, which built a large credit card processing office in Sioux Falls, South Dakota, is a prime example. A recent study (Dowall 1986) identified the primary factors a firm considers when choosing a site for back-office functions:

1. The importance of:
   - o the cost of the space
   - o the cost of operations
   - o the ability to communicate with headquarters
   - o the suitability of the site or building to the users' workspace needs

2. The unimportance of:
   - o image and prestige
   - o requirements for locations close to competitors or to firms providing professional or technical services

In 1986, Urban Land reported that firms could save an average of $1,601 a year per worker by relocating back-office operations to suburban or small city

locations. These savings will augment the previously described migration out of the central business districts.

B.1.2 REGIONAL TRENDS IN OFFICE SPACE DEVELOPMENT

Like other cities in the nation, Portland is experiencing high office vacancy rates as a result of overbuilding. The KOIN Center, the U.S. Bancorp Tower, and the Pacwest Center were all completed in the first half of this decade. Low interest rates, foreign investors, and favorable tax laws fueled the overbuilding.

Between 1980 and 1985, 3.8 million square feet of new Class A office space were constructed in the central business district, about doubling the supply of Class A space in Portland. Class A space usually commands the highest rental rates due to a quality tenant mix and prestigious location. This space was divided among 14 buildings, an average building size of approximately 250,000 square feet--more than five times the average size of the 51 downtown buildings constructed before 1940. Downtown vacancy rates rose from four percent in 1980 to more than 20 percent in 1985. The slow absorption rates that resulted in high office vacancy numbers are outlined in Table B-2.

In addition the rapid downtown construction, 3.2 million square feet of Class A office space were built in Portland's suburbs between 1980 and 1985. Suburban office vacancy rates rose to 21 percent in 1985, with Class A office vacancies reaching 31 percent. Suburban offices, which are generally two-story "garden" projects, now compose 44 percent of the Portland metropolitan area's total office space. Most of the construction was on the westside of the Willamette River, with Kruse Way, Washington Square, and the Sunset Corridor being the most popular sites. Construction slowed considerably 1987, and if it remains slow the Grubb and Ellis commercial brokerage firm predicts suburban vacancy rates could drop to 5-6 percent by 1990. However, the 1988 Metropolitan Leasing Guide reports that an additional 500,000 square feet of office space are scheduled for construction in 1988 and beyond. Although businesses now have more suburban locations from which to

choose, regional analysts are not expecting mass migrations out of the central business district.

TABLE B-2
ESTIMATED ABSORBTION OF NEW CLASS "A" OFFICE SPACE IN DOWNTOWN PORTLAND
(SQ. FT.)

Year	Constructed	Absorbed	Not Absorbed
1979	520,000	390,000	130,000
1980	630,000	490,000	140,000
1981	820,000	480,000	340,000
1982	380,000	170,000	210,000
1983	1,070,000	480,000	590,000
1984	890,000	400,000	490,000
1985	0	0	0
TOTAL	4,310,000	2,410,000	1,900,000
AVERAGE	616,000	344,000	272,000

Source: Cushman & Wakefield of Oregon, Inc. and Portland Development Commission

Additional office space is also being created through the renovation of historic buildings. Lured by the vast supply of attractive historic buildings and favorable tax credits, developers renovated more than 700,000 square feet of office space in downtown Portland between 1980 and 1985.

Grubb and Ellis predicts that Portland's office vacancy rates will remain high until the end of the decade. The westside will see the majority of the office construction; however, on the eastside, Interstate 205/Sunnyside will continue to grow and will become the economic hub of that region. Future development will be risky as the most popular sites either have been developed or are under construction.

Like the most other suburban areas around the country, West Linn is experiencing office vacancy rates between 25 and 30 percent in its Robinwood office district. West Linn's office demand comes primarily from self-employed

professionals who can move back into their homes during bad economic times. Alan Pynn, a local developer, believes vacancy rates will drop as the Portland area continues to recover from the recent recession. Local developers have no office construction plans in the near future.

B.2 RETAIL SPACE

At the national level retail development has been strong since the 1960s. But experts believe the short-term demand for retail space cannot continue to support this high level investment. In short, they argue America is overstored. Regional malls and strip commercial centers have reached a saturation point, with most new projects directly competing with existing centers.

Why has investment remained high despite predictions of a bearish future? What follows is a detailed examination of the factors that will affect the short-term future of the retail industry.

B.2.1 NATIONAL TRENDS IN RETAIL DEVELOPMENT

B.2.1.1 Regional Mall Development in Decline

The September 2, 1987 Wall Street Journal reported that in the five years from 1982-1987, 77 regional malls were constructed compared with 120 malls constructed in the previous five years.

The primary cause of the decline is the saturation of the market for these large regional shopping centers. With the mass development of suburbs and highways in the 1950s and 1960s, the demand for shopping centers outside city

centers was enormous, and regional mall construction grew steadily throughout those decades. However, construction reached a plateau in the 1980s as markets for these malls became saturated. Now only a few markets exist and are located primarily in pockets of rapidly growing regions of the South.

A secondary cause of decline of regional mall construction is the shortage of anchors. Due to a large number of mergers in recent years, department stores, the traditional anchor of regional malls, are in short supply. In addition, department stores are decreasing the number of departments in each store and are voluntarily allowing specialty stores to increase their market share of some items. The 1987 U.S. Industrial Outlook notes that anchors "have shifted their merchandise mix toward items that offer higher markups and more frequent inventory turnover."

In the 1960s, the average department store contained 250,000 square feet; today the average square footage has shrunk to between 150,000 and 180,000.

In the near future, regional malls will inevitably lose some sales to electronic retailing. Sears is experimenting with cable television shopping, and JC Penney developed the Telaction home shopping system and signed Neiman-Marcus, Marshall Field, and Abercrombie & Fitch. Urban Land (January 1985) comments on this trend:

> Conventional shopping centers will be challenged by electronic retailing's capacity to create computer networks that can also present quality specifications, comparative pricing, access to diversely located inventory, product customization, and other yet unthought-of consumer advantages.

Industry experts agree conventional shopping will never be replaced by electronic retailing but advise conventional retailers to understand its role in the market and to adapt as it evolves.

B.2.1.2 Innovation and Renovation

The declining demand for the traditional mall coupled with the relative scarcity of department stores calls for innovation on the part of the mall developer. The Wall Street Journal reported mall developers are increasingly using the indoor amusement park model for their new projects. These malls include indoor water slides, ice rinks, arcades, and in an extreme case, a roller coaster. Walt Disney Co. has begun construction on a such development in Burbank, California.

Where demand for retail space is increasing but a new mall is clearly not needed, owners and investors have renovated and expanded older malls. With mall construction peaking in the late 1960s and early 1970s, many regional malls are dated and are in severe need of revitalization. Urban Land (1984) discussed renovation's new popularity.

> The trend in renovation and expansion is largely related to both the physical and functional aging of the centers. A shopping center can suffer from an obsolete design, an inappropriate tenant mix due to a changing market and new competition, or the loss of its status as a tax shelter. Landowners of and investors in mature centers have thus had to face an array of problems and, in dealing with them, have had to decide to what degree to renovate and/or expand.

B.2.1.3 The New Mall Owners

Due to a 1974 ruling that for the first time allowed the use of pension funds for real estate investments, insurance companies and other financial institutions are now dominating the ownership of regional malls. In June 1986, Urban Land reported that Equitable Life Assurance Society owns approximately 66 regional malls, Prudential Insurance Company owns 60, and Rosenburg Real Estate Equity Funds

owns 32. Urban Land (1986) notes the comparative advantages these owners have with respect to the management of regional malls.

> The original shopping center developers often paid scant attention to detail. While they would have good attorneys and accounts close at hand to test their instincts, ideas, and decisions, leadership was clearly vested in the developers. But today's institutional real estate managers, in many cases, are attorneys, accountants, or financial analysts themselves. They may bring skills to the job that the original owner never had: they index inflation in their holdings, continuously monitor performance and diversification, and scrupulously update appraisals and annual valuations.

Institutional owners have generally preferred tenants who are willing to pay high rent, yielding profits in the short-term. Industry experts argue that institutional portfolio managers are ignoring the slow-starting tenants who may be better for the tenant mix and the ultimate long-term success of the mall. In general, many believe owner-tenant relationships have been strained.

B.2.1.4 Sub-Regional Center Growth

Due to shifting populations and increased consumer demand for low-priced goods, the markets for sub-regional community center development are plentiful. Discount retailers have assumed the role of anchor in many of these smaller shopping centers, which are usually a quarter of the size of the traditional million square foot regional mall. Usually not welcome in the regional mall, discount retailers have finally found their niche and have developed a successful marketing approach.

In addition, discount retailers are combining with grocery chains to form hypermarkets, which are 400,000 square feet on average with 220,000 square feet devoted to the discount supermarket. The remaining space may comprise another 40

stores, offering a wide variety of consumer goods and services. The 1986 Emerging Trends in Real Estate estimated that 50,000 customers a week travel as far as 40 miles to shop at the larger hypermarkets.

The hypermarkets are in direct competition with wholesale clubs, which are generally built on an 100,000 square foot freestanding site and sell groceries, hardware, and appliances. The membership is split evenly between small businesses and individuals, with the businesses usually paying the annual dues for its employees. Average annual sales for the clubs range between 80 and 100 million dollars. Industry leaders include Costco Wholesale Club, Price Saver's, BJ's Wholesale Club, and the Price Club. None of the national chains is currently open to the general public, though industry analysts see that changing in the future.

Home improvement centers have also acquired the anchor role in the sub-regional community centers. Usually these centers acquire a do-it-yourself theme, attracting craft stores, auto parts shops, appliance service centers, and frame shops as tenants.

A final category of the sub-regional mall is the off-price center, which is anchored by a large off-price clothing store. The off-price store offers higher-end name-brand merchandise at 20-60 percent off retail prices. Their cliental generally consists of white-collar service/information employees who are not attracted to either the high department store prices or the merchandise offered by discount retailers. The market for these stores is typically an extended region, so they also attract tourist's dollars.

B.2.1.5 Decline of Strip Commercial Development

As with the regional malls, the decline in strip commercial development is due to saturation of the market. In almost all cases, the construction of a new commercial strip competes directly with an existing strip. The only solution, according to the Real Estate Research Corporation, is for the developer to introduce merchandise that is not available at the existing center. This has resulted in an

increase of service activities in the strip commercial centers. Primarily developers recruit the service businesses to decrease the vacancy rates caused by the over-building problem. However, developers also realize there is an increase in consumer demand for the services.

An exception to this downward trend appears to be taking place in Southern California, where an estimate 2,000 strip retail centers were built in the first half of this decade alone. Convenience stores are the primary anchors of these small centers, which generally attract dry cleaners, doughnut shops, and video rental outlets as tenants. Urban Land (1985) notes the ideal characteristics of a convenience center's location.

> Developers (of small convenience centers) look for densely populated urban neighborhoods with 100,000 residents within a two-mile radius of the project strip retail center and daily traffic counts of 40,000 to 50,000 cars on nearby streets.

B.2.1.6 Downtown Revitalization

Coupled with the decline of the regional mall is a downtown renaissance. Many cities, including St. Louis, San Diego, and Los Angeles, have constructed downtown malls that incorporate existing department stores or hotels. Often the malls are built in historic or waterfront districts to attract tourists as well as local residents. In most cases, the malls are composed of a large number of specialty shops, that generally do not compete with stores in suburban malls. The downtown office workers and tourists compose the majority of the new mall's cliental.

The success of downtown retailing in some cities results from a centralized management approach, which has traditionally been the comparative advantage of a regional mall. Different models have been used to copy the centralized management of the regional malls and include:

1. Making store owners shareholders in a cooperative corporation

2. Creating a nonprofit management association

3. Combining neighboring merchants and lessees as partners in a larger business

One successful example, which employs the latter model, is the Japanese Village Plaza, Ltd., located in the Little Tokyo section of Los Angeles. The project, which was completed in one-and-one-half years, was started by six general partners who entered a limited partnership with the merchants. With uniform operating hours, well-coordinated advertising and marketing, and a high level of police security, the 48-store project has become the focal point of the city's Japanese community and a major tourist attraction.

A number downtowns have incorporated the positive aspects of the regional mall into their own marketing strategy, resulting in a downtown renaissance. Investor Outlook (1986) comments on the downtown retail comeback.

> Some suggest that the traditional downtown may be an anachronism, gone forever despite heroic efforts to revive it. The new reality is that downtown can and will support retailing that is responsive to market demand. The over 100 major retail projects built in America's downtowns in the last 12 years are proof of that.

B.2.1.7 Changing Demographics

Retailers should be aware of two demographic changes that have reversed in the past decade: population shifts and changes in the age structure.

The January 1985 edition of Urban Land noted that population migration in recent years has been from the Northeast to the West and South. The population has also moved out of urban areas and into rural areas of the country, increasing retail demand in regions that were once sparsely populated. Although these migration trends are significant, Americans are moving less now than they have in the past. The decline in mobility results from high housing prices and an increase of two-job households which makes relocation difficult.

The change in America's age structure will also have a great impact on retail demand. The following paragraphs from Urban Land (1985) outline the nation's age structure changes through 1995, and the implications these changes will have on retailers.

> The number of young adults between the ages of 25 and 34 will increase by approximately 6 million. This is the most mobile age group and will represent a strong force in creating housing demand and thus for new neighborhood and community retail centers in particular.
>
> The number of adults between the ages of 35 and 44 will increase by 12 million. The retail market will feel the effects of this bulge in the middle-aged group. The design and merchandising of shopping centers will also have to reflect changing consumer preferences of a maturing population, which will be generally affluent and at the peak of its earning powers. The growth in the number of female professionals and of dual-career families will create new demand characteristics.
>
> Empty nesters, ranging in age from 45 to 54, are expected to expand in number by only about 2.5 million during the next decade. Since the group is no longer encumbered with the financial responsibilities of rearing a family, it has greater discretionary income and therefore will support the higher end of retailing and quality food service.

New and pre-retirees, ages 54 to 64, will shrink in number during the 1980s by about 3 percent as the generation born during the Depression nears retirement age. Also the fact that retirement at age 65 is no longer the custom as it was in the past has affected the size of the retirement population. Supported by the law, a healthier older population so choosing may work beyond age 65.

The retired and elderly population, age 65 and over, is increasing as a group more rapidly than the population as a whole. In the 1980s, the elderly population is expected to grow by about 25 percent or 6.3 million persons. The characteristics of the elderly population will change. Many more elderly will be better educated than their predecessors. The percent of older people living in the suburbs will rise, even though they will continue to be underrepresented in the suburbs and overrepresented in nonmetropolitan areas. This group of elderly will have more discretionary money and will be healthier, more active, and more independent. They will probably spend more of their time outside the home and will be looking for the community structure and retail facilities that meet their needs. Thus, the elderly will represent a powerful force in generating demand for shopping centers.

B.2.1.8 Social Changes

Coupled with the nation's changing demographics are its changing lifestyles. The composition of the traditional American household has changed dramatically over the past 20 years, and with it comes a change in retail demand.

Twenty years ago the traditional family consisted of a married couple with or without children, and a father who earned the sole income. In the 1990s and beyond, the traditional family will comprise two wage earners with independent

children who will spend increasing amounts of time in daycare centers. This new traditional family will spend more of its food budget on restaurants and prepared foods and will demand a more varied wardrobe. They are likely to spend more of their leisure time outside of the home.

Single-person households grew from 18 percent of all households in 1970 to 23 percent in 1980. The figure continues to rise in this decade. Single persons generally spend a larger percentage of their income on clothing, travel often, and eat at restaurants.

The retail demand of the double-income family and single-person households explains the recent success of specialty stores, which have gained popularity in downtown retail districts and have even combined to create "anchorless" malls. Banana Republic is a prime example of a specialty store that has benefited from the increased demand in higher priced clothing. Slowly specialty stores have evolved into destinations rather than attracting impulse shoppers only.

With the divorce rate rising, the number of one-parent households has also been increasing. Between the years of 1970 and 1982, the number of such households nearly doubled, reaching 11.4 million. These families tend earn lower incomes and depend on affordable goods from the retail community to meet their needs. The increasing popularity of discount stores can be linked in part to the growth these households, with stores like K-Mart, Zayre, and Target being primary beneficiaries.

B.2.1.9 Changes in Demand for Retail Floor Space

Industry analysts are predicting that total supportable retail floor space per capita is on the increase. The Urban Land Institute in 1987's Developmental Trends report noted that between the years of 1974-1984 the population grew 12% while retail floor space increased 80%. The Commercial Trends Report for Eugene-Springfield concluded that the magnitude of the buildup suggested fundamental long-term changes in retail floor area required to support a given population.

B.2.2 REGIONAL TRENDS IN RETAIL SPACE DEVELOPMENT[1]

Historically, retail trends in the Portland metropolitan area have been consistent with those observed on the national level. In 1958, retail outlets in the central business district (CBD) accounted for 17 percent of all retail sales in the metropolitan area. Due to the construction of highways and the subsequent development of suburban malls, the CBD's share of retail sales dropped to four percent by the late 1970s. Between 1960 and 1981, five regional malls were built in the metropolitan area, four of which contain more than one million square feet.

Since 1958, the type of merchandise sold in the CBD has changed considerably. The general trend, which has been observed in other major cities as well, is toward the sale of specialty goods. Of the CBD's total retail sales in 1958, general merchandise and specialty items represented 55 percent and 14 percent respectively. General merchandise now represents only 26 percent of total CBD retail sales and specialty items represent 36 percent.

The gradual transition into the sale of specialty items, which generally do not compete with goods sold in regional malls, is one factor that stabilized the CBD's share of retail sales in the late 1970s and early 1980s. Another factor is the substantial increase in downtown office employment during the 1970s and 1980s. Chiefly due to the construction of large amounts of CBD office space, the introduction of new office workers fueled the demand for specialty items and apparel goods in the retail stores of the CBD. Finally, the construction Transit Mall in 1978 and the Eastside Light Rail Transit System in 1986 improved the accessability of CBD retail outlets.

Rental lease rates in the downtown core range between 15 and 25 dollars per square foot per year. Rates are significantly higher in the popular downtown specialty malls (e.g., Yamhill Marketplace, The Galleria) where annual leases are

---

1 This section is taken primarily from Portland Development Commission's Briefing Paper 4 (1986).

usually in the 25 to 30 dollar per square foot range. In contrast, annual rental lease rates fluctuate between four and six dollars per square foot in the Union-Grand area of East Portland. For suburban malls, rates are difficult to generalize as they range between 12 and 30 dollars per square foot.

B.3 RESIDENTIAL DEVELOPMENT

B.3.1 NATIONAL TRENDS IN RESIDENTIAL DEVELOPMENT

B.3.1.1 Single-Family Housing

The high interest rates of the early 1980s resulted in suppressed demand for housing. As the rates declined in 1984 and 1985, a surge of first-time buyers demanded houses. By 1986 single-family housing starts returned to their pre-recession level of 1.2 million. At the outset 1987, however, interest rates increased, resulting in a nationwide decline in housing starts of 9.2 percent.

Average new home prices when adjusted for inflation remained constant between 1980 and 1987. During the same period the housing affordability index, which measures house payments as a percentage of household income, improved in nearly every major market.

Also aiding housing affordability is the decrease in residential land price inflation during the early 1980s. Urban Land (1986) surveyed 30 major metropolitan areas and found that 21 of the markets experienced a lower rate of raw residential land price inflation in the period between 1980 and 1985 than in the previous five year period. In the first half of this decade, the rate of inflation for raw residential land was less than half the inflation rate of the 1975-1980 period.

Due to changes in migration patterns, some areas have not experienced the predicted rise in housing starts that traditionally accompanies increased affordability. Regional trends in employment have changed during the decade, which naturally affects housing demand across the nation. The westward migration that accelerated in the late 1970s and early 1980s, leveled off after 1983. The South and the West's share of national housing starts dropped accordingly from 77.3 percent in 1983 to 62.3 percent in 1987. Offsetting the drop in those regions was a dramatic 43 percent increase in Midwest housing starts between 1985 and 1987.

B.3.1.2 Multi-family Housing

Rental Apartments

Vacancy rates in large multi-family projects have increased significantly throughout the 1980s, rising from 6.5 percent in 1982 to 11 percent in 1987. There are only a few markets in the nation where modest rent increases are possible, including Boston, Philadelphia, and Washington D.C. Nationwide the annual rate of rent increases dropped from 6.0 percent in 1986 to 2.5 percent in 1987.

Developers responded to the clear oversupply of rental units with a 25 percent decline in rental starts last year. Industry analysts predict the market will stabilize if developers remain on their present course.

A major trend that has developed in the 1980s is the renewed interest in luxury rental units in the nation's downtowns. Many cities consider downtown residential development necessary for continued retail vitality. Some cities have offered city-financed market analyses and reduced prices for residentially zoned property to encourage development.

Developers must pay attention to the aging of the baby-boom generation with respect to rental housing. Estimates show the number of people over age 65 rising

from 11 percent today to more than 18 percent in the next 50 years. Urban Land (1986) outlined the three multi-family housing types most preferred by the over-65 age group:

1. Lifecare: housing plus services and health care contractually provided for life, with initial endowments and monthly maintenance fees;

2. Continuum of care: primarily rental housing with services paid more on a user basis; and

3. Congregate housing: limited or no service, with rentals geared to older tenants.

In addition to preferred housing types, surveys have shown that the elderly generally look for housing that is within a 30-minute drive of their families. That preference makes urban and suburban locations ideal for such developments. In major urban settings, retirement housing developers have chosen high-rise buildings, which offset high land prices and offer spectacular views that appeal to tenants. In addition, the urban location is close to entertainment and community facilities as well as the tenant's family and friends. Suburban two-level "garden projects" are also quite popular. Low land prices allow for ample parking space, recreation areas, and separate community and health care buildings.

Most major housing markets will experience an increased demand for retirement housing over the 50 years; however, the traditional migration of the elderly to the Sunbelt will continue, making those markets particularly active.

Condominiums

Historically, condominiums have appealed to buyers who cannot afford single-family housing, so when housing affordability increases, as it has in the 1980s, the demand for condominiums decreases. Demand for condominiums is down and condominium starts declined more than six percent between 1985 and 1986, though many argue construction should have slowed even more. With the exception of a few New England markets, condominium markets will likely remain glutted through 1990.

B.3.2 REGIONAL TRENDS IN RESIDENTIAL DEVELOPMENT

West Linn's housing development is strong. Most single-family development is concentrated in the Rosemont area: developments like Hidden Springs Summit I and II, Barrington Heights, and Haverhill feature good views and three- to four-bedroom houses in the $150,000 to $300,000 range. House prices have remained in that range for three reasons. First, high developmental fees make the development of houses in the $80,000 to $100,000-range unprofitable. Second, property taxes, which have risen to $28 per thousand in West Linn, are not conducive to small-home development. These two factors set the floor for new house prices, while the ceiling is set by a third one: West Linn's competition with neighboring Lake Oswego. As house prices exceed $350,000, buyers are lured to the more prestigious Lake Oswego area.

Given the current and historical dominance of single-family housing in West Linn, we would expect a resurgence of multi-family building only if characteristics of some land in West Linn make it unsuitable for single-family development. The multi-family development under construction or proposed should meet market demand for a few years.

REFERENCES

Allen, John B., & Terry Bradfish. 1986. Downtown Retailing. Investor Outlook. Grubb and Ellis Commercial Brokerage Firm.

Allen, John B. 1987. The Smart Building. Investor Outlook (First Quarter): 1-6.

Dowall, David. 1986. Endangered Species: San Francisco's Back-Office Employees. Urban Land (August): 9-13. Washington DC: Urban Land Institute.

Economic Development Services. 1987. Commercial Trends Report for Eugene-Springfield Metropolitan Area: Lane County, Oregon. Prepared for the Lane Council of Governments (December).

Howell, Brent F.. Jun 1986. Under New Ownership: Regional Shopping Centers face New Challenges. Urban Land. Washington DC: Urban Land Institute.

Hughes, James W.; George Sternlieb. 1986. The Suburban Growth Corridor. Urban Land (September): 32-33.

Lockwood, Charles. Nov 1985. Trends: Retail Strip Boom. Urban Land. Washington DC: Urban Land Institute.

Michael, Jerome J.. Mar 1984. Renovation and Expansion of Shopping Centers. Urban Land. Washington DC: Urban Land Institute.

Moore, Colleen G.. Dec 1986. Cities Move to Promote Downtown Housing. Urban Land. Washington DC: Urban Land Institute.

Portland Development Commission. 1986. Historic and Current Office Space Development Trends in the Portland Metropolitan Area. Briefing Paper 3.

Portland Development Commission. 1986. Historic and Current Retail Activity in the Portland Metropolitan Area. Briefing Paper 4.

Portland Development Commission. 1986. Population and Household Trends in the Portland Metropolitan Area 1970 to 1980. Briefing Paper 1.

Portland Metropolitan Association of Building Owners and Managers. 1988. Southwest Potential. Portland: 1988 Metropolitan Office Leasing Guide.

Real Estate Research Corporation. 1987. Office Markets in Perspective. Emerging Trends in Real Estate: 1988.

Real Estate Research Corporation. 1985. Office Markets in Perspective. Emerging Trends in Real Estate: 1986.

Real Estate Research Corporation. 1984. Office Markets in Perspective. Emerging Trends in Real Estate: 1985.

Spink Jr., Frank H.. Jan 1985. The Maturing of Shopping Centers. Urban Land. Washington DC: Urban Land Institute.

Treschitta, Ron. Mar 1986. Residential Land Price Inflation, Slowing and Shifting Locale. Urban Land. Washington DC: Urban Land Institute.

United States Department of Commerce. 1987. 1987 U.S. Industrial Outlook. Washington DC: Department of Commerce.

Urban Land Institute. 1987. 1987 Developmental Trends. Washington DC: Urban Land Institute.

Williams, Gardner. 1987. Resurgence of Activity Generates Opportunity. Investor Outlook: The Portland Perspective (First Quarter): 1-2.

Wentling, James W.. Sep. 1986. New Directions in Housing for Older Americans. Urban Land. Washington DC: Urban Land Institute.

APPENDIX C
ECONOMIC AND DEMOGRAPHIC CHARACTERISTICS OF THE STUDY AREA

C.1 INTRODUCTION

A market analysis for commercial and residential development is based in part upon an analysis of the underlying economic and demographic characteristics of the study area. In order to be able to forecast future demand for commercial and residential land, the underlying characteristics that drive demand, especially population, income, and employment, must be known and future values for these characteristics forecast.

The following pages present the underlying data upon which we based the description of the economic and demographic characteristics in chapter 3. The data was provided for this study by the Metropolitan Service District, and is based on United States Census data, updated to the present based on local data. We checked the forecasts provided against other local forecasts and found them to be consistant.

The information on population, households, income, occupations, education, and employment is presented on six levels: for the City of West Linn, Clackamas County, the area within the Clackamas County Urban Growth Boundry (UGB), the Portland Metropolitan area, and by travel time (5, 10, and 15 minutes) from the I-205 and Highway 43 interchange, and travel distance (5 and 10 miles) from the same location. Where appropriate, we also calculate the percent of the total category that a subcategory comprises, and the average annual growth rate (Grow Rate).

TABLE C-1

	West Linn City Limits			Clackamas County			Metro Area			Clackamas County UGB		
		% of Total	Grow Rate		% of Total	Grow Rate		% of Total	Grow Rate		% of Total	Grow Rate
POPULATION TRENDS												
1980	13293			241903			1049689			148625		
1985	14849		2.2%	249001		.6%	1077007		.5%	151678		.4%
1986	15084		1.6%	251000		.8%	1086000		.8%			
POPULATION FORECAST												
1990	16956		2.9%	274466		2.2%	1157214		1.6%	171060		2.4%
2005	23278		2.1%	362474		1.9%	1424257		1.4%	220961		1.7%
PERSONS BY AGE IN 1985												
TOTAL	14849	100.0%		248334	100.0%		1073758	100.0%		151342	100.0%	
0-4	1001	6.7%		17433	7.0%		82372	7.7%		10998	7.3%	
5-9	993	6.7%		17877	7.2%		74226	6.9%		10442	6.9%	
10-14	1329	9.0%		19263	7.8%		70187	6.5%		10888	7.2%	
15-19	1374	9.3%		21891	8.8%		76349	7.1%		11902	7.9%	
20-24	970	6.5%		20946	8.4%		83951	7.8%		13421	8.9%	
25-29	777	5.2%		15484	6.2%		97710	9.1%		11164	7.4%	
30-34	1485	10.0%		20607	8.3%		112515	10.5%		14495	9.6%	
35-44	2780	18.7%		40948	16.5%		163940	15.3%		23931	15.8%	
45-54	1722	11.6%		25387	10.2%		95407	8.9%		14005	9.3%	
55-59	664	4.5%		11364	4.6%		45951	4.3%		6774	4.5%	
60-64	592	4.0%		10951	4.4%		46048	4.3%		6601	4.4%	
65-74	841	5.7%		15844	6.4%		73160	6.8%		9642	6.4%	
75+	323	2.2%		10339	4.2%		51942	4.8%		7079	4.7%	
HOUSEHOLD TRENDS												
1980	5037			84697			408713			54315		
1985	5720		2.5%	91051		1.4%	430745		1.1%	57692		1.2%
1986	5881		2.8%	93027		2.1%	435963		1.2%			
HOUSEHOLD FORECAST												
1990	6432		2.2%	101563		2.2%	466111		1.7%	63697		2.0%
2005	8569		1.9%	133595		1.8%	579172		1.4%	84123		1.9%
TOTAL HOUSING UNITS												
1980	4880			88920			431455			57495		
1985	5553		2.6%	95986		1.5%	456005		1.1%	61349		1.3%
1986	5717		2.9%	98228		2.3%	463260		1.6%			
1990	6352		2.6%	106809		2.1%	493778		1.6%	65763		1.4%
2005	8730		2.1%	138985		1.8%	608163		1.4%	87658		1.9%
SINGLE FAMILY												
1980	4122	84.5%		72931	82.0%		297131	68.9%		42557	74.0%	
1985	4585	82.6%	2.1%	78410	81.7%	1.4%	313637	68.8%		45436	74.1%	
1986	4721	82.6%	2.9%	79758	81.2%	1.7%	317267	68.5%				
1990	5289	83.3%	2.8%	86690	81.2%	2.1%	334813	67.8%		48497	73.7%	
2005	7360	84.3%	2.2%	112694	81.1%	1.7%	400596	65.9%		63941	72.9%	
MULTIPLE FAMILY												
1980	758	15.5%		15989	18.0%		134324	31.1%		14938	26.0%	
1985	968	17.4%	4.9%	17576	18.3%	1.9%	142368	31.2%		15913	25.9%	
1986	997	17.4%	3.0%	18470	18.8%	5.0%	145993	31.5%				
1990	1063	16.7%	1.6%	20119	18.8%	2.1%	158965	32.2%		17266	26.3%	
2005	1371	15.7%	1.7%	26291	18.9%	1.8%	207567	34.1%		23717	27.1%	
OWNER/RENTER IN 1980												
TOTAL OCCUPIED UNITS	4595	100.0%		84697	100.0%		408713	100.0%		55893	100.0%	
OWNER OCCUPIED	3642	79.3%		63417	74.9%		253934	62.1%		38181	68.3%	
RENTER OCCUPIED	953	20.7%		21280	25.1%		154779	37.9%		17712	31.7%	
1985 HOUSEHOLD INCOME	5720	100.0%		91051	100.0%		430745	100.0%		57629	100.0%	
LESS THAN $10,000	246	4.3%		6830	7.5%		53713	12.5%		5080	8.8%	
$10,000 TO $14,999	209	3.7%		8539	9.4%		50354	11.7%		4897	8.5%	
$15,000 TO $24,999	1680	29.4%		22225	24.4%		116515	27.0%		14658	25.4%	
$25,000 TO $34,999	1316	23.0%		22629	24.9%		92232	21.4%		14859	25.8%	
$35,000 TO $49,999	1331	23.3%		18385	20.2%		72627	16.9%		10907	18.9%	
$50,000 OR MORE	939	16.4%		12443	13.7%		45304	10.5%		7291	12.7%	
MEAN HOUSEHOLD INCOME	36791			33688			29749			32517		

TABLE C-1
(continued)

	I-205/Hwy 43 Travel Time						I-205/Hwy 43 Travel Distance			
	5 Min.		10 Min.		15 Min		5 Miles		10 Miles	
	Total	% of Grow Rate	Total	% of Grow Rate	Total	% of Grow Rate	Total	% of Grow Rate	Total	% of Grow Rate
POPULATION TRENDS										
1980	34425		124048		325994		93584		535029	
1985	36052	.9%	126037	.3%	331769	.4%	95956	.5%	536778	.1%
1986	36221	.5%	126314	.2%	334136	.7%	96013	.1%	537368	.1%
POPULATION FORECAST										
1990	38878	1.8%	136576	2.0%	356473	1.6%	105499	2.4%	571606	1.5%
2005	48841	1.5%	175073	1.7%	440268	1.4%	141078	1.9%	637836	.7%
PERSONS BY AGE IN 1985										
TOTAL	35942	100%	125689	100%	330801	100%	95698	100%	534995	100%
0-4	2441	6.8%	9201	7.3%	24646	7.5%	6740	7.0%	42169	7.9%
5-9	2266	6.2%	8852	7.0%	22154	6.7%	6647	6.9%	35337	6.6%
10-14	2884	8.0%	9687	7.7%	21989	6.6%	7454	7.8%	30468	5.7%
15-19	3051	8.5%	10546	8.4%	24566	7.4%	8195	8.6%	32613	6.1%
20-24	2904	8.1%	11059	8.8%	28122	8.5%	8231	8.6%	41323	7.7%
25-29	2178	6.1%	8345	6.6%	27319	8.3%	6139	6.4%	55304	10.3%
30-34	3154	8.8%	10719	8.5%	30895	9.3%	8134	8.5%	60272	11.3%
35-44	5954	16.6%	20075	16.0%	49449	14.9%	15443	16.1%	74357	13.9%
45-54	3635	10.1%	12392	9.9%	31038	9.4%	9415	9.8%	43629	8.2%
55-59	1581	4.4%	5712	4.5%	15424	4.7%	4327	4.5%	23207	4.3%
60-64	1710	4.8%	5452	4.3%	15340	4.6%	4283	4.5%	24482	4.6%
65-74	2445	6.8%	7911	6.3%	23218	7.0%	6084	6.4%	40580	7.6%
75+	1759	4.9%	5738	4.6%	16641	5.0%	4606	4.8%	31254	5.8%
HOUSEHOLD TRENDS										
1980	12429		44413		123742		33270		220783	
1985	13376	1.5%	46951	1.1%	130097	1.0%	35504	1.3%	226475	.5%
1986	13579	1.5%	47535	1.2%	131969	1.4%	35897	1.1%	226847	.2%
HOUSEHOLD FORECAST										
1990	14528	1.7%	51400	2.0%	141226	1.7%	39390	2.3%	237130	1.1%
2005	18098	1.5%	65905	1.7%	175945	1.5%	52495	1.9%	278134	1.1%
TOTAL HOUSING UNITS										
1980	13034		46440		129373		34830		232942	
1985	14071	1.5%	49259	1.2%	136537	1.1%	37281	1.4%	240162	.6%
1986	14310	1.7%	49956	1.4%	138852	1.7%	37758	1.3%	241048	.4%
1990	15243	1.6%	53843	1.9%	148137	1.6%	41300	2.2%	248922	.8%
2005	18732	1.4%	68402	1.6%	182931	1.4%	54575	1.9%	292260	1.1%
SINGLE FAMILY										
1980	10444	80.1%	37180	80.1%	97688	75.5%	27564	79.1%	151630	65.1%
1985	11197	79.6% 1.4%	39509	80.2% 1.2%	103018	75.5% 1.1%	29460	79.0% 1.3%	155644	64.8% .5%
1986	11414	79.8% 1.9%	40046	80.2% 1.4%	104323	75.1% 1.3%	29909	79.2% 1.5%	156296	64.8% .4%
1990	12202	80.0% 1.7%	42974	79.8% 1.8%	109978	74.2% 1.3%	32723	79.2% 2.2%	159944	64.3% .6%
2005	15147	80.9% 1.4%	53941	78.9% 1.5%	131166	71.7% 1.2%	43268	79.3% 1.9%	176203	60.3% .6%
MULTIPLE FAMILY										
1980	2590	19.9%	9260	19.9%	31685	24.5%	7266	20.9%	81312	34.9%
1985	2847	20.2% 1.9%	9750	19.8% 1.0%	33519	24.5% 1.1%	7821	21.0% 1.5%	84518	35.2% .8%
1986	2896	20.2% 1.7%	9910	19.8% 1.6%	34529	24.9% 3.0%	7849	20.8% .4%	84752	35.2% .3%
1990	3041	20.0% 1.2%	10869	20.2% 2.3%	38159	25.8% 2.5%	8577	20.8% 2.2%	88978	35.7% 1.2%
2005	3585	19.1% 1.1%	14461	21.1% 1.9%	51765	28.3% 2.0%	11307	20.7% 1.8%	116057	39.7% 1.8%
OWNER/RENTER IN 1980										
TOTAL OCCUPIED UNITS	12429	100%	44413	100%	123742	100%	33270	100%	220783	100%
OWNER OCCUPIED	8953	72.0%	31841	71.7%	81982	66.3%	24151	72.6%	125810	57.0%
RENTER OCCUPIED	3476	28.0%	12572	28.3%	41760	33.7%	9119	27.4%	94973	43.0%
1985 HOUSEHOLD INCOME	13376	100%	46951	100%	130097	100%	35504	100%	226475	100%
LESS THAN $10,000	1133	8.5%	4255	9.1%	13994	10.8%	2768	7.8%	36743	16.2%
$10,000 TO $14,999	877	6.6%	3925	8.4%	14520	11.2%	2679	7.5%	30943	13.7%
$15,000 TO $24,999	3528	26.4%	11883	25.3%	36506	28.1%	8695	24.5%	66197	29.2%
$25,000 TO $34,999	3174	23.7%	12069	25.7%	29126	22.4%	9609	27.1%	44801	19.8%
$35,000 TO $49,999	2954	22.1%	9387	20.0%	22285	17.1%	7604	21.4%	31006	13.7%
$50,000 OR MORE	1710	12.8%	5432	11.6%	13666	10.5%	4149	11.7%	16785	7.4%
MEAN HOUSEHOLD INCOME	33457		32263		27791	76.1%	33032		26792	

TABLE C-1
(continued)

	West Linn City Limits			Clackamas County			Metro Area			Clackamas County UGB		
		% of Total	Grow Rate		% of Total	Grow Rate		% of Total	Grow Rate		% of Total	Grow Rate
OCCUPATION IN 1980												
(Employed Persons 16 and Older)	6397	100.0%		110110	100.0%		501781	100.0%		72445	100.0%	
EXECUTIVE & MANAGERIAL	1129	17.6%		13629	12.4%		62502	12.5%		9286	12.8%	
PROFESSIONAL SPECIALTY	1064	16.6%		12980	11.8%		64026	12.8%		8725	12.0%	
TECHNICAL SUPPORT	113	1.8%		2768	2.5%		15104	3.0%		1848	2.6%	
SALES	844	13.2%		12756	11.6%		57541	11.5%		8687	12.0%	
ADMINISTRATIVE SUPPORT	1152	18.0%		18009	16.4%		94224	18.8%		13807	19.1%	
SERVICE: PRIVATE HOUSEHOLD	9	.1%		454	.4%		1941	.4%		260	.4%	
SERVICE: PROTECTIVE	106	1.7%		1471	1.3%		5510	1.1%		961	1.3%	
SERVICE: OTHER	432	6.8%		10309	9.4%		53291	10.6%		6886	9.5%	
FARMING FORESTRY & FISHING	66	1.0%		3122	2.8%		8127	1.6%		907	1.3%	
PRECISION PRODUCTION & CRAFT	836	13.1%		16219	14.7%		60865	12.1%		9584	13.2%	
MACHINE OPERATOR	294	4.6%		8184	7.4%		37988	7.6%		5390	7.4%	
TRANSPORTATION & MATERIAL MOVING	143	2.2%		5535	5.0%		20881	4.2%		3116	4.3%	
LABORERS	210	3.3%		4674	4.2%		19781	3.9%		2987	4.1%	
YEARS OF SCHOOL COMPLETED IN 1980												
(Persons 25 Years and Older)	8075	100.0%		144711	100.0%		640752	100.0%		91684	100.0%	
ELEMENTARY (0-8 Years)	293	3.6%		13037	9.0%		62088	9.7%		7444	8.1%	
SOME HIGH SCHOOL	615	7.6%		16812	11.6%		72286	11.3%		10298	11.2%	
HIGH SCHOOL GRADUATE	2707	33.5%		55226	38.2%		227171	35.5%		34433	37.6%	
SOME COLLEGE	1964	24.3%		31838	22.0%		144090	22.5%		21548	23.5%	
COLLEGE GRADUATE	2495	30.9%		27798	19.2%		135117	21.1%		17961	19.6%	
High School or More		88.7%			79.4%			79.0%			80.6%	
EMPLOYMENT AT THE PLACE OF WORK												
1985 EMPLOYMENT												
TOTAL	2511	100.0%		85061	100.0%		553913	100.0%		66769	100.0%	
MANUFACTURING	177	7.0%		12112	14.2%		64730	11.7%		8284	12.4%	
ELECTRICAL MANUFACTURING	29	1.2%		883	1.0%		23077	4.2%		506	.8%	
FINANCE, INSURANCE & REAL ESTATE	215	8.6%		4643	5.5%		40398	7.3%		3956	5.9%	
TRANSPORT., COMMUN. & PUB. UTIL.	108	4.3%		2872	3.4%		32455	5.9%		2217	3.3%	
CONSTRUCTION	96	3.8%		2610	3.1%		16054	2.9%		2394	3.6%	
SERVICES	547	21.8%		13942	16.4%		111301	20.1%		11774	17.6%	
RETAIL	411	16.4%		14121	16.6%		89208	16.1%		12306	18.4%	
WHOLESALE	180	7.2%		6190	7.3%		44780	8.1%		4433	6.6%	
GOVERNMENT	459	18.3%		12143	14.3%		71124	12.8%		10407	15.6%	
SELF EMPLOYED	196	7.8%		13180	15.5%		53822	9.7%		9829	14.7%	
AGRICULTURE	91	3.6%		2365	2.8%		6964	1.3%		663	1.0%	
1990 EMPLOYMENT FORECAST												
TOTAL	2809	100.0%	2.2%	84402	100.0%		595406	100.0%		75653	100.0%	
RETAIL	560	19.9%	6.2%	17725	21.0%		108818	18.3%		14528	19.2%	
ALL OTHER	2249	80.1%	1.4%	66677	79.0%		486588	81.7%		61125	80.8%	
2005 EMPLOYMENT FORECAST												
TOTAL	3701	100.0%	1.8%	127751	100.0%		794354	100.0%		103305	100.0%	
RETAIL	1006	27.2%	3.9%	30042	23.5%		145947	18.4%		22140	21.4%	
ALL OTHER	2695	72.8%	1.7%	97709	76.5%		648407	81.6%		81165	78.6%	
% Change in Total Employment 1990-2005		31.8%			51.4%			33.4%			36.6%	
% Change in Retail Employment 1990-2005		79.6%			69.5%			34.1%			52.4%	
% Change in Other Employment 1990-2005		19.8%			46.5%			33.3%			32.8%	

TABLE C-1
(continued)

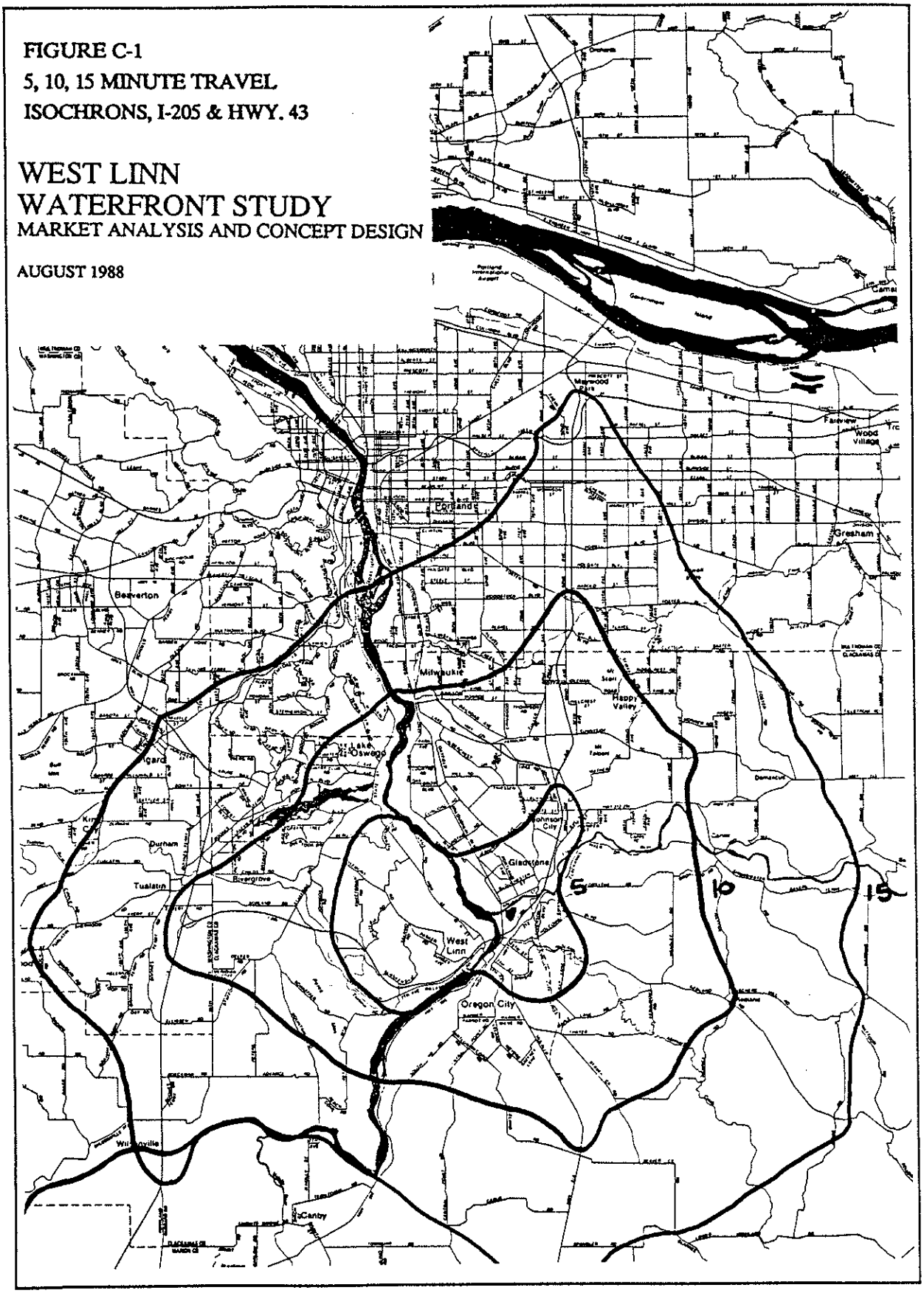
	I-205/Hwy 43 Travel Time						I-205/Hwy 43 Travel Distance			
	5 Min.		10 Min.		15 Min		5 Miles		10 Miles	
		% of Total	Grow Rate	% of Total	Grow Rate	% of Total	Grow Rate	% of Total	Grow Rate	% of Total	Grow Rate
OCCUPATION IN 1980										
(Employed Persons 16 and Older)	15758	100%	57131	100%	154004	100%	42957	100%	253250	100%
EXECUTIVE & MANAGERIAL	2272	14.4%	7299	12.8%	19040	12.4%	5448	12.7%	27322	10.8%
PROFESSIONAL SPECIALTY	2153	13.7%	6654	11.6%	17462	11.3%	5138	12.0%	29981	11.8%
TECHNICAL SUPPORT	379	2.4%	1338	2.3%	4204	2.7%	1017	2.4%	7151	2.8%
SALES	1824	11.6%	6703	11.7%	17488	11.4%	4793	11.2%	27473	10.8%
ADMINISTRATIVE SUPPORT	2984	18.9%	10530	18.4%	30081	19.5%	8085	18.8%	51441	20.3%
SERVICE: PRIVATE HOUSEHOLD	45	.3%	205	.4%	542	.4%	164	.4%	1063	.4%
SERVICE: PROTECTIVE	238	1.5%	773	1.4%	1850	1.2%	604	1.4%	2749	1.1%
SERVICE: OTHER	1393	8.8%	5466	9.6%	15741	10.2%	3831	8.9%	31406	12.4%
FARMING FORESTRY & FISHING	206	1.3%	635	1.1%	1580	1.0%	504	1.2%	2668	1.1%
PRECISION PRODUCTION & CRAFT	2065	13.1%	7995	14.0%	20631	13.4%	6226	14.5%	30219	11.9%
MACHINE OPERATOR	1073	6.8%	4434	7.8%	12070	7.8%	3227	7.5%	19890	7.9%
TRANSPORTATION & MATERIAL MOVING	454	2.9%	2632	4.6%	6932	4.5%	1990	4.6%	11366	4.5%
LABORERS	672	4.3%	2467	4.3%	6383	4.1%	1930	4.5%	10521	4.2%
YEARS OF SCHOOL COMPLETED IN 1980										
(Persons 25 Years and Older)	21174	100%	74156	100%	199767	100%	56347	100%	333862	100%
ELEMENTARY (0-8 Years)	1726	8.2%	6266	8.4%	19290	9.7%	4617	8.2%	37750	11.3%
SOME HIGH SCHOOL	2192	10.4%	8951	12.1%	24240	12.1%	6617	11.7%	42756	12.8%
HIGH SCHOOL GRADUATE	7656	36.2%	28024	37.8%	75211	37.6%	21610	38.4%	120563	36.1%
SOME COLLEGE	4764	22.5%	16604	22.4%	43625	21.8%	12802	22.7%	72039	21.6%
COLLEGE GRADUATE	4836	22.8%	14311	19.3%	37401	18.7%	10701	19.0%	60754	18.2%
High School or More		81.5%		79.5%		78.2%		80.1%		75.9%
EMPLOYMENT AT THE PLACE OF WORK										
1985 EMPLOYMENT										
TOTAL	10887	100%	43448	100%	126656	100%	35252	100%	324179	100%
MANUFACTURING	1202	11.0%	4754	10.9%	17799	14.1%	4434	12.6%	34011	10.5%
ELECTRICAL MANUFACTURING	45	.4%	322	.7%	1049	.8%	299	.8%	3127	1.0%
FINANCE, INSURANCE & REAL ESTATE	769	7.1%	2382	5.5%	8482	6.7%	2188	6.2%	27446	8.5%
TRANSPORT., COMMUN. & PUB. UTIL.	460	4.2%	1147	2.6%	3958	3.1%	1037	2.9%	21280	6.6%
CONSTRUCTION	318	2.9%	1339	3.1%	4296	3.4%	1147	3.3%	8789	2.7%
SERVICES	2250	20.7%	6930	16.0%	24641	19.5%	6724	19.1%	72671	22.4%
RETAIL	2338	21.5%	9385	21.6%	24182	19.1%	6614	18.8%	52236	16.1%
WHOLESALE	352	3.2%	3148	7.2%	8845	7.0%	2531	7.2%	25328	7.8%
GOVERNMENT	1558	14.3%	6283	14.5%	15807	12.5%	4873	13.8%	46793	14.4%
SELF EMPLOYED	1455	13.4%	7289	16.8%	16440	13.0%	5017	14.2%	30357	9.4%
AGRICULTURE	140	1.3%	469	1.1%	1157	.9%	388	1.1%	2141	.7%
1990 EMPLOYMENT FORECAST										
TOTAL	11120	100%	44668	100%	124794	100%	43682	100%	350091	100%
RETAIL	2730	24.6%	11326	25.4%	28936	23.2%	8398	19.2%	58252	16.6%
ALL OTHER	8390	75.4%	33342	74.6%	95858	76.8%	35284	80.8%	291839	83.4%
2005 EMPLOYMENT FORECAST										
TOTAL	14264	100%	66678	100%	181360	100%	55691	100%	418616	100%
RETAIL	4040	28.3%	17877	26.8%	42413	23.4%	14602	26.2%	69502	16.6%
ALL OTHER	10224	71.7%	48801	73.2%	138947	76.6%	41089	73.8%	349114	83.4%
% Change in Total Employment 1990-		28.3%		49.3%		45.3%		27.5%		19.6%
% Change in Retail Employment 1990-		48.0%		57.8%		46.6%		73.9%		19.3%
% Change in Other Employment 1990-		21.9%		46.4%		45.0%		16.5%		19.6%

FIGURE C-1
5, 10, 15 MINUTE TRAVEL
ISOCHRONS, I-205 & HWY. 43

WEST LINN WATERFRONT STUDY

MARKET ANALYSIS AND CONCEPT DESIGN

AUGUST 1988



APPENDIX D
SITE ANALYSIS AND CONCEPT DESIGN

SRG PARTNERSHIP, P.C.

WEST LINN RIVERFRONT
WEST LINN, OREGON

Project No. 8809

URBAN DESIGN AND PLANNING ISSUES

July 26, 1988

1.0 EXISTING CONDITIONS OF STUDY AREA

The study area is located at the approximate geographic center of the City of West Linn at the confluence of Interstate 205 and State Highway 43 adjacent to the Willamette River. Two bridges connect the study area with Oregon City and the larger region - (1) the Oregon City Bridge (Highway 43) to the south and (2) the I-205 Bridge for regional connections to the north and south. The commercial center of Oregon City is located directly across the river.

Land within the study area is developed in a mixture of private and public land uses. The overwhelming majority of land is used for transportation related activities - highways, streets and parking lots - which are related to destinations outside the immediate study area. The portions of the site which are developed with structures contain small-scaled private residences, limited commercial buildings, and the West Linn City Hall. Private residences are located adjacent to the southern row of I-205 and adjacent to the river north of the Oregon City Bridge.

Land located south of the Oregon City bridgehead is zoned primarily General Industrial and General Commercial. Land north of the bridgehead is zoned primarily General Commercial and Residential Duplex.

2.0 LAND OWNERSHIP

Including streets and highways, the total study area contains approximately 71 acres of land. Ownership is divided among public and private parties with the majority being owned by two parties - the State of Oregon (32 acres) and James River Mills (12 acres). Other major owners include the City of West Linn (3.8) including local streets, Portland General Electric (3.7 acres) and the federal government (1.4 acres). Numerous private parties own the remaining area (17.8 acres).

The single largest parcel of land in the study area (nearly 30 acres) is the right-of way for I-205 and State Highway 43 which is owned by the State of Oregon. Land between I-205 and the river which lies south of the Oregon City Bridge is predominantly in private ownership. This segment of the site contains the vast majority of James River's property plus much smaller, privately owned parcels. The narrow strip of land located between I-205 and the river which lies north of the bridgehead is predominantly privately owned.

The study area contains over a half mile of river frontage which is largely under private ownership. Immediately south of the bridgehead, James River controls approximately 700 linear feet of frontage and Portland General Electric controls approximately 300 feet. Numerous private owners control approximately 750 feet immediately north of the Oregon City bridge and the State controls the remaining 1000 feet to the 1-205 bridge.

3.0 TOPOGRAPHY AND SLOPE

The study area is divided into two general topographic areas: 1) a sweeping bench of land located generally equidistant between I-205 and the river and 2) a very steep escarpment at the river's edge. The study area's high point lies adjacent to and north of I-205 while the low point is the river's edge. Transversing the study area there is over 200 feet of topographic change. From less than 20 feet above datum at the edge of the river, the land rises to over 230 feet at its highest point.

Paralleling the river there is a relatively narrow bench of land approximately 300 feet wide which rises as it approaches I-205. Across this bench, slopes generally range from 10-20%. Between this bench and the river is an embankment approximately 50-100 feet wide which drops dramatically down to the river; slopes on the embankment often exceed 70%.

Due to the steep slopes on the riverfront escarpment, panoramic views are afforded of the Willamette River and Oregon City. Along the southern edge of the escarpment, long range views of Willamette Falls lie in a southerly direction.

In addition to dramatic topographic change throughout the study area, bedrock outcroppings are evident throughout the site. Site development costs will likely be within a normal range in the bench area of the site and will be extremely high along the escarpment.

4.0 COMPOSITE SITE OPPORTUNITIES AND CONSTRAINTS

Existing site conditions severely restrict and limit major redevelopment possibilities; however, two primary changes to the site could provide substantial development opportunities:

a) Reconstruction of the I-205 access/egress ramps.
b) Consolidation and reconfiguration of local streets and access roads to James River Mill.

These two changes could trigger redevelopment opportunities and provide two reasonably-sized development parcels and separate local automotive and industrial traffic for mutual benefit.

These two new parcels would be located north and south of the new Highway 43/Oregon City Bridge approach alignment paralleling the river. The south parcel would be approximately 6.25 acres and the north parcel would be approximately 5 acres. The following outline illustrates the significant opportunities and constraints which site development should address:

Constraints

1. The study area is essentially a traffic corridor for through traffic destined for locations immediately outside the study area.
2. Extensive public roadway right-of-ways - Interstate 205, Highway 43, and local city streets - severely constrict development opportunities.
3. Bedrock outcroppings and steep slopes limit reasonable development opportunities to the sweeping bench of land paralleling the river.

Opportunities

1. Existing streets and freeway access ramps can be reconfigured for greater vehicular/pedestrian safety and for the creation of more usable development patterns.
2. Industrial-related traffic can be separated from local civic, commercial and residential traffic.
3. Dramatic views of the Willamette River are afforded from large portions of the study area.
4. Riverfront access and the possibility for greenway connections exist north of the Oregon City Bridge north towards the McLean House.
5. Limited greenway access exists from the southern portion of the study area south towards the Willamette Falls Locks.
6. Boating and water-related recreational activities can be located north of the Oregon City Bridge.

5.0 CONCEPT DESIGN

The concept design which emerged from the study proposes that the property should be developed in a combination of private and public activities to create a West Linn Civic Center. Individual private and public buildings, 1-3 stories in height, would be clustered around the bridgehead to develop a strong civic image and sense of arrival into the City of West Linn. The river's edge would be reserved for recreational activities, except in areas where there would be obvious conflicts with industrial activities.

The concept design responds to three major design constraints: 1) direct access into the study area is limited and awkward, 2) redevelopable parcels are long and narrow, and 3) any new development must provide adequate parking (4 spaces/1,000 sq.ft. of leasable space).

The study area is subdivided into two linear redevelopment parcels paralleling the river. Land south of the Oregon City bridgehead would be developed in a mixture of private offices oriented towards James River Mill and commercial/retail space related to City Hall. These two clusters are separate from one another due to their respective primary orientation. To best serve mill employees, a small office building and a credit union would be located in the southernmost segment of the parcel. To best support Civic activities, office and retail space would located adjacent to City Hall and the bridge. Parking to jointly serve private and public activities would located between the two clusters; a two-level garage would directly serve James River mill employees. As an alternative, all commercial lease space, including that relating to James River, would be located at the bridgehead. In this alternative, all parking would be located on surface lots.

Land to the north of the bridgehead would be privately redeveloped for offices, retail, and restaurants. In the area closest to the bridge and oriented towards Highway 43, new office buildings would be combined with an existing structure to develop a strong edge to the civic center. A separate cluster of offices and retail space would be developed in the segment closest to the I-205 bridgehead. Parking would be located on the interior of the parcel to equally serve both ends. Ultimately, this surface lot could be redeveloped as a two level parking garage to support a higher level of commercial development north of the bridgehead.

The total amount of development proposed was determined by two major factors: a) market demand for commercial space and b) design objectives to minimize development expenses by restricting parking to surface lots.

MLPLUS1\WESTLINN.WP

APPENDIX E
EXPLANATION OF CALCULATIONS AND ASSUMPTIONS USED IN THE PRO FORMA FINANCIAL ANALYSIS

We developed a computer spreadsheet (which we refer to as a "template" since it gives a financial analyst a structure for entering data and evaluating results) to conduct the pro forma financial analysis required for this project. We used software called "SuperCalc 4," very similar to "Lotus 1-2-3" and whose spreadsheets are convertible to Lotus format.

In this appendix we describe how the template performs its calculations and the financial assumptions that drive both the form of the calcualtion and the values that are used as input to the calculation. The headings for each section of this appendix are identical to those found on the pro forma we present in Chapter 5.

FINANCING ASSUMPTIONS

This section allows the analyst to specify the terms of both the construction line of credit and the mortgage loan.

CONSTRUCTION LINE OF CREDIT:

The template assumes that the developer will obtain a bank line of credit for construction. He will draw equal monthly amounts against this line, the total of which equals: (direct construction costs + indirect construction costs - interest) times the loan/cost ratio specified. The developer will make no payment until after construction is completed; he will then pay the entire balance including the accumulated interest.

We assumed that the line of credit would carry an 11% interest (1.5 points above prime), a 1.5% origination fee, and would cover 75% of construction costs. We expect that construction will last 24 months.

MORTGAGE LOAN:

Upon completion of construction, the developer will obtain a mortgage loan for the amount of total development costs times the specified loan/cost ratio, plus the resulting origination fee times the loan/cost ratio (the origination fee for the loan is rolled back into the cost base on which the loan is calculated). The origination fee is included in the first year's interest expense. Note that if the loan is for a period less than 30 years (loans for commercial projects are typically amortized over 25-30 years but are truncated with a balloon payment at the end of 10-15 years), all payments but the last would be calculated on the basis of a 25- to 30-year amortization.

We assume an interest rate of 10.5% (2.5 points above 5-year treasury bonds), a 1.25% origination fee, and a loan/cost ratio of 75%.

DEVELOPMENT SECTION

ACQUISITION COSTS:

This section is straightforward with entries for land and other acquisition costs. For this project, the other acquisition costs are the costs of building James River a new parking structure in return for part of the land.

DIRECT CONSTRUCTION COSTS:

The following entries are used to calculate direct construction costs:

Clearing, demolition, and earthwork
Parking, lighting, and landscaping
Utilities
Utility relocation
Buildings:
    gross building area and construction cost
    per square foot for each building
System development and hookup
Contingency fund @ ___%

The basis for the estimates of direct construction costs are documented in memoranda from Tom Giesen and Cooper Engineering, which are included in this report. In our basecase run we assumed that the project would be developed privately, with no incentives from the city. In subsequent runs we relaxed this assumption to see what would happen if the city reduced private development costs by writing-down the cost of the land, waiving hook-up charges, financing utilities with tax increment financing, and so on.

The template then calculates total direct construction costs, total square footage, and cost per square foot.

INDIRECT CONSTRUCTION COSTS:

The following entries are used to calculate indirect construction costs:

Architect/engineer @ ___% of building costs
Legal/accounting @ ___% of direct costs
Marketing/leasing @ ___% of 1st-year GEI
    (gross effective income)

We used 6.5% for architect/engineering costs as suggested by Tom Giesen and 0.5% for legal/accounting costs as suggested by GFA. We used 5% of the first year's GEI for those buildings currently without identified tenants (we do not expect to need a leasing agent for the credit union, James River's building, or City

offices). Leasing agents' fees after the first year are counted as operating expenses.

At this point, the template calculates the total amount to be drawn against the developer's line of credit, the origination fee, and the interest due at the end of construction. It also calculates total indirect costs, indirect costs per square foot, total development costs (the sum of acquisition, direct, and indirect costs), and total development costs per square foot.

OPERATIONS SECTION

ANNUAL RENTAL INCOME:

Here the analyst specifies the gross leasable area (GLA), the rent per square foot, and whether the rent is triple-net or full-service for each building. The template then calculates gross potential income (GPI is what income would be with no vacancy) and GPI per square foot of GLA. An adjustment for expected vacancy is allowed. If the analyst expects different vacancy rates in buildings with different rents, the entry should be a rent-weighted average. Gross effective income (GEI is GPI adjusted for expected vacancy) and GEI per square foot of GLA are then calculated as are total square footages of full-service and triple-net areas.

Estimates of rents are our own. We verified their reasonableness by comparing them to comparable rents in the area as reported by Grubb & Ellis. We assumed that all of the building area will be leasable (since the common areas are outdoors) and that a rent-weighted average of 5% will be vacant. This vacancy rate is lower than that generally experienced in the Portland area because three of the buildings will have no vacancy (James River's offices, the credit union, and the City offices).

ANNUAL OPERATING EXPENSES:

Entries for cost per square foot and applicable square footages are allowed for the following operating expenses:

Building utilities
Housekeeping
Property taxes
Insurance
Outdoor utilities
Maintenance
Management
Leasing
Other

We excluded the areas identified as retail or restaurant from the calculation of building utilities, housekeeping, property tax, and insurance costs because we assume that retail tenants will sign triple-net leases.

We relied on estimates of operating costs from various sources including local developers, realtors, and the Urban Land Institute. We estimated property taxes based on the actual tax rate in West Linn (27.77) and an anticipated assessed value of $7 million. Leasing fees are removed from operating expenses for the first year's analysis in the pro-formas because the first year's fees are counted as development costs.

Total operating expenses are calculated from these. The template also calculates the amount of the mortgage loan and the annual payment amount (principal and interest).

BEFORE-TAX PRO-FORMA EVALUATION

This section relies heavily on calculations made in the next section, the after-tax pro-forma. It compares expected yearly vacancies entered in the after-tax section to the expected vacancy specified in the operations section and identifies the first year of stable operation. It then draws the appropriate inflation-adjusted estimates of income and expenses from that year's column in the after-tax section and calculates net operating income (NOI) and net spendable income (NSI). NOI is GEI minus operating expenses and NSI is NOI minus debt service (principal and interest).

The following evaluation ratios are presented:

Return on Investment (ROI)
Return on Equity (ROE)
Debt Coverage Ratio (DCR)
Default Ratio

where:

Return on investment = (NOI)/(total development costs)
Return on equity = (NSI)/(equity amount)
Debt coverage ratio = (NOI)/(debt service)
Default ratio = (operating expenses + debt service)/(GEI)

The analyst enters minimum (or in the case of the default ratio, maximum) acceptable ratios and the template reports whether the project passes or fails each test. ROI and DCR are of interest to the lender. They measure the overall profitability of the project and the availability of cash to cover mortgage payments respectively. Return on equity measures the developer's cash return on his cash investment and the default ratio measures the availability of cash to cover both expenses and mortgage payments.

AFTER-TAX PRO-FORMA EVALUATION

This section allows the analyst to specify depreciation life (normally 31.5 years on a commercial building), the developer's federal and state tax rates (normally 34% and 9%), and the expected annual rate of inflation (we used 4%). The remainder of the pro-forma is then divided into six columns, one for each of the first six years of operation. Expected vacancies are entered for each of the first five years; the sixth always equals that specified in the operations section.

The template then calculates cash inflow (GEI adjusted for vacancy and inflation), operating expenses (adjusted for inflation), interest expense, taxes (tax calculations use depreciation expense which is calculated in hidden cells above operating expenses), payments to principal, cash outflow (expenses other than depreciation plus payments to principal), net cash (cash inflow minus cash outflow), the remaining loan balance, and the developer's equity investment. It then calculates each of the four evaluation ratios for each year's operation using after-tax figures.

The after-tax calculations assume that the developer has sufficient taxable income from other sources that net losses on the project being evaluated will result in tax savings.

APPENDIX F
DOCUMENTATION OF ESTIMATES OF CONSTRUCTION COSTS

COOPER CONSULTANTS, INC.
ENGINEERING/PLANNING/CONSTRUCTION SERVICES
11675 S.W. 66th AVENUE • PORTLAND, OREGON 97223 • (503) 639-4914

79987

June 28, 1988

ECO Northwest
1020 SW Taylor, Suite 840
Portland, Oregon 97205

Attention : Terry Moore

Re: West Linn Waterfront

Dear Terry:

Enclosed is a preliminary construction estimate for the parking and utility improvements required for the construction of the City of West Linn Waterfront project as shown by the preliminary site plan dated 6/8/88 (Exhibit A).

Per our earlier discussion, it has been assumed that the relocation of Portland Avenue (Hwy 43), I-205 Interchange, Willamette Falls Drive and utilities connected with the relocation are not part of this estimate. It is also assumed that the purchase price of the properties will include the removal of structures and that the area to be developed will be under one ownership in the two parcels ready for development.

Relocation of Portland Avenue (Hwy 43), I-205 Interchange and Willamette Drive will require the relocation of virtually all the existing utilities within the triangle formed by Willamette Falls Drive, I-205 and Portland Avenue. Depending upon the agreements, the cost for the relocation may be at the cost of the agency requesting the relocation or borne by the respective utility. No estimate has been made for the relocation of streets and utilities shown by exhibit A. Also not included in this estimate are the cost for relocation of the James River access to lower level parking and expanded upper level parking lot.

SITE PLAN

The proposed site plan is composed of two parcels totaling 9.7 Acres. There are two parking lots for 275 cars and 6 building complexes. Costs for the site improvements have been segregated into the following categories: Street Improvements, Sidewalks, Landscape and Irrigation, Parking lot, Utilities, Utility Relocation and Site preparation.

Street Improvements

Pickens Street is now located along the new route for the entrance to the James River plant. The street would be approximately 650 feet in length and 36 feet wide, with street lights, curb, storm sewer and sidewalks on at least one side. Sanitary sewer and water already exist along the alignment. The cost for the improvement will depend greatly upon the elevation established for the intersection. The street would typically cost $200 per foot. If the cuts or fills are significant the cost could be as much as $300 per foot. For the purpose of this estimate $250 per foot was used.

Sidewalks

A total of 4,000 square yards have been estimated for the sidewalks within the parking and building areas. The area could be reduced, but would effect the character of the plan. The estimated unit cost is typically within a range of 10 percent.

Landscape and Irrigation

The area with the dot pattern and the islands are planned for landscaping. All of the area would need to have irrigation. Costs vary from $1.40 to $2.00 per square foot depending upon the quality level of landscaping desired. For the purposes of this estimate, $1.75 per square foot was used.

Parking Lot

The parking lot improvements include the pavement, lighting, signs, pavement markings, curbs and storm sewer system. Site preparation has been estimated separately. The quantities have been estimated from the plan and the prices are those typically of the Portland area.

Utilities

Connection to the public facilities (sanitary sewer, water, and storm sewer) have been estimated for each of the buildings. The estimated cost is for construction to connect to the main facility. The connection fees have not been included and are usually part of the building fees. Also not included are the costs that may be required for the connection of telephone, electrical and gas utilities.

Utility Relocations

Several utilities will require relocation based upon the conflicts in the plan view. Other conflicts are also possible in the vertical plain, which will not become apparent until the elevations have been established. Potential conflicts noted in the plan are as follows:

The poles for the power transmission line along the new access to James River plant may require relocation. The extent of the relocation will depend upon the final selected road location. The flexibility of the road alignment is limited; however, if relocation of the pole can be eliminated it should be evaluated. The power line is also in conflict with Building No. 1. This conflict may not exist after the relocation of the utilities. Relocation could cost nothing to several hundred thousand. $50,000 has been allocated for the purpose of this estimate.

Building No. 2 is located between an existing storm sewer on the south and two sanitary sewers on the north. Relocation of the utility or adjustments in the site plan may be required but are not expected at this time. No cost has been included.

Building No. 1 is located over a sanitary sewer that may not be required after the relocation of the streets has been accomplished. The system would need to be removed from under the building and may be used for the connection to the main.

Building No. 5 is located over a 10" waterline and 18" storm line. The 10" waterline should be relocated during the relocation of the highway. The storm line may or may not be relocated. For the purposes of this estimate we have assumed that the waterline will be relocated with the highway reconstruction and the storm line will be relocated during the development of the site.

Building No. 4 is also in conflict with the above-described 18" storm sewer and a 10" sanitary sewer which may not be required after the relocation of the highway. Removal of the system would be required within the site.

South Parking Lot - The fire hydrants in the south parking lot will require relocation. The water mains are shallow and there exists the possibility that conflicts may occur with

future grades and water system. The existing storm sewer system will be abandon. No estimate has been made for the removal of power pole and systems to be abandon within the parking area.

Site Preparation

The cost for preparing the site for the facilities shown in Exhibit A will vary greatly upon the condition of the north parking lot after street alignment occurs. It is assumed that the asphalt and utilities not required will have been removed. The south parking lot would not change in condition from its current status, except for the removal of salvaged utilities. The work expected for site preparation is excavation, clearing and grubbing. For the purpose of this estimate $2.00 per square yard was used. It could be considerably higher depending on the elevations established and rock excavation required. The least amount expected would be $1.00 per square yard with little to no excavation.

The total estimated cost for the above-described work is $678,000. Because of the preliminary nature of the plans a contingency of approximately 15 percent should be added for a total estimated cost of $ 780,000.

In your memorandum of June 7th, you requested that the cost estimate be a product that could stand alone. Given the exceptions and lack of coordination with the other estimates for form, etc., you will most likely want to produce this information in a standard format combining all of the input you have received. If you have any questions or if I can be of further assistance, please call.

Sincerely,

COOPER CONSULTANTS, INC.

Keith C. Thompson, P.E.
Senior Engineer

COST ESTIMATE

COST ESTIMATE
WATERFRONT
CITY OF WEST LINN

PICKENS STREET

Length 650', 36' wide with curbs and sidewalk on both sides. Storm sewer consisting of 350' of 12" storm drain, two manholes and 3 catch basins.

650' at $250/ft =	$130,000
SIDEWALK	
4,000 SY @ $12.00/SY =	$48,000
LANDSCAPE AND IRRIGATION	
40,000 SQ FT @ $1.75/ SQ FT =	$70,000
PARKING LOT	
Pavement - 135,000 S.F @ $1.30 /S.F.=	$175,500
Lighting - 9 lights @ $1500 Ea =	$13,500
1400' @ $5.00/ ft =	$7,000
Signs	$5,000
Pavement Markings	$4,000
Curbs - 5,000' @ 2.50/ ft =	$12,500
Storm Sewer - 14 CB @ $300 Ea =	$4,200
1300' 12" CSP @ $20.00 =	$26,000
UTILITIES	
Sanitary sewer connection	
280 ' @ $15.00/ft =	$4,200
Water connection	
460' @ $10.00 /ft	$4,600
10 meters @ $500 Ea =	$5,000
UTILITY RELOCATION	
Power Transmission	$50,000
Building No. 1/ Sanitary sewer	$3,000
18" Storm sewer - 350' @ $30/ft =	$10,500
10" Sanitary removal	$5,000
Fire hydrant relocations - 3 @ $1,500 Ea =	$6,000
SITE PREPARATION	
47,000 SY @ $2.00/ SY =	$94,000
SUBTOTAL	$678,000
CONTINGENCY	$102,000
TOTAL	$780,000

Tom Giesen Consultant, Inc.
One East Broadway Mall Walk
Eugene, Oregon 97401
(503) 485-1382

Job: West Linn
Client: ECO
Job #: 88064

MEMORANDUM

TO: ECO / Attn: Terry Moore

FROM: Tom Giesen

DATE: 07/08/88

REGARDING: Cost Estimate
Buildings
West Linn Waterfront Project

Attached you will find:

1 Summary of Building Costs;

2 Square Foot Cost Analysis.

The first of these documents applies square foot costs to the areas shown for various buildings and building types on the drawings of the project furnished to us.

The second of these shows the development of these square foot costs from the source I chose, the Marshall Valuation Service.

Note that the Marshall Valuation Service states that AE fees are included in their square foot costs. I have not found this to be so, and I have accordingly added these fees. In reality, this is probably an additional geographical adjustment.

Note also that other costs often are associated with building projects. I assume that you and your other subcontractors will estimate these costs and add them to total project costs.

The retail and rental spaces estimated here are bare, and do not include allowances for tenant-specific fixtures and equipment. The costs DO include tenant improvements (wall, ceiling, floor finish allowances, etc.) at an allowance of about $6.00/sf.

Should multi-level parking become an option, please make an allowance of $18-$25/sf (cost varies with design) for all square feet - at grade and above. See the attached page from MVS.

The costs/sf I have developed are applicable to structures of one or two stories without change. This is noted on the MVS pages under the heading "Multistory Buildings."

Demolition of one building is required (the building at the edge of the bluff and very near Highway 43) and an allowance for this

work would be: 9600 sf @ $2.25/sf, or $21,600.

It is important to note that, while my figures appear to be exact, they in fact are not at all exact, as the information on which they are based is inexact, as it must be at this point. Please understand that a range of +4% and -4% is intended.

Please call with any questions you may have.

Tom Giesen

Tom Giesen Consultant, Inc.
Four Seventeen North A
Springfield, OR 97477
(503) 747-2570

Job: West Linn
Client: ECO
Job #: 88064
Date: 07/08/88

SUMMARY OF BUILDING COSTS

#	Building & Foundation Condition:	Area	Cost/SF	Total
1	Credit Union / Normal	4,000	$64.97	$259,880
2	JR Office / Special Foundation	10,000	$63.44	$634,400
3	Gov. Office / Normal	11,000	$59.44	$653,840
4	Office / Special Foundation	20,000	$63.44	$1,268,800
5	Retail / Normal	15,000	$37.48	$562,200
6	Retail/Rest. Special Foundation	15,000	$41.48	$622,200
7	Convience Store / Normal	10,000	$44.13	$441,300
	Subtotal	85,000		$4,442,620
	AE Fees @ 6.5%			$288,770
	Contingency @ 10%			$473,139
	Total			$5,204,529
	Average Cost/SF (Complete)	$61.23		

Tom Giesen Consultant, Inc.
One East Broadway Mall Walk
Eugene, Oregon 97401
(503) 485-1382

Job: West Linn
Client: ECO
Job #: 88064
Date: 07/08/88

SQUARE FOOT COST ANALYSIS

DISCUSSION OF THE PROCESS:

What follows is the development of costs/square foot related to the components of the West Linn Waterfront Project.

In general, this process depends on compilations of costs/ square foot for other, previously built similar buildings. These costs are for buildings with no particular problems as regards, for example, foundations - and reflect no other special requirements. These costs are for a mythical geographical location, and in other ways are generic costs. Thus they must be adjusted to West Linn and to the special characteristics of the site and designs being proposed.

- -

SOURCES:

The source for the following is the Marshall Valuation Service, currently updated, although the source could as well be other square foot cost guides or replacement cost guides, as the costs for this kind of work are well known and documented. Although the specific source in this instance for the costs shown is MVS, this firm's experience confirms the range of costs shown for buildings of this type in the Portland area.

LEVELS OF QUALITY / DESIGN FEATURES:

We have assumed that reasonably typical commercial structures would be built, and exceptions to that are noted below. Descriptive material from MVS is included.

SQUARE FOOT COST ANALYSIS:

OFFICE & GOVERNMENT OFFICE SPACE:

Marshall Valuation Service
Section 15 Page 18 (Pages are attached)

Refer to description in MVS. Use 1 times "average" costs, and 3 times "good" costs, to reflect what I feel might be built.

ASSUME WOOD FRAME CONSTRUCTION.

		Cost/sf	Mult.	Total
Good cost / sf		$57.12	3	$171.36
Average cost / sf		$45.33	1	$45.33
(base cost	= $40.83			
elev.	= $ 1.50			
cooling	= $ 3.00)			
Average				$54.17
Adjust using MVS multipliers:				
Local (Portland, Oregon)		1.01		
Current (April 1988)		1.02		
Story Height (12' floor/floor)		1.00		
Area/Perimeter		0.98		
Total multiplier:		1.01		1.01
Adjusted Cost / SF				$54.69
Other Additions:				
Add fire sprinklers				$1.25
Add for wiring for automation:				$0.50
Add for special lighting for CRTs:				$1.00
Add for rock removal @ fdn:				$2.00
Total with Additions:				$59.44
If siting requires cantilever/extended fdn, add:				$4.00
Total for special foundations:				$63.44

FOR BUILDING CONSTRUCTION ONLY

CREDIT UNION COSTS/SF

Section 15 Page 26 (Pages are attached)

	Cost/sf	Mult.	Total
Average cost / sf	$63.06	1	$63.06
Average			$63.06
Adjust using MVS multipliers:			
Local (Portland, Oregon)	1.01		
Current (April 1988)	1.02		
Story Height (12' floor/floor)	1.00		
Area/Perimeter	0.95		
Total multiplier:	0.98		0.98
Adjusted cost/sf			$61.72
Other Additions			
Add for rock removal @ fdn.:			$2.00
Add fire sprinklers			$1.25
Total cost per square foot:			$64.97
FOR BUILDING CONSTRUCTION ONLY			=========

RETAIL - RETAIL/RESTAURANT COSTS/SF

Section 13 Page 18 (Pages are attached)

NOTE: I have used the costs for a Neighborhood Shopping Center for the mix of retail and restaurant planned.

	Cost/sf	Mult.	Total
Average Neighborhood SC	$34.95	1	$34.95
Adjust using MVS multipliers:			
Local (Portland, Oregon)	1.01		
Current (April 1988)	1.01		
Story Height (12' floor/floor)	1.00		
Area/Perimeter	0.96		
Total multiplier:	0.98		0.98
Adjusted cost/sf			$34.23
Other Additions:			
Add for fire sprinklers			$1.25
Add for rock removal @ fdn:			$2.00
Total with Additions:			$37.48
If siting requires cantilever/extended fdn, add:			$4.00
Total for special foundations:			$41.48

FOR BUILDING CONSTRUCTION ONLY

NOTE: This shopping center cost does not include trade fixtures and equipment pertinent to individual tenants, such as kitchen equipment or display counters.

CONVENIENCE STORE COSTS/SF

Section 13 Page 13 (Pages are attached)

	Cost/sf	Mult.	Total
Good Convenience Store	$41.74	1	$41.74
Adjust using MVS multipliers:			
Local (Portland, Oregon)	1.01		
Current (April 1988)	1.01		
Story Height (12' floor/floor)	1.00		
Area/Perimeter	0.96		
Total multiplier:	0.98		0.98
Adjusted cost/sf			$40.88
Other Additions:			
Add for fire sprinklers			$1.25
Add for rock removal @ fdn:			$2.00
Total with Additions:			$44.13

FOR BUILDING CONSTRUCTION ONLY

NOTE: This store cost does not include trade fixtures and equipment pertinent to the tenant, but does include walk-in freezer and cooler.

APPENDIX G
PUBLIC FINANCING ALTERNATIVES

Government Finance Associates, Inc.

1300 S.W. 5th Avenue, Suite 2929
Portland, Oregon 97201
503/222-1405

MEMORANDUM

TO: Terry Moore, ECO NW

FROM: Rebecca Marshall, GFA

RE: **WEST LINN: PUBLIC FINANCING ALTERNATIVES**

DATE: July 27, 1988

You asked me to comment on standard financial techniques the city might use to improve the financial performance of the waterfront project. The following lists the typical options. (I discussed some of these briefly with Harvey Rogers, bond counsel at Lindsay Hart. He has not reviewed this memo.) Since GFA is not a legal firm, we encourage the city to seek advice of counsel to determine what authority the city may have to proceed with any financial assistance and also to determine the restrictions or limitations, if any.

1. CITY BORROWING OPTIONS

   A. Tax Exempt Options

      Federal law restricts the purposes for which cities may borrow on a tax-exempt basis. The primary determinant is who benefits: if the private sector or an individual benefits, then the borrowing is considered to be for "private activities" and may not be tax-exempt unless the use is listed as an "exempt facility" such as airports, mass commuting facilities, sewage and solid waste disposal, etc. If the primary beneficiary is a municipal entity, such as the city, then the borrowing is considered to be for a "governmental purpose" and may be tax-exempt.

      Generally, cities may issue tax-exempt bonds (General Obligation, tax increment bonds, Bancroft bonds) for infrastructure purposes. Cities may not issue tax-exempt bonds to build facilities which would then be leased to private commercial or industrial entities. Parking can be financed on a tax-exempt basis provided that the spaces are available to the general public, and not reserved solely for special use.

1) General Obligation bonds require an election to authorize their issuance. Regardless of the vote, General Obligation bonds may not be used for "private activity" purposes.

2) Bancroft bonds do not require an election, but must be repaid from assessments levied against the benefitted parties. Since the interest rates are tax exempt and the term is typically up to 20 years, these bonds could be used to reduce the cost of the infrastructure for the waterfront project with the owner/developer paying the assessments to retire the bonds.

3) Tax increment bonds, which are retired from the increment collected within an urban renewal area, may be issued. The increment is generated from the growth in assessed valuation over the base value which is frozen when the urban renewal area is established.

   For those projects which are typical infrastructure (streets, sidewalks, streetscape, sewers, street lighting, etc.) or public facilities (city hall, etc.) these bonds would be considered "governmental purpose."

   All other purposes would be taxable except the following, which would qualify as a tax-exempt "qualified redevelopment" purposes ("private activity"):

   a) acquisition of real property

   b) clearing and preparation "for redevelopment" of land which was acquired.

   c) rehabilitation of real property which was acquired

   d) relocation of occupants of real property which was acquired.

   Up to 25% of the borrowing may be used for food and beverage services and other certain purposes. No proceeds can be used for liquor sales, suntan or hottub facilities.

The tax increment is generated as the result of development appearing on the assessment role. Therefore, some development must have already occurred in the designated urban renewal area (after its assessed valuation is frozen) or is certain to occur soon so there will be increment to retire the borrowing.

An urban renewal area should be established prior to commencing the waterfront project, even if tax increment bonds are not contemplated. The increment resulting from the project can be used to offset the annual debt service requirements for other types of borrowings, to assist in loan repayments or to further develop the area.

B. Taxable Borrowing by the City

The city can borrow on a taxable basis; however, the municipal taxable market is not well developed for issues under $50,000,000. Interest rates will be substantially higher than for comparable tax-exempt issues (2-4%) but the term of the borrowing may be longer than conventional bank financing.

If the borrowing is reloaned out to the developer, the borrowing cost will be determined according to the credit standing of the developer. If the borrowing is solely secured by the lease payments from tenants, the borrowing will be determined according to the credit standing of the tenants. If the city is willing to secure the borrowing with any of its own funds (ask counsel for authority to use funds for this purpose), then the cost to borrow will reflect the nature and quantity of funds available to secure the borrowing.

2. REVOLVING LOAN FUND

Some cities have used Community Development Block Grants to fund a revolving loan fund to small businesses. Revolving loan funds can be established using available city funds and then lent to developers or tenants at terms and conditions more favorable than conventional financing. Local counsel should advise regarding the authority to lend and which funds might be so utilized.

3. WAIVER OF TAXES OR CHARGES

Since the city has the authority to set its own fees and charges for services, the city can offer discounts or waivers on its fees. Local counsel should advise whether the city could defer or exempt any of its portion of the property tax levy, but state law does provide that commercial facilities under construction can be exempted from taxation for up to two years. (ORS 307.330 attached)

If the city has significant System Development Charges, these could be waived or deferred.

If the office space is leased to a municipal corporation, it should then be exempt from property taxes.

4. STATE ASSISTANCE

The Department of Economic Development has a number of programs, including the lottery, to assist in economic development projects. It is beyond the scope of this report to survey possible grants or loans or tax credits.

5. PARKING OPTIONS

The city may utilize tax-exempt options for parking facilities provided that the spaces are available to the general public and not specially allocated or leased. The city may use:

* General Obligation bonds (voter approved),

* Bancroft bonds (paid by assessments levied against the property perceived to benefit from the parking facility - see ORS 223.805-223.845 attached), or

* Parking revenue bonds (paid solely from the fees and charges of the parking garage.)

  If revenue bonds are contemplated, a feasibility study would be required to determine that the fees and charges, projected over the life of the bonds, would exceed the debt service on the bonds. The study would also examine whether the required fee structure would be affordable and feasible for the area.

exemption otherwise allowable under ORS 307.250 shall terminate and not be allowed on the assessment and tax rolls:

(1) If the veteran, veteran's spouse or surviving spouse sells or contracts to sell the property designated for the exemption, and the veteran, veteran's spouse or surviving spouse owns no other property to which the exemption may apply.

(2) If the veteran dies without leaving a surviving spouse or a minor child.

(3) If the surviving spouse of a veteran dies without leaving a minor child.

(4) If the surviving spouse of a veteran remarries. [1981 c.530 §2; 1982 s.s.1 c.33 §5]

307.290 [Repealed by 1977 c.113 §2]

307.300 Homesteads of unmarried surviving spouses of veterans of Civil War or Spanish War. The surviving spouse remaining unmarried of any honorably discharged veteran of the Civil War or the Spanish War, who is pensioned and actually resides in a homestead, is entitled to an exemption of $2,000 of the taxable value of such homestead, in addition to the exemption from taxes on real property otherwise provided by law for such surviving spouse. [Amended by 1967 c.293 §31; 1981 c.530 §6]

307.310 [Renumbered 307.035]

(Deciduous Plants; Agricultural Products)

307.315 Nursery stock. Nursery stock, as defined in ORS 571.005 (5), whether bare root, or whether balled or heeled or growing in containers in or upon the ground, is exempt from ad valorem taxation in the hands of the grower or wholesalers. [1971 c.285 §2; 1979 c.692 §1]

307.320 Deciduous trees, shrubs, plants and crops growing on agricultural land. The value of any deciduous trees, shrubs, plants or crops, whether annual or perennial, and any cultured Christmas trees, as defined in ORS 215.203, growing upon agricultural land devoted to agricultural purposes, shall be exempt from assessment and taxation and shall not be deemed real property under the provisions of ORS 307.010. [1957 c.615 §1; 1983 c.657 §4; 1985 c.565 §53]

307.325 Agricultural products in possession of farmer. (1) The items of personal property described in subsection (2) of this section which, on the assessment date, are owned and in the actual or constructive possession of the farmer who produced them or who has procured them for use or consumption in the farm operations of the farmer, shall be exempt from taxation.

(2) The items referred to in subsection (1) of this section are as follows:

(a) Grain.

(b) Seed.

(c) Hay.

(d) Fruit.

(e) Vegetables.

(f) Nuts.

(g) Hops.

(h) Wool.

(i) Fish.

(j) Poultry held primarily for sale for human consumption.

(k) Butter, cheese and evaporated, condensed or concentrated milk.

(L) Mint.

(m) Bi-valve mollusks. [1965 c.429 §2; 1979 c.692 §2; 1987 c.691 §1]

(Commercial Facilities Under Construction)

307.330 Commercial facilities under construction. (1) Except for property centrally assessed by the Department of Revenue, each new building or structure or addition to an existing building or structure is exempt from taxation for each year of not more than two consecutive years if the building, structure or addition:

(a) Is in the process of construction on January 1;

(b) Is not in use or occupancy on January 1;

(c) Has not been in use or occupancy at any time prior to such January 1 date;

(d) Is being constructed in furtherance of the production of income; and

(e) Is, in the case of nonmanufacturing facilities, to be first used or occupied not less than one year from the time construction commences. Construction shall not be deemed to have commenced until after demolition, if any, is completed.

(2) If the property otherwise qualifies for exemption under this section and ORS 307.340, the exemption shall likewise apply to any machinery or equipment located at the construction site which is or will be installed in or affixed to such building, structure or addition. [1959 c.246 §1; 1961 c.552 §1; 1971 c.284 §1]

307.340 Necessity of filing proof to secure exemption under ORS 307.330; abatement. The property described in ORS

307.330 shall be listed for ad valorem taxation, but the assessor shall cancel the assessment upon receipt of sufficient documentary proof that the property meets all of the conditions contained in ORS 307.330. Such proof shall be filed with the assessor on or before April 1 of such year. No cancellation of assessment shall be made unless the required proof is filed within the time prescribed by this section. Any cancellation of assessment will be abated as to any nonmanufacturing property that is used or occupied within one year from the time construction commences and the assessor shall proceed to correct the assessment and tax roll or rolls from which the property was omitted from taxation, in the manner provided in ORS 311.207 to 311.213. [1959 c.246 §2; 1967 c.51 §2; 1971 c.284 §2]

307.345 [1965 c.615 §19; 1969 c.493 §78; repealed by 1971 c.747 §21]

307.347 [1965 c.615 §16; repealed by 1971 c.747 §21]

307.350 [1963 c.569 §3; 1963 s.s. c.4 §2; 1965 c.615 §22; 1969 c.578 §1; repealed by 1971 c.747 §21]

307.355 [1963 c.569 §2; 1963 s.s. c.4 §1; repealed by 1965 c.615 §27]

307.356 [1965 c.615 §17; repealed by 1971 c.747 §21]

307.360 [1963 c.569 §4; 1965 c.615 §23; 1969 c.562 §2; repealed by 1971 c.747 §21]

307.362 [1965 c.615 §18; repealed by 1971 c.747 §21]

307.365 [1963 c.569 §5; repealed by 1971 c.747 §21]

307.366 [1969 c.562 §3; repealed by 1971 c.747 §21]

(Nonprofit Homes for Elderly)

307.370 Property of nonprofit homes for elderly; limitation on lessee. (1) In aid of veterans tax exemptions, subject to the conditions prescribed in ORS 307.370 to 307.385 and 308.490, there shall be exempt from taxation the personal property and a portion of the real property computed as provided in ORS 307.380, owned or being purchased under a contract by a corporation described in ORS 307.375 which is actually and exclusively occupied and used in the operation of a nonprofit home for elderly persons.

(2) For the purposes of subsection (1) of this section, a corporation which is described in ORS 307.375 which has only a leasehold interest in a nonprofit home for elderly persons operated by it is deemed to be a purchaser of the property if the operating lessee is specifically obligated by its contract of lease to pay the ad valorem taxes on the real and personal property used in the operation of the home. [1969 c.587 §2; 1974 s.s. c.54 §1; 1975 c.780 §17]

307.375 Type of corporation to which exemption under ORS 307.370 applicable. The exemption provided in ORS 307.370 may be permitted only as to a corporation organized and operated only for the purpose of furnishing permanent residential, recreational and social facilities primarily for elderly persons, that:

(1) Is organized not for profit, pursuant to ORS chapter 61 or any statute repealed by chapter 580, Oregon Laws 1959;

(2) Receives not less than 95 percent of its operating gross income, excluding any investment income, solely from payments for living, medical, recreational and social services and facilities, paid by or on behalf of elderly persons using the facilities of such corporation;

(3) Permits no part of its net earnings to inure to the benefit of any private stockholder or individual; and

(4) Provides in its articles or other governing instrument that, upon dissolution, the assets remaining after satisfying all lawful debts and liabilities shall be distributed to one or more corporations exempt from taxation under this chapter as corporations organized and operated exclusively for religious, charitable, scientific, literary or educational purposes, or to the State of Oregon. [1969 c.587 §3]

307.380 Necessity of filing claim to secure exemption under ORS 307.370. (1) Each corporation described in ORS 307.375, claiming the personal property tax exemption pursuant to ORS 307.370, shall file with the county assessor, on forms supplied by the assessor, a written claim therefor in duplicate on or before April 1 of each year in which the exemption is claimed, except that when the property designated is acquired after March 1 and before July 1, the claim for that year shall be filed within 30 days after the date of acquisition. If the claim for any year is not filed within the time specified, the exemption shall not be allowed on the assessment roll for that year. The claim shall be signed by the taxpayer subject to the penalties for false swearing.

(2)(a) Each corporation annually shall aid residents, who could qualify for property tax exemptions pursuant to ORS 307.250 to 307.300, if the living unit of such elderly person were the homestead of the person and owned in fee simple, to prepare applications in duplicate for property tax exemptions on behalf of the corporation, for the benefit of the elderly person as provided by ORS 307.370 to 307.385 and 308.490.

(b) The corporation shall determine the amount of assessed value that each resident of a nonprofit home who would have qualified for an

that are not paid to the city when due shall bear interest at the rate of seven percent per annum from the due date until paid to the city.

(5) Platted property of a cemetery authority subject to an assessment as provided in this section is exempt from execution for collection of any such assessment while such property is held by a cemetery authority for cemetery or crematory purposes. Any such assessment levied against a cemetery authority shall be payable only from the funds received for the sale of lots listed with the city as required by subsection (3) of this section. Except as provided in subsection (4) of this section, interest shall not be due on the unpaid balance of any such assessment. [1963 c.521 §§1, 2; 1969 c.531 §8]

223.785 Authority of city or district to issue special assessment improvement bonds; amount; conditions. In addition to the authority to issue general obligation improvement bonds under ORS 223.240, a city and a district, as defined in ORS 198.180, may issue special assessment improvement bonds and pledge as security therefor all or any part of the revenue from special assessments levied against property benefited by the improvement. Such bonds shall be payable, both as to principal and interest, from assessments only. Special assessment improvement bonds may be issued in an amount equal to the amount of unpaid application to pay assessments in instalments, plus an amount necessary to fund a reasonably required reserve fund, which fund shall not exceed 15 percent of the amount of unpaid applications to pay assessments in instalments. Applications to pay assessments in instalments and the bonds shall be subject to the same provisions and limitations as set forth in ORS 223.205 and 223.210 to 223.295. Special assessment improvement bonds shall contain a clause that both the principal and interest are payable solely from assessments levied against the benefited property. [1969 c.505 §1; 1983 c.349 §7; 1983 c.713 §1]

SPECIAL CITY IMPROVEMENTS; PARKING FACILITIES; STREETS; SIDEWALKS; AIDS TO WATER COMMERCE

223.805 Short title of ORS 223.805 to 223.845. ORS 223.805 to 223.845 shall be known as the Motor Vehicle Parking Facilities Act.

223.810 Establishment of motor vehicle parking facilities. Any incorporated city may establish one or more off-street motor vehicle parking facilities for the general use and benefit of the people of the city, or for one or more special classes of vehicles, as appears necessary, proper or beneficial in the public interest. For these purposes, the city may proceed as provided in ORS 223.815 to 223.845.

223.815 Acquisition of property for parking facilities. For the purposes of ORS 223.810, a city may acquire property at or below the surface of the earth, by purchase, condemnation, exchange or other lawful manner. However, a city may not so acquire privately owned property used for public parking unless the facility to be constructed by the city would substantially increase the number of vehicle off-street parking spaces available for public use. The city may use the area below the street surface or the area beneath the surface of a park or other public property. [Amended by 1959 c.653 §8; 1967 c.478 §1]

223.820 Planning, constructing and contracting for the operation of or leasing parking facilities. For the purposes of ORS 223.810, a city may:

(1) Plan, design and locate the parking facilities.

(2) Construct, alter, enlarge, repair and maintain buildings, structures, equipment, access and entrance facilities, exit facilities, fencing and other accessories necessary or desirable for the safety or convenience of motorists using the off-street parking facilities.

(3) Contract with any person, firm or corporation for construction or for operation of the parking facility upon such terms as are found to be in the public interest, after first advertising for bids therefor by publication not less than once a week for two consecutive weeks in a newspaper of general circulation in the city, making two publications in all.

(4) Lease for a period not exceeding 50 years, notwithstanding any conflicting provision of any law, city charter or ordinance, any property referred to in ORS 223.810 to any person, firm or corporation pursuant to an agreement, according to such terms as are found to be in the public interest, whereby such person, firm or corporation undertakes to construct, where necessary, or alter or repair, and maintain and operate on such property the buildings, structures, equipment, facilities and accessories necessary or convenient for parking facilities, and title to such building or structure to be constructed or altered shall vest in the city either when constructed or altered or at the termination of said lease. Such agreement shall be made only after first advertising for bids therefor by publication not less than once a week for two consecutive weeks in a newspaper of

general circulation in the city, making two publications in all. [Amended by 1953 c.668 §2]

223.825 Financing of parking facilities. For the purposes of ORS 223.810, a city may finance the parking facilities by any one or any combination of the following methods:

(1) General obligation bonds within the legal debt limitations, or revenue bonds payable primarily or solely out of revenue from parking facilities in such amounts, at such rate of interest, and upon such conditions as may be prescribed by the legislative authority of the city.

(2) Special or benefit assessments equal to the total cost of land and improvements, or a portion thereof, such assessment to be levied against property benefited in proportion to the benefit derived, the amount of such assessment to be determined in accordance with special assessment practices for local improvements as now or hereafter prescribed by the ordinances or charter provisions of the city.

(3) Parking fees, special charges or other revenue derived from the use of off-street parking facilities by motorists, lessees, concessionaires, commercial enterprises or others.

(4) General fund appropriations.

(5) State or federal grants or local aids.

(6) Parking meter revenues.

(7) General property taxes, or gift, bequest, devise, grant or otherwise.

(8) For any city under 300,000 according to the latest federal decennial census, a reasonable annual fee on the privilege of occupying real property within the city or a district of the city to carry on a business, occupation, profession or trade. In levying the fee, the governing body shall take into consideration the unmet off-street parking requirements of such business. The proceeds of the fee, less refunds and costs of collection, shall be used solely for the purposes of ORS 223.805 to 223.845. The fee is in addition to, and not in lieu of, any other tax, assessment or fee required by state or local law or ordinance. [Amended by 1959 c.653 §9; 1967 c.380 §1; 1969 c.380 §1]

223.830 Service concessions in parking facilities. For the purposes of ORS 223.810, a city may rent or lease to any individual, firm or corporation any portion of the premises established as an off-street parking facility for service concessions, commercial uses or otherwise, after first advertising for bids therefor by publication not less than once a week for two consecutive weeks in a newspaper of general circulation in the city, making two publications in all. [Amended by 1967 c.380 §2]

223.835 Fees and regulations of parking facilities. For the purposes of ORS 223.810, a city may:

(1) Charge such fees as the legislative authority of the city finds fair and reasonable for the privilege of using the off-street parking facilities. These fees need not be limited to the cost of operation and administration but may be for revenue.

(2) Regulate and restrict the use of the parking facilities or prohibit the use thereof for vehicles of more than a class or classes of vehicles and provide penalties for violation of such regulations or prohibitions.

223.840 Disposing of property acquired for parking facilities. For the purposes of ORS 223.810, a city may sell, encumber, lease, exchange or otherwise dispose of property and property rights acquired as may be found in the public interest.

223.845 Limitation on operation by city of parking facilities; disbursement of revenues. For the purposes of ORS 223.810, a city may operate a parking facility or lease the same under ORS 223.820, as the city may determine. In no event shall the city operate any service concessions. In case the city operates a parking facility, it may provide, and if revenue bonds are issued to finance the acquisition and construction of such facility it must provide, that the revenues derived from the operation of the facility shall be disbursed by the city for some or all of the following purposes:

(1) Payment of interest on and retirement of principal of bonds issued by the city for financing the acquisition or construction of such facility.

(2) Payment of the necessary costs and expenses of operating the facility.

(3) Creation and maintenance of a reserve account to make necessary replacements.

(4) Payment to the taxing bodies in lieu of taxes an amount equal to the ad valorem taxes that would be derived from the facility if under private ownership.

(5) Reimbursement of owners of real property for special assessments paid by them and levied against real property to finance the parking facility.

(6) Payment to the city of a fair return on its investment in the facility for the purpose of making additional parking and traffic improvements.

In case the revenues produce more than sufficient moneys than required for the matters mentioned

in subsections (1) to (6) of this section, then the governing body shall reduce the rates charged for the use of the facility. [Amended by 1959 c.653 §10]

223.849 [1957 c.430 §1; repealed by 1959 c.653 §12]

223.850 [Renumbered 223.880]

223.851 Special assessment for street lighting, street maintenance and street cleaning; approval by electors. When authorized at any properly called election, the governing body of a city may assess, levy and collect annual assessments upon any real property within its boundaries for street lighting, street maintenance and street cleaning services which benefit the property. [1983 c.234 §2]

223.852 [1957 c.430 §2; repealed by 1959 c.653 §12]

223.854 [1957 c.430 §3 repealed by 1959 c.653 §12]

223.855 [Renumbered 223.882]

223.856 Measure imposing assessments; contents. (1) A measure authorizing assessments under ORS 223.851 to 223.876 shall specify the services proposed to be financed by the assessments, the maximum amount which may be imposed and the number of years in which assessments will be made.

(2) Each assessment measure shall provide for the operation and maintenance of a single street lighting, street maintenance or street cleaning service. More than one measure may be submitted to the electors at a single election. Assessments for street lighting may include an amount sufficient to pay construction, reconstruction, modification and installation costs as well as operating and maintenance costs.

(3) The measure shall provide that assessments are in lieu of any existing serial ad valorem tax levy for the service to be provided. [1983 c.234 §3]

223.857 [1957 c.430 §4; repealed by 1959 c.653 §12]

223.859 [1957 c.430 §5; repealed by 1959 c.653 §12]

223.860 [Renumbered 223.884]

223.861 Basis of assessment. Assessments shall be based upon any reasonable basis of assessment related to services received by the assessed property for the period specified in the measure. [1983 c.234 §4]

223.862 [1957 c.430 §6; repealed by 1959 c.653 §12]

223.864 [1957 c.430 §7; repealed by 1959 c.653 §12]

223.865 [Renumbered 223.886]

223.866 Levy of assessment; manner of collection; effect of nonpayment. (1) The city each year shall estimate assessments needed and the amount of assessment for each tax account, and the amount thereof may be levied and returned to the officer whose duty it is to extend the ad valorem tax roll at the time required by law for taxes to be levied and returned.

(2) All assessments levied by the city shall become payable at the same time, may be collected by the same officer who collects ad valorem taxes and shall be turned over to the city according to law.

(3) The officer whose duty it is to extend the city levy may extend the levy of the city in the same manner as city taxes are extended.

(4) Property shall be subject to sale for the nonpayment of assessments levied by the city in like manner and with like effect as in the case of city taxes. [1983 c.234 §5]

223.867 [1957 c.430 §8; repealed by 1959 c.653 §12]

223.869 [1957 c.430 §9; repealed by 1959 c.653 §12]

223.870 [Renumbered 223.888]

223.871 Bancroft Bonding Act not applicable. ORS 223.205 and 223.210 to 223.295 do not apply to assessments under ORS 223.851 to 223.876. [1983 c.234 §6]

223.872 [1957 c.430 §10; repealed by 1959 c.653 §12]

223.874 [1957 c.430 §11; repealed by 1959 c.653 §12]

223.875 [Renumbered 223.900]

223.876 Charter authority not affected. ORS 223.851 to 223.876 are in addition to and not a limitation on authority a city may exercise under its charter. [1983 c.234 §7]

223.877 [1957 c.430 §12; repealed by 1959 c.653 §12]

223.879 [1957 c.430 §13; repealed by 1959 c.653 §12]

223.880 Public roads included in sidewalk improvement district; assessment on property benefited. Any incorporated city, in addition to powers granted by law or charter, may include in any sidewalk improvement district within the city all county roads or state highways or any part thereof which are located within the improvement district. It may cause to be built on the county roads or state highways or portions thereof within the improvement district, sidewalks for pedestrian travel, and may assess the cost thereof upon the property benefited thereby, in the manner provided by charter or law. [Formerly 223.850]

223.882 Acquisition of property by city to aid water commerce. In order to secure benefit from the United States Bonneville electrical and navigation project, all cities may purchase, acquire by condemnation, or lease, real property for the purpose of constructing thereon wharves, docks or other similiar structures, or

other aid to water-borne commerce, or for providing for sites for the location and operation of industrial or manufacturing plants or works thereon which will use the electrical energy developed by the Bonneville project and which would constitute feeders for docks, wharves or other aids of water-borne commerce. [Formerly 223.855]

223.884 Authority to take property within and without city limits. In carrying out the powers granted by ORS 223.882, cities are granted the right of eminent domain and the right to take private property for the public uses authorized by ORS 223.882. This power shall be exercised as provided by ORS chapter 35. Real property located without the corporate limits of the city, adjacent or contiguous to any of the boundary lines of the corporate limits of the city or within 10 miles of the boundary line of the corporate limits of any such city, may be acquired under the terms of this section. The determination of the council, commission of public docks, or other administrative body of the city having jurisdiction of its wharf or dock property that the acquiring of any particular real property is necessary to carry out the purposes of ORS 223.882 shall be sufficient foundation for the exercise of the right of eminent domain, notwithstanding that there is other real property available that might be used for those purposes. [Formerly 223.860; 1971 c.741 §22]

223.886 Loans authorized to finance improvements; security for loans; consent of electors. In carrying out the powers conferred by ORS 223.882, the city may borrow money from any person, corporation or agency of the United States Government for the purchase of any real property described in ORS 223.882, or for paying the cost of improvements on any real property, which improvements may include the construction of docks, wharves or other structures and appurtenant appliances or fixtures or machinery necessarily required to operate a wharf or dock. In borrowing money for any of these purposes the cities may secure money so borrowed by executing and giving a mortgage or similar indenture on any such real property and its revenues. If repayment of money borrowed for acquisition or improvement of any such real property is not to be secured solely by the real property and the income derived therefrom, then, before a debt for the purpose of this section or ORS 223.882 can be contracted or incurred, the consent of the electors of the city must first be obtained. [Formerly 223.865]

223.888 Authority of city to carry out law. In the execution of powers conferred by ORS 223.882 to 223.886, a city may act through its council, commission of public docks, or other administrative body having jurisdiction of its wharves, docks or waterfront property. The city or its said administrative body may enter into and execute contracts or leases and do all acts and things requisite for carrying out the purposes of ORS 223.882 to 223.900. [Formerly 223.870]

223.900 Leasing property to individuals. In leasing or renting any part or portion of the real property acquired pursuant to the authority of ORS 223.882 to any individual or corporation, a city shall act in conformity with the requirements of ORS 271.300 to 271.360 when those sections are applicable. [Formerly 223.875; 1985 c.443 §2]

MISCELLANEOUS

223.905 Duration of Public Works Acts. (1) Except in pursuance of any contract or agreement entered into by and between any municipality and any federal agency prior to January 1, 1943, no municipality shall borrow any money or deliver any bonds pursuant to the provisions of chapter 455, Oregon Laws 1937, after January 1, 1943.

(2) Except in pursuance of any contract or agreement entered into by and between any municipality and any federal agency prior to December 31, 1941, no municipality shall exercise any of the powers conferred by chapter 348, Oregon Laws 1935, after December 31, 1941.

223.910 Validation of bonds issued under Public Works Act of 1937. All bonds or other obligations issued prior to March 27, 1939, pursuant to an election held under chapter 455, Oregon Laws 1937, and all proceedings taken prior to March 27, 1939, with respect to bonds or other obligations authorized prior to March 27, 1939 by an election held under chapter 455, Oregon Laws 1937, and which were issued within one year after March 27, 1939, by municipalities, for the purpose of obtaining loans from the Federal Emergency Administration of Public Works, pursuant to chapter 455, Oregon Laws 1937, are validated, ratified, approved and confirmed. All bonds or other obligations so issued and approved and all proceedings taken prior to March 27, 1939, with respect to bonds or other obligations authorized prior to March 27, 1939, by an election held under chapter 455, Oregon Laws 1937, and to be issued within one year after March 27, 1939, are confirmed and approved. The bonds or other obligations issued prior to March 27, 1939, are declared to be legal and binding obligations upon such municipalities for any and all purposes.