CITY OF LA GRANDE
ORDINANCE NUMBER 3038
SERIES 2005

AN ORDINANCE OF THE CITY COUNCIL OF THE CITY OF LA GRANDE, OREGON, AMENDING THE STATEWIDE GOAL 9 CHAPTER OF THE CITY OF LA GRANDE COMPREHENSIVE PLAN, RECODIFYING THE COMPREHENSIVE PLAN, AMENDING THE TRANSPORTATION PLAN REMOVING ALL REFERENCE TO THE INTERSTATE 84 FRONTAGE ROAD, REPEALING ORDINANCE NUMBER 3013, SERIES 2003

WHEREAS, the City of La Grande has conducted a Goal 9 – Economic Development Analysis; and,

WHEREAS, the Goal 9 Analysis will amend Section II-VII of the Goal 9 Chapter of the City's Comprehensive Plan to comply with Statewide Planning Goals 9.

THE CITY OF LA GRANDE ORDAINS AS FOLLOWS:

SECTION 1. The Comprehensive Plan text is amended and recodified as follows:

FOREWARD

Recognizing the need for an effective means of guiding and coordinating the physical development of La Grande, the City Council adopted the Comprehensive Land Use Plan on July 11, 1973.

In 1973, the Oregon State Legislature passed Senate Bill 100 which created the Land Conservation and Development Commission and required all City and County Governments to adopt Comprehensive Land Use Plans in compliance with Statewide goals to be adopted by the L.C.D.C. Thus, in December 1974, the L.C.D.C. adopted 14 Statewide goals that all Comprehensive Plans must address.

As a result of the added requirements placed on La Grande by the goals, the City sought and received a grant from the Federal government to update and revise the City's Comprehensive Plan to comply with the Statewide goals and guidelines.

The City contracted with the firm of Lynn Steiger and Associates to update the Plan. The Plan was subsequently rewritten by Lynn Steiger and Associates after many work sessions with committees and the Planning Commission and adopted by the City in 1977. After adopting new Zoning and Subdivision Ordinances in 1979 and an Urban Area Management Agreement with the County in 1980, the Plan was submitted to L.C.D.C. in 1981.

The 1981 Plan was not approved due to several goal deficiencies. Consequently, a revised and updated Plan was prepared in 1983. The changes in the Plan reflect both the intent of the Statewide Planning Goals and those of the City of La Grande. The 1983 Plan was acknowledged by LCDC and updated in 1990 during Periodic Review.

INTRODUCTION

THIS INTRODUCTORY MATERIAL HAS BEEN INCLUDED TO PROVIDE CITIZENS AND LOCAL, STATE AND FEDERAL GOVERNMENTAL OFFICIALS A BRIEF EXPLANATION OF THE PLAN IN ORDER THAT THE INFORMATION CAN BE MORE EASILY UNDERSTOOD AND UTILIZED.

The Concept. This Land Use Plan is a public document prepared by the Planning Commission and adopted by the City Council with assistance and input from community residents. It provides long-range guidelines for decision-making with regard to land use suitability, development proposal evaluation, public utility, facility and street improvement projects, and other considerations related to community growth.

The Plan will be used by public bodies as the basis upon which to make community development decisions and by businesses or private individuals to make investment or construction decisions, wherein it is desirable to have some assurance that community growth will take place.

The Purpose. The three basic purposes of this Plan are (1) to encourage desirable growth, (2) to accommodate anticipated development, and (3) to make provisions for those uses which may be needed by a community, but which may have such undesirable characteristics as noise, smoke, or odor.

The Plan can be used to encourage desirable growth in that it identifies those uses which are wanted, and provides areas for their development. Anticipated development, as projected in the Plan, can be accommodated by constructing those road and utility improvements which will be needed in order for that development to be realized. The Plan has also attempted to provide for the location of those uses which may have undesirable characteristics, but are needed in the community.

Flexibility. This Plan is flexible in that provisions are made for reviewing and updating it as conditions in the area change. Such conditions may be economical, physical, social, political, or environmental.

Existing Uses. Any legal use existing at the time this Plan was adopted can be continued providing such use is not determined to be a nuisance under local nuisance provisions.

Legality. The State enabling legislation stipulates that all cities and counties must have plans which (1) assure coordination and consistency (factual basis), in community development decisions, and (2) provide the basis for regulations, e.g. zoning and subdivision ordinances which express public policy. The term coordination above refers (1) to planning interaction with other agencies at various levels of government, and (2) to transportation improvements, which are among the most important means of plan implementation. The law also requires plan review and revision as changing needs and desires arise. In December 1974, the State Land Conservation and Development Commission (L.C.D.C.) adopted fourteen land use planning goals. The state goals do not actually have a direct affect on local plans, but do spell out what must be taken into account in preparing a Plan. Cities and counties are still responsible for preparation of their own respective plans. Counties are required to coordinate all of the plans prepared within their boundaries.

Zoning. In addition to public utility, facility and transportation improvement, zoning is among the most important means of plan implementation. Zoning maps and land use plans are somewhat similar in that both delineate areas suitable for various uses, and attempt to assure use

compatibility. Plans are more general and flexible, and provide long-range guidelines for orderly development. Zoning is specific and short-range, and is regulatory rather than recommendatory.

Since the Baker vs. Milwaukee (Oregon Supreme) Court case determined that the Comprehensive Plan has precedence over zoning, any conflicts that exist between this Plan and the Zoning Ordinance will have to be resolved.

Citizen Involvement. A tabloid was prepared and distributed to the local citizens through *The Observer* which explained the planning process being undertaken and the Land Conservation and Development Commission goals. Included in the tabloid was a questionnaire intended to provide the citizens an opportunity to respond to particular issues and questions.

A series of public meetings were held throughout the City to explain the planning effort and the tabloid. The opinions and recommendations received from the citizens are reflected in the Plan Map and related policies and recommendations. A copy of the questionnaire results are filed in the City Planning Office.

Several local and state committees and organizations were contacted and sent copies of the tabloid for their opinions and recommendations as well. Their opinions are also reflected in the Plan Map and related policies and recommendations. The responses received by the various committees and organizations are on file in the City Planning Office.

Other citizen involvement was provided through mailed agenda material, public meeting notices, newspaper articles and radio broadcasts, and polling of Planning Committee members and residents on planning issues.

HISTORY

Indians used to camp along the Grande Ronde River, fish its water, dig camas in the meadows and hunt game in the surrounding timbered hills. The Grande Ronde Valley then was a valley of peace. But in 1843, the Indians were interrupted by the first wagon train and life has never been the same.

The first white emigrants were impressed by the Grande Ronde Valley but Eastern Oregon then was wild country and every train fought its way to the promised land--the Willamette Valley.

It wasn't until 1860 that any of the pioneers doubled back. In that year a freighter, Ben Brown, took a claim north of the river to farm. But the winter was harsh and spring so late that he moved to the protected southwest corner of the valley. His second claim was on the Oregon Trail at the "rest-up" camp. Most of the wagons lay over here to put their animals back in shape for the worst part of the entire trail--the climb over the Blues.

Ben Brown capitalized on his location. He built a house and converted it into an inn. When others saw how well he was doing, they chose home sites on the dry knoll about the slough near Ben's inn.

The little settlement became known as Brown Town, or Brownsville, but when the first post office was established in May of 1863, the name was changed to La Grande.

La Grande was incorporated by an act of the legislature in 1865, six years after Oregon became a State. The town became a focal point along the transportation route. Although roads were eventually built which bypassed La Grande, they all proved either too steep or were inaccessible in the winter and were abandoned. The Oregon Trail, which followed the old Indian trail over the mountains, proved to be the only satisfactory east-west route and the town of La Grande catered to the freighter's needs.

The cost of travel in the early days was sky high. Enterprising men laid claim to land wherever the road narrowed and they charged an ungodly amount to pass over their property. The situation was so out of hand that in the 1870s residents in La Grande looked to the railroad as its only salvation.

Finally, in 1884 the railroad through the Grande Ronde Valley became a reality. It entered at Orodell Gap and exited at Pyles Canyon.

Since La Grande was built on the dry hill above Gekeler Slough, a mile away from the railroad, residents had two choices, build a branch line or move the town. They chose the latter, and though the buildings of "old town" were still used, all new construction sprang up parallel to the railroad tracks.

In the five year period after 1886, seventeen plats were filed and the population of La Grande more than doubled. With this sudden growth came the demand for public works; between 1885 and 1894, streets and sidewalks, mainly in "new town", were constructed; a water system was constructed; the fire department was organized and the power company began operation.

Building was booming during this period. The year 1890 saw 152 residential buildings go up and in 1891, 183 more were added. By 1892 the boom days were over. Close to three-quarters of all land platted in La Grande today was platted before the turn of the century.

As the railroad changed the complexion of La Grande, so has the advent of the automobile.

The old Oregon Trail Route was designated as part of the federal highway system, but instead of taking the original course through "old town" the highway was built parallel to the railroad down Adams Avenue.

The stretch between Orodell and La Grande, paved in 1924, was the final link in the improved transcontinental route.

A small wave of subdividing occurred after the highway was completed and the recorded plat in 1926 was the last until 1961.

Business and population in La Grande remained stable until, in the 1970s the Interstate freeway was constructed. It bypassed the central part of town and businesses that catered to motorists began to spring up along Interstate 84 exits.

The Interstate highway today is as important to the La Grande community of the future as the Oregon Trail and the railroad once were. In the decades ahead the lines of outside transportation will remain the key to La Grande's development.

THE PLAN

Plan Classifications

The land use element of La Grande's Comprehensive Plan is intended to provide a general guide to the future use of land within the City and its urban growth boundary. In addition to the goals, policies, and recommendations, the land use element consists of a map, indicating the proposed location, intent and pattern or the various defined land uses relating to the orderly physical development of La Grande,

The land use plan is based on the existing land use pattern and its relationship to such factors as natural land features; natural hazard areas; accessibility with respect to the existing and proposed transportation network; the nature, amount and direction of projected future growth; the location with respect to existing and proposed public facilities and utilities; relationship to nuisance factors, and the desirability of the location for future ordinance provisions.

A brief definition of each land use classification follows:

Plan Classification	Purpose
Medium Density Residential The R-1 Zone shall have a minimum and maximum density of 4 to 6 dwelling units per gross acre. The R-2 Zone shall have a minimum and maximum density of 6 to 10 dwelling units per gross acre.	To provide areas suitable and desirable for single-family residential uses which have or will need public water and sewage services, commercial and educational support facilities and employment opportunities. Planned developments and duplexes are usually included provided the density does not exceed the minimums set forth in the Zoning Ordinance.
High Density Residential The R-3 Zone and R-P Zone shall have a minimum density of 11 dwelling units per gross acre.	To provide areas desirable and suitable for all types of high density residential development including apartments, planned developments, and other multi-family dwelling units. Under certain conditions, with appropriate safeguards, low traffic generating non-residential land uses may be suitably located in close association with high density residential uses. This classification would be applied primarily to locations where intensive commercial areas or public use areas are located nearly.

Hillside Development	To reduce development densities within hillside areas which have been clearly documented by scientific studies and designated by the City of La Grande Comprehensive Plan as a geologic hazard area (i.e. unstable slope, potential landslide topography). Development in these hillside areas have or will need public water and sewer facilities, commercial and educational support facilities and employment opportunities. Limited agricultural uses are permitted on these hillside development lots.
Commercial	To provide areas suitable and desirable for retail, wholesale, office, warehouse, tourist, and their similar commercial activities which are needed by the City and surrounding areas. High density residential development opportunities or mixed use commercial/residential opportunities shall be provided within and adjacent to the central business district. Such areas generally encompass the original commercial areas and radiate from there. Zone classifications will be used to differentiate between commercial activities.
Industrial	To provide areas suitable and desirable for those activities that are involved in processing or reprocessing materials and/or resources. These activities are needed to maintain or improve the City's economy and employment. Industrial areas are generally located where services and transportation improvements are available, and development is compatible with surrounding area uses. Zone classifications can be used to differentiate between industrial activities if necessary.
Public	To indicate areas desired to be used for existing or anticipated public uses such as schools, and other local public, state or federal activities or facilities.

PLANNING GUIDELINES

The guidelines included in this Plan are included to provide the background information and a policy framework for planning decisions. The goals, policies, and recommendations included in this plan are not the results of wishful thinking, but have been formulated considering community attitudes, inventory material, LCDC goals and guidelines, and the existing and projected population and land use patterns.

Objectives are those general goals that serve as the basis for all planning decisions. Development policies may be specific or general guidelines that are used to evaluate planning decisions being considered. Specific policies are those directives which are recognized in evaluating a particular type of development, or possible location therefore. General policies are those directives which basically apply to all uses and locations in the community. If decisions are made contrary to the development policies, justification for deviating from the policy must be recognized and spelled out (documented). Recommended actions are those activities which need to be undertaken to implement the Plan. Those actions are recommendatory and do not have the same regulatory effect as do the objectives and policies.

The following is part of the La Grande Land Use Plan and will be taken into consideration by both private and public interests in making land use decisions. Any legal use existing at the time this Plan is adopted can be continued, providing the use is not determined to be a nuisance under nuisance ordinance provisions. The objectives, policies and recommendations have been grouped into the 13 Statewide goals that are applicable to the La Grande area.

Statewide Planning Goal 1 - Citizen Involvement

Goal Statement - To develop a citizen involvement program that insures the opportunity for citizens to be involved in all phases of the planning process.

Components -

1. Citizen Involvement. To provide for widespread citizen involvement.

2. Communication. To assure effective two-way communication with citizens.

3. Citizen Influence. To provide the opportunity for citizens to be involved in all phases of the planning process.

4. Technical Information. To assure that technical information is available in an understandable form.

5. Feedback Mechanisms. To assure that citizens will receive a response from policy-makers.

6. Financial Support. To insure funding for the citizen involvement program.

Background - The La Grande Planning Commission has served as the Committee for Citizen Involvement as approved by LCDC in 1976. At the time of the information gathering for the original plan in 1977, a survey was printed in the local newspaper, which explained the planning process and sought public opinion on a number of land use issues. When the zoning map and ordinance was adopted in 1979, a colored picture of the map was published on the front page of the local newspaper at the beginning of the hearing process. Throughout the 1990 Periodic Review process, the update and revisions discussed at open work sessions with the Planning Commission and City Council were reported on by the local newspaper. All amendments to the Plan, maps, or implementing ordinances are advertised in the local newspaper and undergo at least two public hearings.

By 2001, several changes have occurred in the ways local governments, including La Grande involve their citizens in the planning process. For example:

> It is now fairly common for cities to survey citizens on a routine basis to assess citizen attitudes toward a variety of issues that face the community, including growth and development. La Grande conducted such a survey in late 2000 and plans to do so again every two to three years.
>
> La Grande's citizen survey in 2000 reveals that about 57.5% of La Grande households have Internet access. La Grande is upgrading its web site to provide more information for citizens regarding land use planning and other programs.
>
> Measure 56 requires local governments to provide all property owners with mailed notice when City-wide rezonings are being considered, including land use regulations that would limit or prohibit land uses previously allowed in the effected zone. Although very expensive in terms of staff time and postage cost, this requirement has resulted in more citizens becoming involved in Land Development Code amendments in La Grande.

City Council meetings are now televised on a local cable television channel. It is no longer necessary to attend meetings or read minutes to keep up to date on what issues the City is dealing with.

As of 2001, no official neighborhood groups have been recognized by the City. La Grande does not have a neighborhood program.

Objective -
1. Develop and implement a citizen involvement program that includes all six (6) components of Statewide Goal #1.

Policies –
1. The City of La Grande shall strive to provide for widespread citizen involvement, especially in its land use planning process.

2. The City of La Grande shall strive to assure effective two-way communication with citizens.

3. The City of La Grande shall strive to provide the opportunity for citizens to be involved in all phases of the planning process.

4. The City of La Grande shall strive to assure that technical information is available in an understandable form.

5. The City of La Grande shall strive to assure that citizens will receive a response from policy-makers.

6. The City of La Grande shall strive to insure funding for the citizen involvement program.

7. That the City of La Grande Planning Commission continue to serve as the Committee for Citizen Involvement for the City of La Grande. Continued efforts should be made to ensure that Planning Commission members are selected by an open, well-publicized public process.

8. That the City of La Grande continue efforts to upgrade its web site to include land use information including, but not limited to: Comprehensive Plan, implementation ordinances, meeting agendas, meeting minutes, staff reports, hearing notices, land use maps, special events and opportunities to serve on committees or commissions.

9. That the City of La Grande continue surveying its citizens on a regular basis (every two to three years) to assess citizen attitudes regarding land use and other issues affecting the community.

10. That the City of La Grande produce printed materials that will enable citizens to understand technical aspects of the land use planning program and make such materials readily available to the public.

11. That the City of La Grande staff continue to participate in service club presentations, local radio talk shows and newspaper or newsletter columns in an effort to better communicate with citizens.

12. That the City of La Grande continue to provide all citizens who participate in the land use process with a copy of the final decision and findings.

13. That the City of La Grande explore the feasibility of publishing a newsletter on a regular basis.

14. That the City of La Grande budget adequate resources to continue and enhance its efforts to implement the policies and recommendations of this plan.

Statewide Planning Goal 2 - Land Use Planning

The City has inventoried existing land uses, probable demand for specific land use classifications, and the amount of buildable land in the La Grande area. Within this document there exists a discussion of those elements necessary to insure adequate attention to the state land use goals and the needs of the City. The resolution of these identified needs is reflected in the amount and location of land use classifications on the Plan map and zoning map which are consistent.

Objectives –

1. The overall goal of the La Grande Comprehensive Plan is to provide direction for achieving a safe, healthful, attractive, and workable environment for the citizens of La Grande; and

2. To establish a land use planning process and policy framework as a basis for all decisions and actions related to use of land and to assure and adequate factual base for such decisions and actions.

Policies –

1. That planning-related decisions will be made on a factual base, and that such base will be updated as base information changes, or at least every two years.

2. That the plans of other local, state and federal agencies will be taken into account in preparing land use plans and making related decisions.

3. That public need be established before plan changes or related requests are approved and that the burden of proof be borne by the requestor.

4. That urban uses will be discouraged from sprawl which may increase service costs, transportation congestion, and the transition of land from agriculture or grazing to urban uses.

5. That orderly, efficient and economical transition will be made in converting rural lands to urban development.

6. Before property is annexed to the City, is should be clearly established that such annexation will provide a clear benefit to the City with recognition of the fact that City services must be provided to such an area.

7. That commercial development be concentrated so as to strengthen existing commercial activities.

8. That compatibility of anticipated uses with surrounding area development will be evaluated in making planning related decisions.

9. That alternative sites and alternative uses will be considered in making land use plan decisions.

10. That commercial and high density residential development will be located in areas where access, service, and related facilities can best accommodate such development.

11. That uses with undesirable noise, smoke, visual, and other objectionable characteristics will be discouraged from locating in areas where such conditions are incompatible with surrounding area development.

Recommendations –

1. That the land use plan and factual base be reviewed at least once every two years for updating.

2. That a public notice be made each time a plan review is being undertaken and that a public statement be made as to the findings of the review.

3. That a process of coordination be established with local, state and federal planning related agencies.

Statewide Planning Goal 3 - Agriculture

There are no agriculture classifications within the La Grande UGB. There are existing agricultural practices, however, these areas are planned for urban expansion within the UGB and are therefore considered more necessary and available for urban development. The following objectives, policies, and recommendations were considered in the planning process where upon the UGB was established to eliminate agricultural conflicts.

Objective –
1. To preserve and maintain agricultural lands, and protect valuable soil resources for the agricultural demands of the future.

Policies –
1. That soil characteristics, crop productivity, flood hazard, resource habitat, economics, and other similar values will be taken into account in determining whether land should be maintained in its existing state or developed for urban uses.

2. That lands used for agricultural purposes will be preserved wherever less productive alternative sites are available for development; and in such instances where existing or potential access, services, etc., are or can be provided to such alternative sites.

3. That wherever possible, urban uses will be separated from agricultural activities by a buffer or transitional area in which development allowed is compatible with both urban and agricultural uses.

4. That in order to protect the most productive agricultural lands, north and east of La Grande, expansions of existing urban uses or development of new urban uses will be encouraged to utilize existing land within the City limits or those areas already developing as such.

Recommendations –
1. That the City and county work together in protecting the most productive agricultural lands around the City.

Statewide Planning Goal 5 - Open Spaces, Scenic and Historic Areas, and Natural Resources

Statewide Planning Goal 5 requires the City of La Grande to inventory a variety of open space, historic, scenic and natural resources; evaluate their significance and adopt policies and implementation ordinances to protect such resources for future generations. The goal requires that the following resources be inventoried: Mineral and Aggregate Resources, Energy Sources, Fish and Wildlife Habitat and Riparian Areas, Historic Sites, Ground Water Resources, Wetlands, Open Space, Scenic Views and Sites, Federal Wild and Scenic Rivers, Oregon Scenic Waterways, Oregon Recreation Trails, Natural Areas and Wilderness Areas.

Oregon Administrative Rule 660-023 provides procedures and requirements for complying with Goal 5. The City of La Grande has followed this rule in updating this Chapter of the Comprehensive Plan.

Mineral and Aggregate Resources: The La Grande area on the valley floor is comprised of several varieties of gravel deposits laid down from rivers and streams entering the Grande Ronde Valley. The eastern two-thirds of the La Grande urban area is comprised of fan gravels or the combination of fan gravel and river and stream gravel.[1] Virtually all of the small parcels adjacent to the river, where the primary deposits of aggregate are located, have established residential uses.

Although portions of the land near the Grande Ronde River have been excavated for gravel in years past, the principal operation for removing gravel has been east of the La Grande Urban Growth area, in Island City along the Grande Ronde River, just upstream of the Wallowa Lake Highway Bridge**.** This location is depicted on Map Sheet 29 of the 1985 Soil Survey of Union County published by the Soil Conservation Service. In 2001, this mining operation moved to a site on the east side of McAlister Road, just north of Interstate 84. This site is also outside of the La Grande Urban Growth Boundary.

The Department of Geology and Mineral Industries (DOGAMI) has provided the City with a database showing the location of aggregate resources in the La Grande vicinity. Of the fourteen (14) sites included in this database, none are within the City limits or Urban Growth Boundary of La Grande.

Energy Sources: La Grande has several potential sources of energy including hydro, solar, biomass, wind and geothermal. These resources are identified and quantified in the following discussion together with applicable zoning provisions necessary to insure the option of developing these resources.

Hydro Power: The City of La Grande has an existing facility, the Beaver Creek Watershed, which has a potential for the generation of electrical power. The available energy in the water from a point on the existing intake pipeline near Morgan Lake to a point near the elevation of the high-level 8 million-gallon reservoir is about 205 kilowatts.[2] The upper power plant site has an available head of approximately 900 feet and an operating head of about 800 feet at a flow of 2000 gpm (3 MGD).

---

[1] Engineering Geology of the La Grande Area Union County, Oregon, Herbert G. Schlicker and Robert J. Deacon, State of Oregon, Department of Geology and Mineral Industries, March 1971.
[2] Water System Master Plan, City of La Grande, Oregon, Anderson-Perry and Associates, Inc., 1981, p. 83.

The feasibility of this resource was figured in 1982, based upon the following development assumptions:

1. That operation and maintenance cost will inflate at a rate of 11% per year.

2. That the energy inflation rate will increase at a rate of 15% per year.

3. That bonds financed at 10% for a period of 20 years will be used for the initial capital development.

4. That 205 KW will be produced and 95% efficiency will be obtained.

If the construction were to have taken place in 1982 and figuring that the power is valued at $0.03/KWH, the operation would break even in 1987. Over the 20-year length of time it would take to retire the bond, a total net revenue of $3,549,822 would be gained. Of course, this is based on several inflation variables but the hydroelectric resource is existing and is owned and operated by the City of La Grande.

The City contracted with Anderson - Perry and Associates and Montgomery Watson Harza Engineers in 2001 to update the feasibility study for a Beaver Creek Hydroelectric Project. The resultant feasibility study, dated January 4, 2002, concluded that it is not economically feasible to build such a hydroelectric facility by itself. However, it may be economically feasible to construct the facility if the City builds a water treatment plant to utilize Beaver Creek water and the costs of the watershed improvements and transmission line could be borne by the Water Division. The ultimate feasibility will depend of the actual value of the power generated.

There are four other natural water courses within the La Grande Urban Growth Boundary which have been evaluated for their hydro electric potential but due to their fluctuations in volume as a result of low water or freezing, they have not been considered as a firm energy source. The hydropower of the watershed intake has another valuable potential which is explained in the Geothermal section of this inventory. An updated study of the hydropower potential of the watershed is being considered in 2001 – 2002 due to rising energy prices.

Wind Power: The La Grande area is identified as having the highest wind power potential in Oregon exclusive of the Columbia River Gorge. In the winter, it is estimated that class 6 and 7 wind power exist for the western part of the Columbia Gorge, the La Grande area, and higher exposed ridge crests and summits in the Cascades and mountains of eastern Oregon.[3] "In winter, the class 6 wind energy at La Grande appears to be primarily due to strong south to southeast winds that are funneled and accelerated through the low gap south of La Grande."[4] The wind data collected is from a monitoring station at the La Grande Airport. The airport is located approximately three miles east of La Grande in direct line with Ladd Canyon through which the winds are funneled and accelerated between the Baker Valley and the Grande Ronde Valley. There is no available data for the La Grande UGB.

The La Grande area is sheltered by the mountains to the south and west as opposed to the airport site. It is presumed that it is due to this sheltering influence that La Grande is established where it is and therefore it is not expected that the wind power documented at the airport is available in La Grande.

---

[3] Wind Energy Resource Atlas: Volume 1—The Northwest Region, D. E. Elliot and W. R. Barchet, Pacific Northwest Laboratory, April 1980.
[4] Ibid., p. 87.

Wind power is a factored ratio of wind speed. The airport station ranks higher in wind power than other locations in Oregon even though it has the same average annual wind speed because of periods in the winter of very high winds. The power is a factor of wind speed multiplied by eight. For instance, if the wind power is 10 with a wind speed of 5, then a higher wind speed of 10 raises the wind power to 80. It is the period of time from November to March that raises the La Grande area's wind power above other Oregon locations. This is due to the slight increase in wind energy potential.

Geothermal Energy: The Union County area and more specifically La Grande has been identified as having a very high geothermal energy potential by the Oregon Department of Energy. Union County and the City of La Grande did apply for and receive a $35,000 District Heating and Cooling Assessment Grant from the Department of Housing and Urban Development/U.S. Department of Energy of which there are only 5 grants awarded in the western United States. This further indicates as interest in the known geothermal resources of this area. A study completed in 1978 entitled Northeast Oregon Geothermal Project and published by the Eastern Oregon Community Development Council identifies over 30 wells in the area with water ranging in temperature from 70 degrees Fahrenheit to 185 degrees Fahrenheit.

Presently three potential district heating/cooling (DHC) systems have been identified within La Grande: (a) the north La Grande area, (b) the La Grande Central Business District, and (c) the institutional facilities in the south area of La Grande.

A. The north La Grande area has within its potential service area four artesian geothermal wells. Two of these are owned by the City of La Grande and two by Union Pacific Railroad with a total artesian flow of 950 gpm and temperatures of between 70 degrees Fahrenheit and 80 degrees Fahrenheit. City well #1 is used to heat the City maintenance shops and municipal swimming pool. In addition, this well and the Union Pacific #1 well are used by the City in the domestic supply systems. Neither of the other two adjacent wells are being utilized at this time. In addition to residential users within this area, two elementary schools (Riveria and Greenwood) could participate in a heating district with 68,146 square feet of floor space. Also the Boise Cascade sawmill and Del Monte Corporation processing plant have major facilities in the north side area.

B. The La Grande Central Business District (CBD) is located just south and contiguous to the four wells just discussed. The CBD contains 9 blocks of continuous walled buildings two stories and more in height. In the 1930s and 1940s this area was serviced by a heating district which was abandoned when cheaper fossil fuels became available.

C. The line of institutional facilities in the south portion of La Grande has prompted previous action to verify adequate geothermal resources in this area. In December 1979 the Oregon Department of Geology and Mineral Industries drilled three test wells within the institutional facilities study area to try and intercept the extension of the Craig Mountain Fault lineament. The test drilling was part of a low-temperature resource assessment program. The temperature gradient of 905 degrees C/KM was experienced down to a maximum depth of 260 feet. Given this preliminary information, the Oregon DOE is recommending in their final report additional drilling to 1,000 feet where higher temperatures and greater flows may be encountered.

Potential users of this resource include the following institutions. Their square footage and associated heat loads are also present based on a three-year average of space and hot water heating requirements.

Facilities	Square Footage	Heat - BTU's
Eastern Oregon University	431,486	80,416,600,000
3 La Grande Schools	285,960	22,264,690,400
School Administration Building	42,750	2,607,815,600
Grande Ronde Hospital	81,000	17,486,800,000
County Courthouse	50,157	1,695,973,100
TOTALS	**891,353**	**124,472,779,100**

The potential of geothermal waters being used to support a heating district or being placed into the cities distribution system and thereby benefiting all La Grande consumers is very good.

The Water Master Plan proposes to use the water from the Beaver Creek watershed to drive a turbine creating 210 shaft horse power which could pump 2082 gpm of the geothermal water. This minimizes operating costs of using the resource since no electric pumping is necessary, no chemicals are needed, and no chlorine is required. If this same water were pumped with an electric motor it would cost $48,500 annually at current power cost of $0.03/KWH.

Both the Water Master Plan and the Feasibility Assessment of District Heating/Cooling Systems Grant have and will further address the development of geothermal potential in the La Grande area. The heat loads have to be verified in order to ascertain the temperature and quantity of resource which must be available to make the projects feasible. Then the wells will have to be drilled before the resource can be established for exploitation.

Solar Power: La Grande potential for solar energy is not well documented. There are, however, several active and passive solar uses in the area which have proven to be cost effective, in the early 1980s for the energy gain. The mid to late 1980s and the 1990s seemed to show a decline in the use of solar energy. However, with the rise in energy prices in 2001, the use of solar and wind energy is expected to increase.

The average solar radiation for the La Grande-Blue Mountain area is very similar to the Willamette Valley for the winter months. This area experiences more direct solar access than west of the Cascades in the summer months. This area averages between 100 langleys per day in January to 650 langleys per day in July. This information is extrapolated from the data collected in Pendleton, Meacham and Boise weather stations.

The technology for utilizing solar energy is improving daily. Whether a system is installed to actively maximize La Grande's solar potential or merely orienting the building to the south to enjoy the warmth of the winter sun, the access to solar radiation must be guaranteed. If people are to be encouraged to utilize solar radiation they must be assured their access to it will not be blocked.

Biomass: The La Grande area utilizes the energy from wood to an extent greater than most communities in Oregon. This is largely due to the extensive damage caused by the Mountain Pine Beetle and the Tussock Moth to the Lodgepole Pine forests and fir forests in the 1970s. It is estimated by the Forest Service that approximately one billion board feet of Lodgepole Pine and 120 million board feet of Douglas Fir and White Fir have been killed.

The La Grande citizens use this dead timber to heat approximately 35% of the housing units. By 1990, the percentage of homes heating with fuels other than electricity or gas dropped to about 30 percent. This is largely due to the decay of the now dead trees and not their actual utilization. In the interim, this energy source is the single largest conservation effort of this area on a household basis. The percentage of households using wood for space heating continued to

decrease during the 1990s; however, price increases for natural gas and electricity in the early 2000s has fueled concerns from air quality advocates that wood burning could increase.

There is only one recent example of the use of biomass fuel on an industrial level and this is at the Boise Cascade Lumber Mill. Prior to 1993, Boise Cascade produced about 30% of their operating energy by burning wood fuel to produce steam and drive electric turbines. In 1993, Boise Cascade replaced the "hog fuel" system with natural gas-fired boilers. In 2001, as a result of a sharp increase in natural gas prices, Boise Cascade is studying the feasibility of a new hog fuel boiler that would supply 100% of their steam needs and produce electricity that could be sold on the market. By 2002, land had been purchased in the Baum Industrial Park northeast of La Grande for a bio-mass plant that would use wood waste to produce ethanol. This facility could produce 250 construction jobs, 200 jobs in the forest and about 75 jobs at the plant.

Fish and Wildlife Areas and Habitats: According to the Oregon Department of Fish and Wildlife, the riparian corridors along the Grande Ronde River, Mill Creek, Taylor Creek and the Gekeler Slough are important fish and wildlife areas as are the wetlands identified in the Local Wetlands Inventory. No other fish and wildlife habitat areas are mentioned in a March 5, 1999, letter addressing La Grande's Comprehensive Plan Periodic Review. At this time, the preference of the City of La Grande is to designate the Grande Ronde River, Mill Creek, and Gekeler Slough (north of Gekeler Lane) as Riparian Corridors and rely on wetland protection regulations to protect habitat along Taylor Creek (until more evidence regarding the existence of a Riparian Corridor along Taylor Creek is provided to the City.

Wildlife use riparian zones (where land and water meet) disproportionately more than any other type of habitat. Of the 378 terrestrial species known to occur in the Blue Mountains, 285 are either directly dependent on riparian zones or utilize them more than other habitats. The aquatic species are numerous, but of greater importance are the salmon and steelhead trout that utilize the river.

This riparian zone in the Grande Ronde corridor is important to wildlife for the following reasons:

1. The presence of water lends importance to the zone. Wildlife habitat is composed of food, cover, and water. Riparian zones offer at least one of these critical habitat components and often all three.

2. The greater availability of water to plants, frequently in combination with deeper soils, increases plant biomass production and provides a suitable site for plants that are limited elsewhere by inadequate water.

3. The shape of many riparian zones, particularly the linear nature of streams, maximizes the development of "edge" which is very productive for a variety of wildlife.

4. Riparian zones along the river provide shade which helps in maintaining acceptable water temperatures. They also provide migration routes for wildlife plus the river itself serves as a necessary migration route for steelhead, salmon, and resident fish.

Riparian area protection in the La Grande UGB is provided by the Riparian Protection Area chapter of the Land Development Code. La Grande has elected to use the "safe harbor" process in OAR 660-023-0090 to comply with Goal 5 Riparian Corridor requirements. The safe harbor riparian corridor boundary, for streams with an average annual stream flow greater than 1,000 cubic feet per second is seventy-five feet (75') upland from the top of each stream bank. The safe harbor riparian corridor boundary, for streams with an average annual stream flow less than

1,000 cubic feet per second is fifty feet (50') upland from the top of each stream bank. In La Grande, the Grande Ronde River and the three (3) tributaries (Mill Creek, Taylor Creek and the Gekeler Slough) all have average annual flows of less than 1,000 cubic feet per second according to the Union County Water Master's Office and the Water Resource Department's database. Thus, the riparian corridor width included in the Riparian Zone Protection Article of the Land Development Code Ordinance must be no greater than fifty feet (50') upland from the top of each stream bank, unless the City can justify a greater width in protecting water quality under Statewide Goal 6. The Riparian Zone Protection Article will be developed using State model ordinances and comments on such model ordinances received from the Department of Land Conservation and Development.

Historical Sites: The following buildings were suggested by members of the Union County Museum Society as possible sites that should be considered as historical buildings of different historical architecture. This list is not intended to be a list of all historical sites nor is it intended that all of these buildings should be preserved at any cost.

This list is included so that those sites can be considered by the Landmarks Commission for their historical significance before destruction is allowed. Historical review provisions are incorporated into the Land Development Code Ordinance.

BUILDINGS OF HISTORICAL SIGNIFICANCE

Federal Building	Built in 1912, remodeled to City Hall, 1982
Slater Building	(1891)
Sugar Factory at North Pine & Z	(1898)
Walter M. Pierce Library	Eastern Oregon University, 1929 Architecture, Traditional, Education
Masonic Temple	Built in 1900
Trinity Baptist Church	901 M. Avenue
Administration Building	Eastern Oregon University, 1929
Gangloff Park Monument	Erected in 1924 – Oregon Trail History

RESIDENTIAL ARCHITECTURE OF HISTORICAL SIGNIFICANCE

Queen Anne Style

1701 Spring Avenue	(1907)
1710 Second Street	(1896)
701 Main Avenue	(1904)
809 Main Avenue	(1892)
Corner of Fourth Street and "L" Avenue	(1895)
1601 Sixth Street	
1602 Sixth Street	(1900)
1604 Sixth Street	(1900)
Foothill Road, Box 2506	(about 1900)

Norman Farmhouse

402 Washington Avenue	(1925)

Tudor

401 Washington Avenue	(1926)

Tudor Cottage

602 Penn Avenue	(1920)

Colonial Revival

1504 First Street	(1930)
1507 First Street	(1930)
1701 Fourth Street	(1915)

Georgian

708 “O” Avenue	(1920)
1612 Walnut Street	(1924 - 1925)

Italian Villa

709 “O” Avenue	(1920)

Foursquare House

1508 Second Street	(1915)
1602 Second Street	(1915)
1701 Fourth Street	(1890)

English Cottage

1502 Fourth Street	(1925)

On Oregon Trail

1206 “B” Avenue	(1872)

On September 3, 2001, the National Park Service designated a National Register Historic District in downtown La Grande. Owners of contributing resources within the District will be eligible for special property assessment and Federal investment tax credits for qualified rehabilitation projects. The La Grande Urban Renewal District encompasses the La Grande Commercial Historic District and will offer additional resources to promote downtown revitalization.

The City of La Grande formed a local Landmarks Commission and adopted new regulations of Historic Buildings and Sites in 2001. On January 2, 2002, the City received designation as a Certified Local Government from the National Park Service. The Certified Local Government designation recognizes the City’s commitment to historic preservation.

Ground Water Resources: The following information is extracted from "Potential Ground-Water Development for Municipal Supply, La Grande, Oregon," Anderson & Kelly--Consultants in Engineering and Geology, October 1980. This study was initiated and completed to be a principal resource value to the La Grande Water Master Plan.

Within the area, the mountains and the bedrock floor of these valley are chiefly a thick sequence of Columbia River basalts. In the valley area, the down-faulted basalt has been covered by thick alluvial deposits of clay, silt, sand, and gravel. Most of the domestic wells are shallow, producing from the alluvial fan aquifer in the northern and western part of the study area or from lakebed sediments in the southeastern part of the area. Water levels are generally close to the land surface fluctuating a few feet seasonally.

The alluvial fan wells are generally from 250 to 600 or more feet deep with yields up to 1,000 gpm or more. The water is of good quality. Pumping levels vary with the aquifer characteristics and pumping rate; typically they are from 100 - 200 feet below ground.

The basalt wells are deeper, generally 800 to as much as 1,500 feet -- depending upon the thickness of the overlying alluvium. The water is of good quality. "Long term observation of

water levels in wells in both the basalt and alluvial aquifers show no progressive declines." "There is an ample supply of ground water in the La Grande area to support the proposed development of as much as 5,000 gpm peak requirement." "Both aquifers should be capable of supplying 1,000 gpm or more to properly constructed wells." "Wells in either aquifer should be capable of sustained pumping for years without progressive decline in water level or yield." "Water from both aquifers would be of suitable quality for municipal use," according to Anderson & Kelly.

For additional information regarding ground water resources, see the City of La Grande Public Facilities Plan and the City of La Grande Water Master Plan, prepared by Anderson – Perry and Associates in 1997.

Wetlands: Wetland and riparian areas provide numerous and complex functions that affect both aquatic and terrestrial systems. Many ecological functions of riparian areas are also provided by wetlands, flood plains and vegetated upland areas. Wetland and Riparian areas often provide a buffer zone between upland uses and water resources, protecting or enhancing water quality, preventing erosion and moderating flood flows. Wetland and Riparian areas often provide important wildlife habitat and contribute to in-stream habitat for fish.

The U.S. Fish and Wildlife Service has provided a new wetlands inventory called the National Wetlands Inventory (NWI). In 1990, during Periodic Review, the City designated wetlands as a Class 1B resource and adopted a Plan Policy to complete the Goal 5 process as soon as adequate information is available.

In 1995, thanks to an EPA Clean Water Act Wetlands Program Enhancement Grant, the City of La Grande hired Fishman Environmental Services to conduct a Local Wetlands Inventory. The Local Wetlands Inventory document was updated by the City in 2002 and submitted to the Division of State Lands for final approval, which was received on January 14, 2003. This Inventory is incorporated as a part of this Plan by reference. A Wetland Protection Areas Article, complying with the Safe Harbor provisions of ORS 660-023-0100 and based on a model ordinance provided by the Department of Land Conservation and Oregon Division of State Lands will be incorporated in the Land Development Code to protect wetlands identified in the Inventory.

Open Space: La Grande has a very good coverage of parks and recreational facilities which it maintains and operates in conjunction with the School District's facilities. These facilities, which are addressed in the Parks Master Plan in the Recreation Needs Chapter of this Plan, constitute the bulk of the public open space available in the La Grande Urban Growth Boundary.

In 1999, recognizing the need to acquire additional open space lands in the future, the City of La Grande adopted an ordinance enabling a System Development Charge (SDC) for Parks and Recreation facilities. In 2000, a fee Resolution was passed by the City Council to establish the SDC at $525.00 per new residential unit.

Scenic Views and Sites: The primary scenic resources under jurisdiction by the City are contained in the park system. There are other scenic attractions in the area but most of these are seen from La Grande and are not in La Grande. No official scenic viewpoints have been designated. The City Land Development Code does contain building height restrictions that serve to preserve views of the surrounding mountains. Developers have the option to further regulate building heights by deed restriction in areas where views are important.

Federal Wild and Scenic Rivers: The Federal government has designated a portion of the Grande Ronde River as a Wild and Scenic River. The designated portion is located between the

confluence with the Wallowa River and the Oregon - Washington border. This portion of the river is not within the jurisdiction of the City of La Grande.

Oregon Scenic Waterways: The portion of the Grande Ronde River that is designated as Wild and Scenic is also classified as an Oregon Scenic Waterway. Again, this portion of the Grande Ronde River is outside of the La Grande Urban Growth Boundary.

Oregon Recreation Trails: According to the State Parks Division, the closest Oregon Recreation Trail to La Grande is the New Oregon Trail, which runs north-south near Hilgard Junction. This trail is about seven (7) miles west of the La Grande Urban Growth Boundary.

Natural Areas: Natural areas are inventoried in the Oregon State Register of Natural Heritage Resources, which is included in the 1998 Oregon Natural Heritage Plan. This Plan was prepared by the Natural Heritage Advisory Council of the State Land Board. A review of this database reveals that La Grande is within the Blue Mountains Eco-Region. The Plan identifies 135 ecosystem cells in the region. The majority of these appear to be located in national forest or wilderness areas. Two (2) cells located south of La Grande at Ladd Marsh are identified by the Plan. The first is a "Low elevation vernal pond with saltgrass and cordgrass." The second is a "Bulrush-cattail marsh, with aquatic beds." This second cell is a proposed State Natural Heritage Conservation Area. Both are outside of the La Grande Urban Growth Boundary.

Wilderness Areas: No Wilderness Areas exist within the La Grande Urban Growth Boundary. The 358,461 acre Eagle Cap Wilderness is about 25 miles to the east and the 177,465 acre Wenaha-Tucannon Wilderness is about 37 miles to the north.

Objectives –
1. To conserve open space and protect natural and scenic resources.

2. To develop programs that will: (1) insure open space, (2) protect scenic and historic areas and natural resources for future generations, and (3) promote healthy and visually attractive environments in harmony with the natural landscape character.

Goals –
1. To make available the best possible resource land for this purpose while protecting urban values and environmental concerns such as air quality, noise, aesthetics, fisheries, and wildlife.

2. To maximize the most energy efficient extraction and utilization of the resource by permitting aggregate removal within the UGB where the control of adverse impacts is possible.

3. To encourage both active and passive use of solar energy techniques in residential and commercial buildings.

4. The City of La Grande should facilitate the recognition of historical structures important to the heritage of the La Grande area. This should include seeking status as a Certified Local Government.

5. The City should make every reasonable effort within its regulatory authority to save these structures from defacing or demolition.

Policies –

1. That fish and wildlife areas and habitats shall be protected and managed to prevent destruction by urban development.

2. That the efficient consumption of energy shall be considered when utilizing natural resources.

3. That watersheds and reservoir sites shall be protected from urban encroachment.

4. That the need for open space for the residents of the area shall be considered in the development and expansion of urban uses.

5. The City shall support any future efforts to obtain reliable wind energy data within the La Grande UGB and assist in the interpretation of that data. Should sufficient wind energy potential be found to exist, the City will adopt the best available technology in land use implementing measures to guarantee access and utilization of the wind energy resource.

6. The City has supported the geothermal development efforts of the past and shall continue to support these efforts with staff time and coordination.

7. Should geothermal resources be discovered in sufficient quantity and quality, the City will aid the development of those resources.

8. When feasibility and development of the geothermal resource are shown to be cost effective to the citizens of La Grande, the City will attempt to secure the funds necessary to finance implementation.

9. To consider development of a provision for solar access in the La Grande Land Development Code.

10. The City of La Grande supports the wildlife and fisheries management objective of maintaining the riparian zones along the Grande Ronde River.

11. The City shall implement an Ordinance provision within the Land Development Code Ordinance which regulates the declaration of historical structures, and demolition thereof through a public involvement process.

12. The City of La Grande shall make every possible effort to protect ground water resources whenever they appear threatened.

13. The City of La Grande commits to coordinate with the Oregon Department of Fish and Wildlife and seek to amend the Riparian Corridor Map in the Comprehensive Plan should the Oregon Department of Fish and Wildlife produce fish inventories or other evidence that Taylor Creek is a fish-bearing stream.

Recommendations –

1. That historical sites and/or structures should be investigated for possible preservation and/or acquisition before allowing them to be destroyed for new development.

2. The City continue to evaluate its cultural, historical, natural and scenic areas so as to include appropriate regulations in the Land Development Code Ordinance for their protection.

3. The watershed to the west and south of La Grande should have restricted development so as no to destroy its benefit to the City.

4. In dealing with fish and wildlife areas and habitat, the City should adhere to the Oregon Wildlife Commission's fish and wildlife management plans.

5. The Land Development Code Ordinance should reflect the desire and need for open space by the residents in the urban area.

6. The City should cooperate to the fullest extent possible with all parties public and private, in the conservation and development of drainage ways, game and wildlife habitat and similar natural resources, so as to preserve these amenities for the benefit of future generations.

Statewide Planning Goal 6 - Air, Water, and Land Resources Quality

Air Quality: The following list, based on DEQ Permit records from 2001, represents an inventory of the major commercial-industrial sources of air discharges:

Rogers Asphalt and Paving
Blue Mountain Humane Association (Animal Crematory)
Borden, Inc.
Boise Cascade Corporation (Particle Board Plant)
Boise Cascade Corporation (La Grande Sawmill and Planing Mill)
Del Monte
R-D Mac, Inc. (Ready-Mix Concrete and Rock Crusher)
USA Concrete
Eastern Oregon University (Boilers)

Also area sources include field burning, slash burning, motor vehicles and trains, space heating (especially wood), open burning, and agricultural operations.

In 1988, the City of La Grande was notified that PM_{10} particulate matter sampling had resulted in levels exceeding the National Ambient Air Quality Standards. Predominant contributors to these particulate matter levels were wood stoves and dust. La Grande was thus designated as a "non-attainment area" and was required to work with the Oregon Department of Environmental Quality to establish an Air Quality Improvement Program. An Air Quality Commission was formed and a Plan adopted by Council Resolution Number 4122, Series 1991. This Air Quality Improvement Program is adopted as part of this Plan by reference.

Since 1991, the City of La Grande, using CMAQ funds and local street user fees, has been able to apply an oil mat surface to gravel streets in the City limits. This reduced the amount of dust substantially. In addition, the use of wood stoves declined during the 1990s and no additional exceedences of the air quality standards have been monitored. The Air Quality Commission has conducted a consistent community education program to ensure that citizens are aware of air quality issues. To date, only the voluntary aspects of the Air Quality Improvement Plan have been activated. The mandatory provisions have not been used.

Since ten years have elapsed from the date of adoption and implementation of the Air Quality Improvement Program, the City and DEQ will be working on a maintenance plan in the near future to ensure that air quality in La Grande stays within acceptable limits. In September of 2001, the Oregon Department of Environmental Quality (DEQ) indicated that Maintenance Plans are under development for Medford, Grants Pass and Klamath Falls. Once these Plans are completed, the DEQ will begin the process of developing an Air Quality Maintenance Plan for La Grande. In mid 2002, an air quality survey was prepared by DEQ for mailing to a selected sample of La Grande residents. The survey results will assist in the development of the Maintenance Plan. Once this Plan is approved, La Grande will return to attainment status.

At the local level, in 2001, Union County significantly improved its Smoke Management Program to better regulate field burning. Also in 2001, the City implemented tighter regulation of open burning in the City and enacted programs to promote the composting of yard waste. The number of Open Burning Permits for the Fall, 2001 burning season decreased to 88, compared to 145 permits for the Fall of 2000. Spring, 2002, Open Burning Permits numbered 151 compared to 322 in the Spring of 2001. The Yard Waste Recycling Program, which began operation in early August of 2001, diverted 276 tons of yard debris from the landfill and open burning by November 30, 2001, (a four month period), when the program closed for the season. During

2002, the Yard Waste Recycling Program attracted 5,965 customers with 1,419,980 pounds (710 tons) of yard waste.

Water Quality: As required by law, the City of La Grande annually reports to its water customers regarding the quality of the water they use. All sources of drinking water are subject to potential contamination by substances that are naturally occurring or man made. Municipal water is tested to ensure that Maximum Contaminant Level (MCL) standards are met. In 2002, the City reported that the water is safe and had passed Federal and State health standards.

La Grande obtains its water from five (5) active wells that tap the Grande Ronde Aquifer. Three (3) of the wells are shallow alluvial wells (the Gekeler, Island City and Highway 30 wells) and two (2) are deep basalt wells (the Second Street and "H" Avenue well and the Twelfth Street well).

La Grande no longer obtains water from the Beaver Creek Reservoir and Watershed southwest of the City. Due to turbidity problems in the past, it would be necessary to construct a water treatment plant to utilize this water source in the future.

Groundwater quality monitoring is ongoing in the vicinity of the Union Pacific Railroad yards in La Grande. A Diesel Impact Area Map appears in the Land Development Code to show what areas of the City may have been impacted by diesel fuel spills in the rail yard. The City updates the map as new information is received from the Oregon Department of Environmental Quality.

La Grande has been taking steps to improve surface water quality. The City participated in the Total Maximum Daily Load (TMDL) study for the Grande Ronde River and is investing about $12 million dollars to alter its wastewater treatment operation to take wastewater out of the Grande Ronde River. Wastewater will instead be used to create and enhance wetlands in the Ladd Marsh area southeast of the City.

The City recently installed signs on the curb above all storm water catch basins reading "No Dumping – Drains to River." The City has also been requiring bioswales in new developments to treat storm water before it enters the storm drain system.

The City's Riparian Zone Protection Article in the Land Development Code Ordinance will also have a positive impact on water quality. In written comments received from the Oregon Department of Fish and Wildlife, dated September 9, 2002, the agency recommends that the existing one hundred foot (100') riparian corridor boundary be established long-term for the Grande Ronde River.

The Oregon Department of Fish and Wildlife notes that "the Grande Ronde River, in the vicinity of La Grande, is habitat for Snake River spring Chinook salmon, Snake River summer steelhead, and Columbia River bull trout (all listed as threatened under the Federal Endangered Species Act). Habitat use includes migration corridor for all three species, seasonal rearing habitat for juvenile summer steelhead and juvenile spring Chinook salmon, and is potential spawning habitat for summer steelhead. The Grande Ronde River, in the vicinity of La Grande, has been designated as critical habitat for spring Chinook salmon and summer steelhead by the National Marine Fisheries Service and has been proposed as critical habitat for bull trout by the United States Fish and Wildlife Service. Research has shown that a wider riparian buffer width, such as a one hundred foot (100') buffer, will have greater benefits to fish habitat, channel stability, water quality and wildlife habitat than riparian buffers of lesser width. Benefits include: trapping of sediment; filtering of pollutants; trees that provide stream shade; large wood recruitment to stream channels for fish habitat diversity and complexity; stream bank stability; and maintenance and diversity of macro-invertebrate communities."

The Upper Grande Ronde River Sub-Basin TMDL and Water Quality Management Plan, dated December, 1999, indicates that the Grande Ronde River is water quality limited due to temperature, sediment, habitat, dissolved oxygen, pH, algae, nutrients, bacteria and low flow concerns. According to information received from the Oregon Department of Environmental Quality relating to the Section 319 Nonpoint Source Pollution Grant Program, the primary Section 319 project needs include measures to reduce temperatures, sedimentation, bacteria and nutrient loads, restore riparian shade and stabilize the channel.

In determining the appropriate Riparian Zone width to improve water quality in the Grande Ronde River, the City has taken into account the advice of the Oregon Department of Fish and Wildlife and consulted other sources of information, such as the Metro Goal 5 Report, dated July, 2002. Table 7 of this Report contains of summary of scientific studies of the range of riparian corridor widths needed to protect water quality and enhance fish and wildlife habitat.

For temperature regulation and shade, seven (7) studies are listed. Three (3) of the studies call for a riparian corridor width of 33 to 141 feet for this purpose. Four (4) of the studies call for a width of 98 to 250 feet. On average, the riparian corridor width recommended for temperature control is at least 100 feet.

For bank stabilization and sediment control, eight (8) studies are listed. The recommendations vary from 66 to 170 feet, with an average of 109.5 feet.

For pollutant removal, five (5) studies are listed. The recommendations vary from 33 to 141 feet. The two (2) studies recommending a fixed width versus a range of widths recommend a corridor width for this purpose of 98 feet and 100 feet.

For aquatic wildlife habitat, eight (8) studies are listed. The recommendations vary from 50 to 200 feet. The seven (7) studies recommending a fixed width versus a range of widths recommend an average width for this purpose of 113 feet.

Thus, the City of La Grande concludes that the riparian corridor width along both sides of the Grande Ronde River should be one hundred feet (100') to provide for water quality and thus fish habitat improvements. The Riparian Zone Protection Article in the Land Development Code Ordinance will contain this width.

For additional information regarding water quality, see the City of La Grande Public Facilities Plan and the Water Master Plan, which is adopted as part of this Plan by reference.

For additional information regarding storm water, see the City of La Grande Storm Water Master Plan, which is adopted as part of this Plan by reference.

In 2001, the City Council adopted a Storm Water Ordinance as a step toward implementation of the Storm Water Master Plan. This Ordinance regulates discharges into the storm water system and forms a storm water utility that can collect revenue (monthly storm water utility fees and a systems development charge) to begin addressing storm water capital improvement needs.

Noise Level Quality: Two of the major noise sources in La Grande are the Union Pacific Railroad mainline and Interstate 84. The Department of Environmental Quality recommended allowable statistical noise levels for industrial and commercial noise sources was used as a basis of comparison for a City conducted noise survey. These recommended levels are:

7:00 a.m. to 10:00 p.m.	10:00 p.m. to 7:00 a.m.	Taken at 4:00 p.m. City Study Results
L50 – 55 dBA	L50 – 50 dBA	L50 – 40 dBA
L10 – 60 dBA	L10 – 55 dBA	L10 – 71 dBA
L1 – 75 dBA	L1 – 60 dBA	L1 – 79 dBA

The "L" factor is noise level that is exceeded for the noted percentage of time--for example, L50 indicates the level of noise exceeded 50% of the time. The recommended levels were for point use. La Grande does not have a source of noise in the urban area of this type to compare with DEQ's recommendations. The City data was collected on property adjacent to the freeway which is being proposed for subdivision activity. The intermittent passing of trucks caused the low percentage of noise to be very high but the 50% noise levels were less than the maximum allowable. The City has been unable to obtain recommended noise level standards for traffic generated noise. Noise levels along freeways are regulated by the Oregon Department of Transportation Noise Manual, last updated in 1996 and subsequent editions.

Railroad noise is associated with passing trains and their whistles. The Federal Railroad Administration is in the rule-making process regarding the use of locomotive horns. The City should continue to monitor this rule-making process to determine whether the City can obtain "Quiet Zone" status. Doing so may require additional safety measures at "at-grade" rail crossings and an education-enforcement program.

Objective –

1. To maintain and improve the quality of the air, water and land resources of La Grande. Achievement of a natural resource use pattern which gives as much importance to providing for tomorrow's needs and the protection of the natural environment as to providing for the needs of today.

Policy –

1. That those uses emitting noise and air pollution be located so as not to infringe upon the quality of residential living.

2. That buffer or transition areas be encouraged between industrial and residential uses.

3. That every effort be made to protect the air, water, and land resource from destruction or degradation by urban uses.

4. The City of La Grande shall support and cooperate with the Department of Environmental Quality in their efforts under this program.

5. The City of La Grande shall continue to support and cooperate in all air, water, and noise pollution monitoring through its own efforts or that of the DEQ or other agencies.

6. The City shall review all land use proposals to determine if there may be possible detrimental aspects to the air, water, and noise quality and make sure that these uses conform in all respects to the state and federal emission regulations.

7. The City shall cooperate with the Department of Environmental Quality and the Department of Water Resources in maintaining and evaluating sensitive water aquifers in the City and the Urban Growth Boundary.

8. The City will work with the Department of Environmental Quality to resolve air quality problems within the City and its Urban Growth Boundary.

Recommendations –
1. That the City should continue to work with the County in developing a solid waste program that meets state and federal regulations.

2. The zoning ordinance should provide for the protection of air, water, and land resources from the development of specific urban uses.

Statewide Planning Goal 7 - Areas Subject to Natural Disasters and Hazards

Within the La Grande area there exists three recognized natural hazards which may impose constraints on development. The first natural hazard was identified in 1971 when the Oregon Department of Geology and Mineral Industries printed a report entitled "Engineering Geology of the La Grande Area." A large area on the west and south portions of La Grande was indicated as a potential landslide area requiring further study before development consideration. Since 1971 some additional building has occurred in this area and some evidence of soil mass movement has resulted. Therefore the City initiated further study in an effort to more fully realize the appropriateness of allowing further development to occur in the areas identified as potentially hazardous in the 1971 report.

The study of this is entitled “Soil and Hydrologic Properties and Processes Affecting the Stability of Hillslopes in the La Grande Area and the Potential for Residential Development” and was completed in April 1983. As a result, approximately 274 acres of land on the west side of La Grande has been excluded from the planning area. The area south of La Grande is concluded to be suitable for urban densities with appropriate site plan review of individual development projects. Therefore the UGB includes a portion of the previously identified "geologic hazard area." The report, “Soil and Hydrologic {Properties and Processes Affecting the Stability of Hillslopes in the La Grande Area and the Potential for Residential Development,” shall be a supporting document of this Plan.

This report identifies the natural and man made influences upon the landslide hazard area which must be considered in reviewing alternatives for development. This report, in conjunction with the Geological Hazard Overlay Zone identified in the Zoning Ordinance, will be implemented when development is proposed in the hazardous areas identified by the Natural Hazard Map and within the La Grande UGB.

Since the adoption of the Comprehensive Plan in December, 1983, when the original response to Goal 7, Natural Hazards, was drafted, the City has experienced increased hillside residential development. This hillside development, although subject to the Geohazard Site Review process, has produced increased downstream flooding, increased erosion due to removal of natural ground vegetation and cutting slopes, and damage to public improvements from increased storm water velocities. The national Clean Water Act National Pollution Discharge Elimination System (NPDES) regulations have increased local requirements for erosion and sedimentation controls. These changes in conditions and regulations have prompted the City to consider a Hillside Development Ordinance to add further standards to residential development on slopes of 25% or greater.

The second known natural hazard is the flood plain and floodway areas within the UGB. Much of the existing City is built in the flood plain as designated by the U.S. Army Corps of Engineers. The majority of the flood plain within the UGB is designated Zone B subject to one foot or less of water in a 100-year flood. In order to regulate development with*in* the flood plain area, the City has adopted the Flood Management Regulations as required by the Department of Housing and Urban Development and incorporated those provisions with the La Grande Zoning Ordinance.

The third known natural hazard is residual diesel fuel. The residual diesel fuel located in the shallow aquifer within the area legally specified in Exhibit “A” entitled “Diesel Fuel Contamination Area” presents a potential danger to the public health and the environment if disturbed. The area is designated for residential and light commercial uses in the City’s Comprehensive Plan. To assure that potential environmental hazards are not created through the

use of shallow groundwater in this area, any new well or any changes or alterations to the construction of existing wells will require notification, review and approval by the Water Resources Department and the Department of Environmental Quality. The review shall take place prior to the issuance of well construction permits.

Objective –
1. To protect life and property from natural disasters and hazards.

Policies –
1. Special consideration must be given to development activities of any nature or type on the colluvial slope formation in the west and southwest portion of the planning area.

2. That the channel and floodway of the Grande Ronde River be kept free of obstructions or any other impediments to the free flow of water.

3. That the impact of high ground water be considered before allowing urban development to the east.

4. That development in floodway fringe areas be limited to that which can be constructed to minimize flood losses.

5. That floodway portions be given special attention to avoid development that is likely to cause an impediment to the flow of floodwaters.

6. Individual development request within the Geologic Hazard Area shall receive site plan review as required by the zoning ordinance.

7. The City shall continue to solicit the advice of the Corps of Engineers on all matters affecting the alteration of areas which may change the course or height of floodwaters.

8. The flood hazard areas shall be shown as an overlay zone on a map together with the geologic hazard areas.

9. For any proposed change or alteration of existing wells in the area legally described in Exhibit "A" entitled Diesel Fuel Contamination Area, notice shall be given to the Department of Environmental Quality.

10. No well may be constructed within the area so specified without approval from the Oregon Department of Environmental Quality.

11. The City shall adopt a Hillside Development standard to regulate residential development in hillsides equal to or greater than 25% slope, or in hillside areas where there has been a history of slope failure giving special consideration to parcel minimum size and impacts on slope stability.

Recommendations –
1. That the issuance of permits for development on existing lots in areas of landslide hazards should be subject to the submission of evidence that the geologic and soil conditions are satisfactory for the purpose of the proposed development and that construction on the site will not adversely affect down-slope lands.

Statewide Planning Goal 8 - Recreational Needs

Park Master Plan Background: The responsibility of the City of La Grande Parks and Recreation Department is to:

1. Develop recreational activities for La Grande citizens of all ages and maintain the parks and related facilities.

2. Ensure all citizens of La Grande have equal access to parks, recreational activities, and facilities.

3. Promote cooperation and partnership between public entities and private citizens in the development of park facilities and recreation programs.

4. Plan for the acquisition and development of additional park lands.

Purpose: The purpose of this Park and Recreation Master Plan is to prepare an effective Plan to guide the La Grande Parks and Recreation Department in meeting the park and recreation needs of the citizens of La Grande, Oregon. The Plan is a tool for planning, programming, and budgeting for the Parks and Recreation Department. This will accomplish the following efforts:

1. Identify current and future park and recreation needs and desires of the citizens.

2. Identify and analyze a range of alternative ways to meet these needs and select the proposals which will best meet citizen needs and financial capabilities.

3. Establish an ongoing long-range park and recreational planning process within the department -- a process that will involve plan preparation and annual review and updating of the plan's recommendations due to changing conditions and attitudes.

4. Coordinate the Park Master Plan with the City's Comprehensive Plan.

Objectives -

1. To identify and measure the needs and desires of the City's residents for park and recreational facilities and programs.

2. To preserve and protect areas of unique natural and scenic importance for their original and intrinsic value.

3. To maintain a relationship with our past through the retention of historical park sites and structures.

4. To provide a system of multipurpose parks for active and passive recreation.

5. To actively participate in the planning of urban growth and general land use.

6. To provide for the unique recreational needs of the young, the aged, and people with disabilities.

7. To optimize use of the public dollar through:

8. cooperative and coordinated facility establishment and program development; and

9. scheduling of acquisition and development.

Time Period: The time period of this study is ten years, 1996 to 2006, and the recommendations are desired to be achieved during this time period.

Standards: The *Recreation, Park, and Open Space Standards and Guidelines*, compiled by the National Recreation and Park Association (NRPA), will be used as a general guideline. Adjustments due to the geographic, cultural, climatic, and socioeconomic uniqueness of La Grande will be made when appropriate.

NRPA suggests that a park system, at a minimum, be composed of a "core" system of parklands with a total space of 6.25 to 10.5 acres of developed open space per 1,000 population. La Grande currently has 40.5 acres of developed parklands, 4.17 acres of undeveloped parklands and 5 acres of landscape areas within the Urban Growth Boundary to serve a population of 12,195. School parks provide an additional 34.68 acres. The City of La Grande also owns and maintains Morgan Lake which is 204.5 acres outside of the City's Urban Growth Boundary.

Definitions:

Mini Park	Small area used as a pedestrian rest and relaxation area.	Reynolds Park
Neighborhood Park	Open grassy areas for spontaneous play; picnic tables and benches for passive recreation; child play areas; and/or multi-use courts.	Benton Park Birnie Park Candy Cane Park Garden Club Sunnyhill Park
School Grounds	Land owned and maintained by the La Grande School District which is available for community use.	Greenwood Riveria Willow High School Middle School
City/School Park	Facilities jointly developed by the City and the La Grande School District with agreements outlining uses and maintenance.	Central Tennis Courts at La Grande High School
Community Park	Area of diverse recreational opportunities which could include athletic fields; tennis courts; horseshoe pits; volleyball courts; picnic areas; playgrounds; skateboard facilities; specialty gardens; walking paths; and/or pavilions.	Pioneer Park Riverside Park
Special Use Park	Area for specialized recreational activities which could include walking; viewing; educational; and/or informational.	Gangloff Park

Regional Park	Area of natural quality for nature oriented outdoor recreation which could include picnicking, hiking, fishing, and/or boating.	Morgan Lake
Landscape Areas	Area designed for aesthetic value only	Island Avenue Greenway

Inventory: The following charts are of existing park facilities inventoried to show location, size, use, and existing equipment.

PARK	DESCRIPTION	AMENITIES
Benton Park	Neighborhood (1.42 acres) park located at the corner of Third Street and Benton Avenue.	Open Space Playground Equipment
Birnie Park	Neighborhood (2.2 acres) park located on "C" Avenue near Sixth Street.	4 Picnic Tables 7 Park Benches Small Shelter 4 BBQ Pits Drinking Fountain Walking Paths Playground Equipment Open Space Oregon Trail Display
Candy Cane Park	Neighborhood (1.77 acres) park located on the corner of Twelfth Street and "J" Avenue	1 Picnic Table 1 Park Bench 1 BBQ Pit Playground Equipment Basketball Court Softball Field 1 Dugout Open Space
PARK	**DESCRIPTION**	**AMENITIES**
Central	City/School Park (14.9 acres) located adjacent to Central School, 402 "K" Avenue.	Multi-Use Field Volleyball Court Playground Equipment Exercise Area Arboretum
Gangloff Park	Special use (2.5 acres) park located at the entrance to La Grande on Oregon Highway 30, designed and maintained by the Native Plant Society.	3 Picnic Tables 2 Park Benches Open Space Log Cabin Signature Rock Native Vegetation Walking Trails
Garden Club Park	Neighborhood (0.5 acre) park located at the corner of "Y"	1 Picnic Table Playground Equipment

	Avenue and Depot Street.	
Greenwood	La Grande School District Playground (3.757 acres) located across from Greenwood School, 2300 North Spruce.	Multi-Use Field Playground Equipment Basketball Court Volleyball Court Tether Ball Pole
High School	La Grande School District Sports Facility and City/School Park (5.19 acres) located adjacent to La Grande High School, 708 "K" Avenue.	2 Multi-Use Fields Track Facility 4 Tennis Courts
Island Avenue Greenway	Landscape Area (5 acres) adjacent to Island Avenue from Monroe Avenue to the City limits of Island City.	
Middle School	La Grande School District Sports Facility (6.409 acres) located adjacent to La Grande Middle School, 1108 Fourth Street.	Soccer Field Basketball Court Volleyball Court
Morgan Lake	Regional (204.5 acres) park three miles west of La Grande on Morgan Lake Road.	12 Picnic Tables 5 BBQ Pits Fishing Camping Boating (Limited) Restrooms
PARK	**DESCRIPTION**	**AMENITIES**
Pioneer Park	Community (18.7 acres) park located at the corner of Alder Street and Palmer Avenue.	2 Picnic Tables Covered Picnic Table Swim Pool 2 Tennis Courts 2 Volleyball Courts 7 Multi-use Fields Playground Equipment Skateboard Park Restrooms Open Space
Reynolds Park	Small (.01 acre) mini-park located adjacent to the Reynolds Building on Washington Avenue between Fourth and Depot Streets.	1 Park Bench
Riveria	La La Grande School District Playground (1.211 acres) located adjacent to Riveria	Multi-Use Field Playground Equipment Basketball Court

	School, 2609 North Second Street.	3 Tether Ball Poles
Riverside Park	Community (12.4 acres) park located in the City's Urban Growth Boundary at the corner of Spruce Street and Fruitdale Lane.	Open Space Playground Equipment 4 Picnic Tables 4 Park Benches Volleyball Court 12 Horseshoe Pits Pavilion Restrooms 4 BBQ Pits
Sunnyhill Park	Neighborhood (1 acre) park located at the corner of Aquarius Way and Gemini Street.	Open Space
Willow	La Grande School District Playground (2.611 acres) located adjacent to Willow School, 1305 Willow Street.	Baseball Field Playground Equipment Basketball Court Tennis Wall Blacktop Play Area 2 Tether Ball Poles

Policies:

General Policies:
1. Facilities within a park may be adjusted to meet the needs and desires of an area and the character of the site.

2. When a park or related facility is to be located in or near the City of La Grande, City input will be utilized in acquisition, development, and maintenance of the that facility (to provide for coordination with other existing and planned local facilities).

3. Acquisition of land through donations or long-term lease will be encouraged.

Mini-Park Policies:
1. Mini-Parks may require high priority funding for acquisition; however, they will have a low priority for maintenance.

2. The use of volunteer groups to provide maintenance of these parks will also be encouraged.

Neighborhood Park Policies:
1. Neighborhood park facilities are for spontaneous use by residents. Highly organized, competitive sports are strongly discouraged.

2. Restroom facilities will not normally be provided in neighborhood parks.

3. Neighborhood parks will have second priority for maintenance.

School Ground Policies:
1. School Ground Policies will be developed by the La Grande School District who is responsible for their use and maintenance.

City School/Park Policies
1. City School/Park Facilities are built in conjunction with public schools to serve a community need.

2. Maintenance priorities are determined by joint agreement.

Community Park Policies:
1. Restroom facilities will be provided where possible.

2. Community Parks will have first priority for maintenance.

Regional Park Policies:
1. It is desirable to have an appropriate balance of organized recreational facilities and areas retained in their natural state to provide opportunities for picnicking, walking, riding, boating and various types of passive recreation.

2. Site selections should take into consideration topography and physical features such as rivers, areas containing rugged topography, and heavy wooded areas.

3. Regional parks are to provide escape from the urban noise and congestion. Therefore, sport facilities should be on a less formal basis than in the community parks.

4. Regional parks need not be located within the City, but should be in or adjacent to the Urban Growth Boundary.

5. Restroom facilities should be provided.

Open Space:
1. Multiple use of lands such as adjacent to reservoirs, river beds, land reclamation sites, power line rights-of-ways, flood control areas, public transportation right-of-way, under overpasses, etc., are encouraged as open space providing public heath and safety standards are met.

2. Provision for open space should be encouraged on federally assisted programs such as urban renewal and neighborhood development program areas.

3. Encourage much of the land adjacent to and outside the urban growth boundary be preserved in its natural state.

4. Encourage the private land owner to preserve lands functioning as open space.

5. Encourage preservation of lands adjacent to major streams as open space.

6. Tree preservation and planting to separate conflicting uses and provide scenic and recreational opportunities should be encouraged whenever feasible.

7. Scenic and historic sites should be preserved and utilized as open space.

Landscape Areas:
1. These areas can be valuable assets in a heavily populated section, providing space for both passive and active recreation as well as energy conservation and aesthetic value. Well landscaped areas enhance the value of private, commercial and public spaces.

Off-Road Vehicle:
1. Development should be in areas which have little other use and where the activity will not result in resource damage. Example: an old gravel road extraction site.

2. These facilities should be located and planned to minimize harassment of wildlife and adjacent land uses.

3. All property lines should be well marked. Four-wheel drive vehicles and dirt bikes should be used on separate sections of the site or at separate times.

Golf Courses:
1. Should be furnished by private enterprise.

Ice and Skate Rinks:
1. Should be furnished by private enterprise.

Recommendations –
1. The following recommendations are for Neighborhood and Community Parks within the Urban Growth Boundary through 2006. They reflect the application of both the standards and policies to derive at what the needs of the urban population are and where they should be supplied.

2. Concentration on developing and improving existing parklands & recreation sites before acquiring new sites.

3. Negotiate agreements between the City, School District, Eastern Oregon State College, Union County Fairgrounds, etc. to use their respective grounds and facilities for public recreational purposes.

4. Neighborhood Parks to be developed in conjunction with new elementary schools.

5. Community Parks to be developed in conjunction with new middle or high schools.

6. Monies should be set aside annually for acquisition and development of park lands as they become available.

7. Areas 3, 5 and 8 are designated as high priority for acquisition of neighborhood parks (See Map at Attachment A).

8. Area 4 is designated a high priority for acquisition of a community park.

9. The *Recreation Activity Survey* conducted in 1994 identified the following:

   A. The majority of respondents indicated that recreational opportunities were inadequate, especially for the youth in the community, and that improvements were needed to existing recreational facilities. In general, respondents were not in favor of elaborate renovation or the building of new expensive facilities. Rather they indicated a need to provide a better care and support to existing facilities, especially to City parks and to the

library. Specific improvements or additions to existing facilities included cleaning up and expanding bike paths and connecting them into route around the City and through the parks, and providing community swimming and bowling lane facilities.

B. Respondents listed Parks, the Library, Swimming Pool, Movie Theater, and Bicycle Paths among the most important recreational facilities. The recreation facilities which received the highest ratings for quality were Parks, the Library, Senior Center and Morgan Lake. The recreational facilities which received the lowest ratings for quality were Bowling, Swimming Pool, Jogging Paths, and Skateboard Park.

C. Respondents listed Walking, Reading, Watching Television, Fishing, Cycling, and Hunting as the most frequent recreation activity. If provided with greater opportunity, the majority of respondents would engage in more Swimming, Bowling, Golf, Concerts and Bicycling.

D. Overall, there is a great demand for increased public recreational opportunities, and for additional City support to improve existing facilities, respondents indicated a need for a swimming pool, bowling alley and public golf course. In particular, respondents indicated a desire for the City to improve the existing facilities, especially the system of parks to include bicycle and jogging paths along the river.

Capital Improvement List

Short Term
1. Completion of Sunnyhill and Gangloff parks.
2. Establish a maintenance shop for park equipment.
3. Construct a parking lot on the west side of Pioneer Park and pave concession stand area.
4. Construct a toddler playground.
5. Complete improvements to Morgan Lake Dam.
6. Revamp all tennis courts.
7. Construct a playground for children with disabilities.

Long Term
1. Establish additional multi-use fields.
2. Construct ADA Hiking Paths at Riverside and Morgan Lake.
3. Establish Greenbelt/Greenway.
4. Purchase a water slide for the Veterans' Memorial Swim Pool.
5. Construct park for skateboards and in-line skates.
6. Construct new pavilion.
7. Acquire vacant land for park development.
8. Rip Rap Riverside Park.

Statewide Planning Goal 9 - Economic Development

I. Introduction

Located in eastern Oregon's Union County, the City of La Grande has historically based its local economy on resource-based industries, such as livestock, farming and wood products. Other important elements of the City's economy include the Union Pacific Railroad, education and government. In recent times, the resource-based industries have experienced a significant amount of downsizing, a trend that is expected to continue in the future. La Grande's economy needs new business and industry, which will provide its residents with a wide range of jobs that offer a competitive, family wage. Over the past few years the City and County have taken positive steps towards stimulating La Grande's economy, which in turn will improve the quality of life for its populace.

This section:

- Reviews the current national, state and local economic trends, and utilizes these trends in order to guide the City of La Grande's economic development program.
- Outlines the types of sites, commercial and industrial sites, that are needed in the community for existing businesses to expand and new businesses to locate in the area according to current national, state and local trends.
- Assesses the community's economic development potential by estimating the types and amount of industrial and commercial development that is likely to occur in the planning area. The estimate is based on information concerning economic growth trends; site requirements and the conclusions of the industrial and commercial lands inventory. In addition, this analysis considers the City's economic development advantages and disadvantages with regards to attracting new or expanding industrial and commercial uses.

Pertinent economic advantages and disadvantages that have been considered are: location relative to markets; availability of key transportation facilities; key public facilities as defined by OAR Chapter 660, Division 11 and public services; labor market factors; necessary support services; and education and technical training programs.

II. Goals, Objectives and Policies

The following goals, objectives and policies have been formulated by the City to direct the community's economic development program during the next five to ten years.

A. GOALS

Goal 1 – Create High Quality Family Wage Jobs
Promote industrial and commercial development that generates high quality family wage jobs and income for the community and creates sustainable and environmentally sound economic vitality.

Goal 2 – Foster the growth and expansion of Eastern Oregon University

Support the university in its efforts to grow and target educational programs to the region and the state. Provide sites and other infrastructure to businesses seeking to partner with the university.

Goal 3 – Promote Retail Development
Promote the development of the City as a Regional Shopping Center by providing a greater range of retail services for residents and visitors. As a Regional Center, allow residents to satisfy their shopping needs within the Community and provide a greater range of services for travelers on I-84.

Goal 4 – Revitalize the Downtown
Revitalize the Central Business District by building on its historic character, expanding the mix of goods and services offered and creating public spaces and amenities.

Goal 5 – Attract new Residents seeking a Quality Residential Environment
Attract new residents with entrepreneurial skills to La Grande that operate in-home businesses or are semi-retired and desire a mid-sized community with sites for larger quality residences.

B. OBJECTIVES

1. Provide public improvements and infrastructure to support job-creating development. Provide planning and funding for public improvements including streets, utilities, telecommunications and other facilities in support of development that will create a range of types of family wage jobs for residents of La Grande.

2. Provide appropriate sites for businesses creating family wage jobs. Assist in land assembly and infrastructure development for a quality business park to attract businesses that create family wage jobs. Limit the allowable uses in the business park to ensure that the land is properly utilized.

3. Coordinate the City's economic development program with the citizens of La Grande, community-based organizations, Union County, Union County Economic Development Corporation, the Chamber of Commerce, the Oregon Community and Economic Development Department (OCEDD), Northeast Oregon Economic Development District and other local, regional, state and federal agencies.

4. Continue and enhance the City's economic development program with EOU as a means of attracting and retaining businesses.

5. Provide public improvements to sites for retail development. Plan and develop infrastructure and public facilities to encourage retail and mixed-use projects.

6. Assure the availability of mid-sized residential sites with views or other aesthetic attractions by providing infrastructure and other public improvements that will attract quality residential developments.

C. POLICIES

1. That suitability of a proposed industrial development will be evaluated according, but not limited, to the following factors: availability of labor force and materials, market locations, transportation and service needs, relationship to present economic base and similar considerations.

2. That the City will encourage additional industrial and non-industrial development in the area, providing such development does not have a detrimental effect on living conditions.

3. That adequate and convenient vehicle and bicycle access and parking to accommodate customers and employees be provided in commercial areas.

4. That the Central Business District retail and service uses remain concentrated and consolidated rather than geographically expanded.

5. That business development occurs only after sufficient right-of-way, improvements, and special control of access points have been obtained to accommodate the added traffic generated.

6. That highway-oriented businesses shall be located near intersections of major arterials.

7. That the grouping of commercial uses in such a manner as will facilitate customer involvement from one store to another be encouraged.

8. That the commercial areas be located so as to provide good access between them and the trade area served.

9. That space for industries be reasonably scaled to the anticipated demand and need.

10. That in order that residential areas may be free from industrial traffic, industrial areas be located with access provided primarily to and from major transportation routes which include arterial truck routes, expressways, freeways, and railroad lines.

11. That land uses, other than industrial or industrially related uses, be prohibited from light and heavy industrial areas by specifying the permissible uses in the Light Industrial and Heavy Industrial zones.

12. That certain industrial uses generating heavy traffic, noise, smoke, or other nuisances shall be located where it is feasible to provide a transition, with light industrial areas, commercial areas, or open space to adjoining land uses.

13. Residential development; i.e., residential units, shall be supported and encouraged on the second and higher floors in the Central Business Zone. Residential uses shall also be permitted on the main and higher floors as identified in the "Residential Overlay Zone Map", in an area of the GC General Commercial Zone, provided that the store front is used for retail or other commercial purposes.

14. The City shall support mixed use residential, commercial and institutional development in the vicinity of the train station.

15. The City shall support new commercial development along alleys in the downtown.

16. The City shall support enhancement of the existing Historic District in the downtown in order to help restore and protect historic buildings and create a sense of pride among property owners.

17. That the City shall maintain at least a ten (10) year supply of vacant serviceable land in a range of parcel sizes within the Urban Growth Boundary to accommodate new employers and the growth of existing employers.

18. That the City shall market the availability of commercial, industrial, and business park sites to potential employers who provide family wage jobs. Such marketing will include a description and timeline for the required land use approvals.

19. That the City or its urban renewal agency shall seek to aggregate and redevelop commercial parcels in the area bounded by Cove Avenue, North Albany Street, East R Avenue, and the Grande Ronde Ditch for commercial uses.

20. That the City shall protect lots with existing areas of two and one half (2½) acres or more in commercial and industrial zones by requiring approval of a Master Plan to govern proposed uses, development patterns, and parcel sizes, along with subdivisions, partitions, and property line adjustments. The Master Plan shall be used to maximize the long-term potential for commercial and industrial employment in accordance with Goal 9 of the Comprehensive Plan. The Development Code shall be amended within 12 months of adoption of this amendment to require a Master Plan.

21. That the land areas illustrated on Exhibit 2 proposed to be added to the UGB and the site for re-designation from residential to industrial shall be reserved for businesses which demonstrate an actual need for sites of ten (10) acres or larger per business. The Development Code shall be amended within 12 months of

adoption of this amendment to require a Master Plan to govern the development patterns, parcel sizes along with subdivisions, partitions, and property line adjustments. The Master Plan shall be used to maximize the long term potential for commercial and industrial employment in accordance with Goal 9 of the Comprehensive Plan and shall provide for the maximum use of the lots reasonably feasible consistent with all other applicable requirements of law.

22. The City shall consider the establishment of Urban Reserve Areas (URA) adjacent to the UGB to identify the location of future Commercial and Industrial lands that the City will likely include in future Urban Growth Boundary expansions. The City of La Grande shall coordinate with Union County regarding the designation of URAs adjacent to the UGB for Heavy and Medium Industrial uses.

23. That the area illustrated on Exhibit 2 proposed for re-designation from residential to industrial shall be zoned for Heavy Industrial uses adjacent to the Union Pacific Railroad right-of-way with light industrial uses designated adjacent to East "H" Avenue. The physical boundaries of the zoning designation for both the light and heavy industrial uses shall be determined at the time the re-designation occurs.

24. The City shall consider the following development standards:

A. Separate noise sensitive and noise-producing land uses; minimize noise impacts on surrounding properties and protect and maintain the quiet character of those areas of the community unaffected by major noise sources, and locate, design and buffer noise producing land uses to protect noise sensitive land uses.

B. Regulate the type and intensity of land uses within areas subject to natural disasters and hazards.

C. Require that all development along arterials and major collectors, be preceded by and consistent with an approved Master Plan.

D. A detailed traffic analysis shall accompany a Master Plan, when a Master Plan is required, which finds that existing streets and intersections both on and off-site will accommodate the projected traffic increases, or; necessary improvements can be constructed which are in conformance with the Comprehensive Plan Transportation Map.

E. Commercial and industrial parking shall not intrude into adjacent residential neighborhoods.

F. When a Master Plan is required, incorporate into the Master Plan the following:

a. Provide the full range of required public facilities and services and pay commensurate system development charges;

b. Mitigate adverse impacts such as noise, traffic and visual aesthetics, on adjacent land uses through methods such as buffering, screening, parking controls, height, bulk and scale limits;

c. Participate in the development of a street system which provides efficient connection to higher order streets and to other activity centers;

d. Develop transit opportunities appropriate to the scale and character of the project;

e. Provide for a safe and convenient pedestrian and bicycle circulation system to and within the development;

f. Provide adequate, but not excessive parking for customers and employees; and,

g. Preserve natural resources and provide required open space.

G. When a Master Plan is required, require that the Master Plan show:

a. Projects at full development including identification of all phases;

b. The locational, design and transportation relationships of proposed development with the rest of the business district and with surrounding land uses;

c. Measures necessary to mitigate adverse impacts on the transportation system and on adjacent land uses; and,

d. Design compatibility with surrounding land uses in regard to elements such as scale, bulk, materials, colors and landscaping.

H. Support redevelopment of existing vacant and underutilized industrial and commercial lands rather than designating additional lands for these purposes.

I. Require all commercial and manufacturing operations, except those approved as a temporary use, including warehousing and storage, to be conducted either within enclosed buildings or screened from public view.

J. Allow mixed use development to provide opportunities for commercial, entertainment, professional, cultural, public, and residential activities.

K. To maximize the development of land uses that generate jobs in such a way that it maximizes the number of jobs per acre.

L. Industrial and commercial development adjacent to rail lines shall be designed and constructed in a way that does not preclude the future use of the rail facility.

M. Given the community's intention to prevent decline in existing commercial areas, the City shall explore opportunities to facilitate and assist in the redevelopment of existing commercial areas, in a manner that meets current standards.

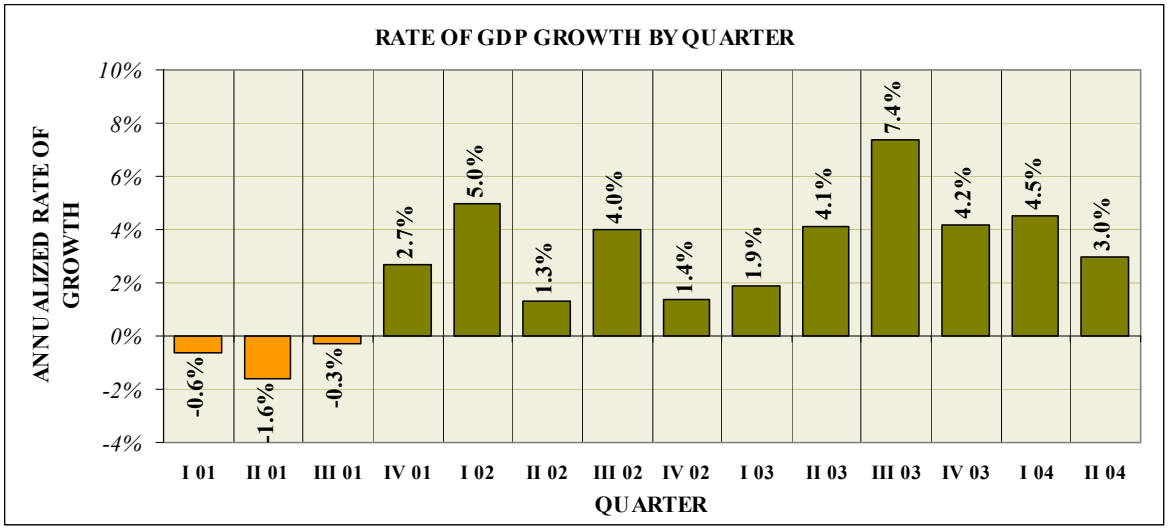
N. The City shall develop standards in the Land Development Code to encourage or require with development or redevelopment, the consolidation of vehicle accesses on arterial streets and major collectors, where appropriate and practical.

III. Economic Trends

A. NATIONAL TRENDS

The U.S. economy is presently in expansion based on growth in national production measured by Gross Domestic Product (GDP).[5] The U.S. Department of Commerce has recorded twelve consecutive fiscal quarters where U.S. production growth has increased, nine of which have exceeded the pace of inflation.[6] A summary of GDP growth rates over the last three years is summarized in the Table below.

Table 1



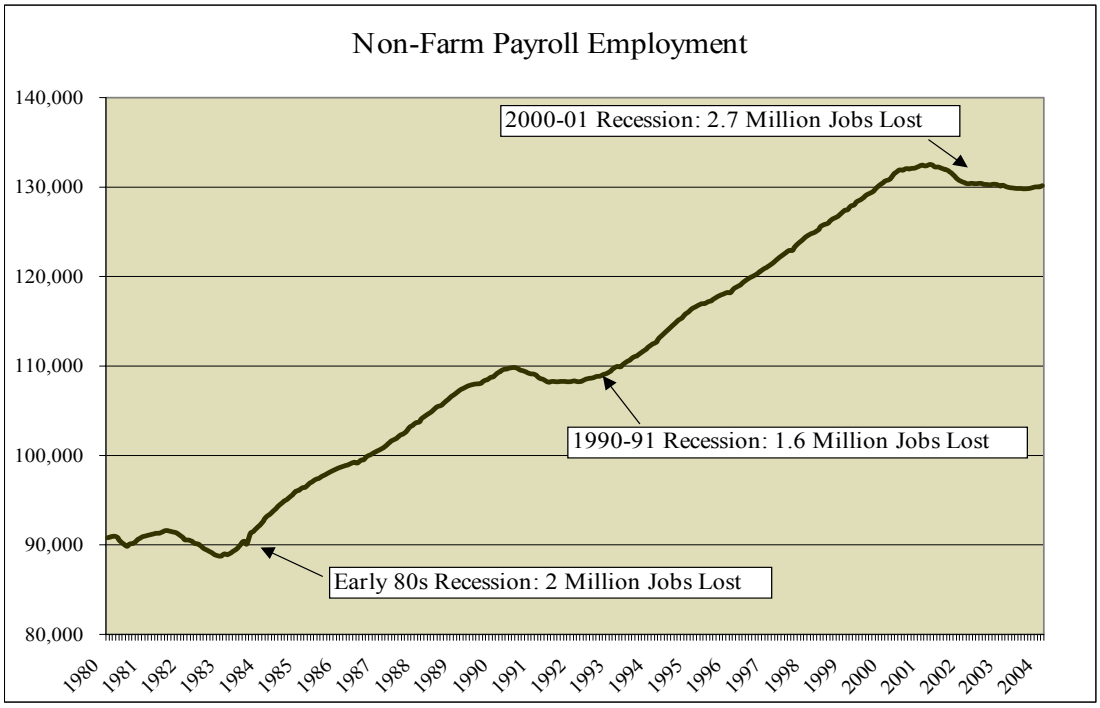
SOURCE: U.S. Bureau of Economic Analysis

[5] Gross Domestic Product is officially defined as the combined economic production activity occurring within U.S. borders, typically on a three-month quarterly basis. Production activity can be due to domestic or foreign firms so long as the activity occurred within the continental U.S.

[6] GDP growth in excess of national inflation signifies real expansion in activity rather than growth due simply to price increases. Inflation as measured by the U.S. Bureau of Economic Analysis frequently varies between 2.5% and 3.0% annually.

By traditional measures, the 2000-2001 recession was a reasonably shallow one as measured by national production. However, payroll employment losses – unemployment insurance-covered jobs shed by firms – were significantly greater than the previous two recessions as demonstrated in the table on the following page.

Table 2



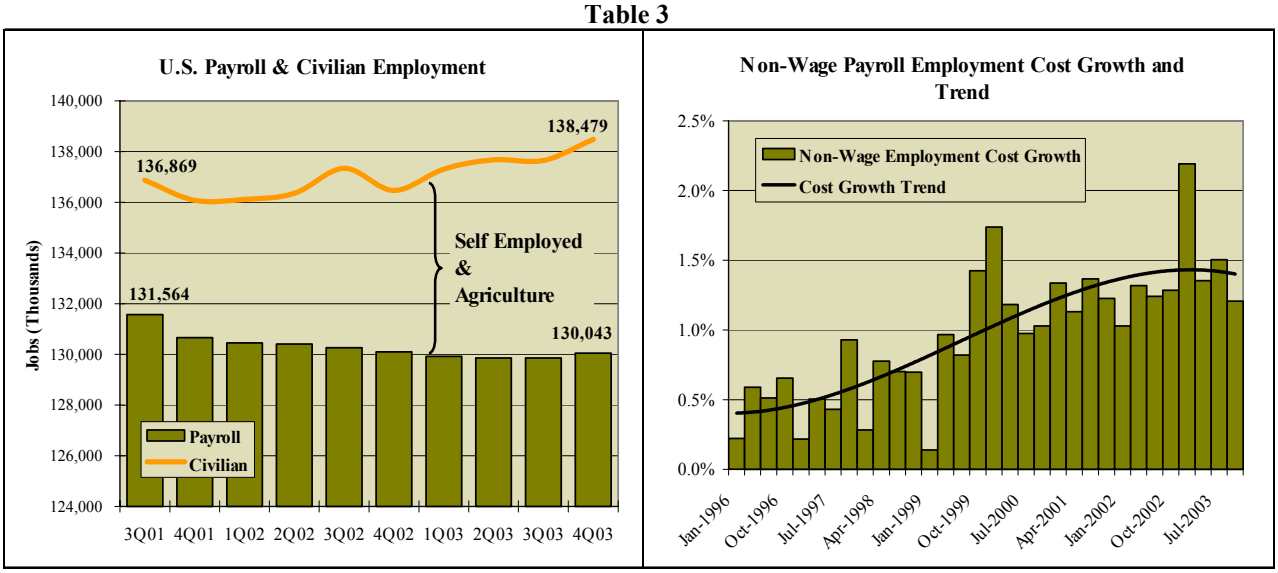
SOURCE: U.S. Bureau of Labor Statistics

At the end of 2004, the cause for disparity between significant job losses and minimal national production decline has not yet been determined. The following trends appear to have combined and contributed:

- Regional Recessions: Unlike previous recessions, the 2000-01 downturn was felt far more acutely in different regions of the country than others. The Pacific Northwest economy, anchored by significant transportation manufacturing and high-tech industries, fell victim to a one-two punch of the 2000 "Tech Wreck" decline in technology companies and the 9/11 shock to the travel industry, particularly need for new commercial airplanes.
- Low Interest Rates: Economic weakness, trade balances with Asia and Federal Reserve policy have kept long-term and short-term interest rates at historic lows. The result is that residential construction and financial sectors have boomed nationwide like never before.
- Government Spending: Federal tax cuts paired with significant expansion in Federal spending due to war have both sustained consumer spending and increased production by contractors to the government, though the range of beneficiary industries is relatively limited.

- Growing Business Overhead Costs: As demonstrated in the following table, the U.S. Bureau of Labor Statistics Index of Non-Wage Payroll Employment Costs has significantly increased over the past several years to its highest levels in two decades, dampening incentives to incur cost of new hiring.

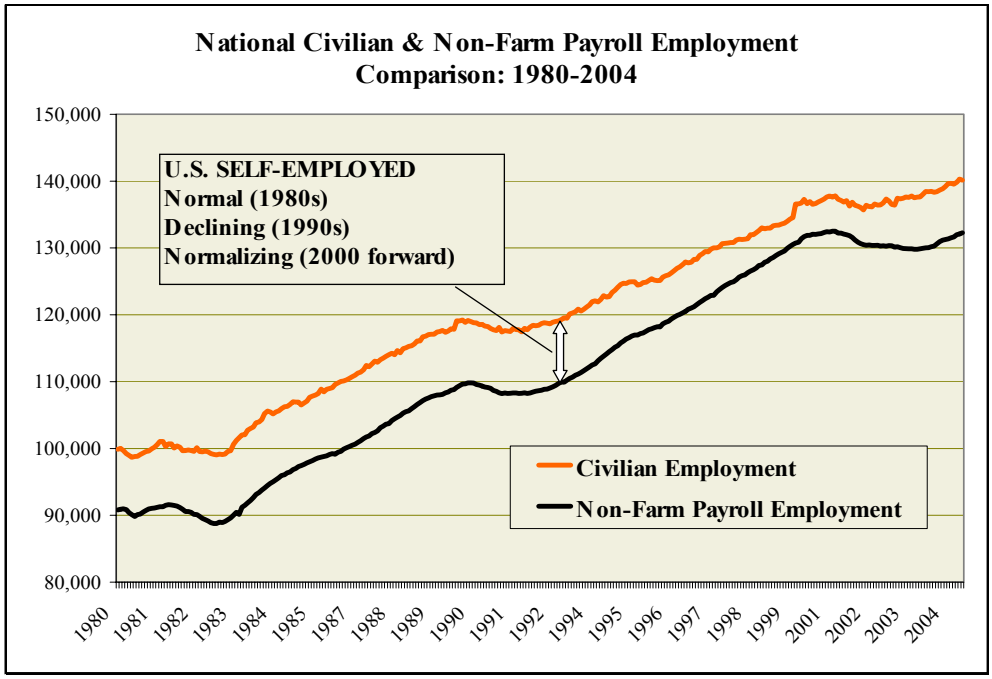
Table 3



SOURCE: U.S. Bureau of Labor Statistics

Adding to the above factors in explaining sustained national production is the changing nature of employment for the nation's labor force. Although payroll jobs have declined since 2000, the U.S. job market has performed better than commonly reported in terms of civilian employment, which includes agricultural jobs and the self-employed, sole proprietors and independent contractors. The following table provides a comparison of payroll employment to civilian employment over the past 24 years.

Table 4



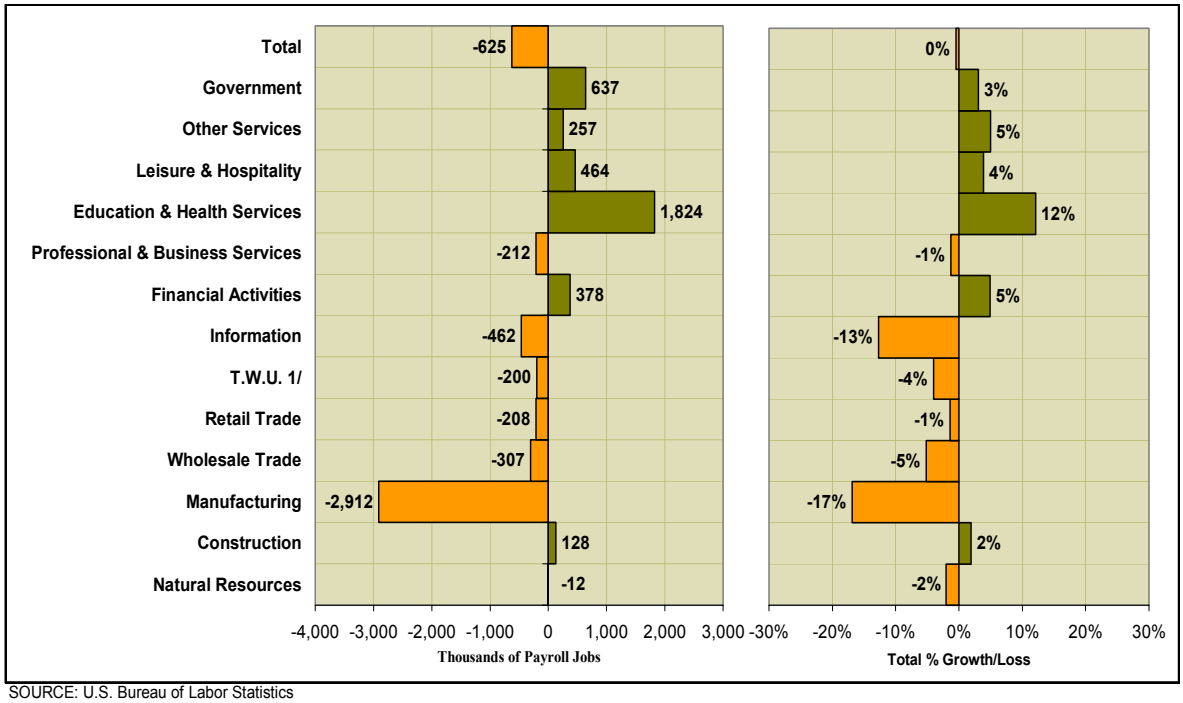
SOURCE: U.S. Bureau of Labor Statistics

As the country continues to expand economically, the independent and self-employed can be expected to continue to grow at a faster rate than payroll jobs. As the above table indicates, the country tends to average an 8 million to 10 million job differential between payroll and civilian employment. With agriculture employment declining by 7% annually according to the U.S. Department of Agriculture, the self-employed will account for a greater majority share of the difference over time.

1. Industry-Specific Trends

Between the third quarters of 2000 and 2004, the U.S. economy experienced significant losses in its manufacturing core as demonstrated in the table below. Information industries, a significant portion of which is software and internet publishing firms, experienced the second-largest decline during the period. Hits to both industries have been particularly difficult for the Pacific Northwest as discussed above. Wholesale Trade and Transportation, Warehousing & Utilities payroll employment have also not completely recovered since the recession, largely due to ripple effects from primary Manufacturing and Information job losses. This tertiary economic loss has also been particularly difficult for the port, rail and highway-concentrated industries of the Pacific Northwest corridor already struggling due to core industry losses.

Table 5
NATIONAL INDUSTRY EMPLOYMENT TRENDS



SOURCE: U.S. Bureau of Labor Statistics
1/ Transportation, Warehousing & Utilities

Alternatively, Healthcare, Education, Leisure & Hospitality, Government & Financial Activities have all enjoyed growth since 2000 in terms of payroll employment. These industries have benefited from telecommunications/internet innovations over the past decade, as well as the more recent boom in residential construction spurred by low mortgage rates, short-term interest rates and preferences for higher quality of life.

2. Considerations for National Economic Growth

Current consensus forecasts for the U.S. economy generally range between 3.3% and 3.6% annual GDP growth over the coming years. However, the following trends and considerations could have significant implications for the economy.

- The weak U.S. dollar has made U.S. exports more affordable internationally while making imports more expensive. Continued low interest rates and less-than-stellar economic performance should keep the dollar weak, particularly against Asian currencies – benefiting Pacific Northwest firms that trade in the Pacific Rim.

- Mortgage rates will increase as the economy improves over the coming months. However, 30-year rates are greatly determined by international currency exchange and purchases of Federal notes. China in particular is expected to maintain a consistent policy of buying U.S. debt at below market rates to keep its currency strong – which in turn will dampen upward pressure on mortgage rates and other long-term rates.

- Petroleum prices recently spiked above $50 per barrel, though prices are now trending downwards with the U.S. election complete, a stronger hand by the U.S. in Iraq, repair of

production facilities in the Gulf of Mexico and growing prospects of additional exploration in Alaska. Growing demand for oil by China will be a primary upward pressure of oil prices over the next several years, paired with unpredictable politics in the Middle East. Any growth in prices acts like a tax and increases the costs of production, and, thus prices.

- As already expressed, growing non-wage costs of employment is likely discouraging businesses from hiring employees. If the present administration is unable to create conditions for lower health insurance costs and other escalating overhead expenses, sluggish payroll employment growth can be expected nationwide.

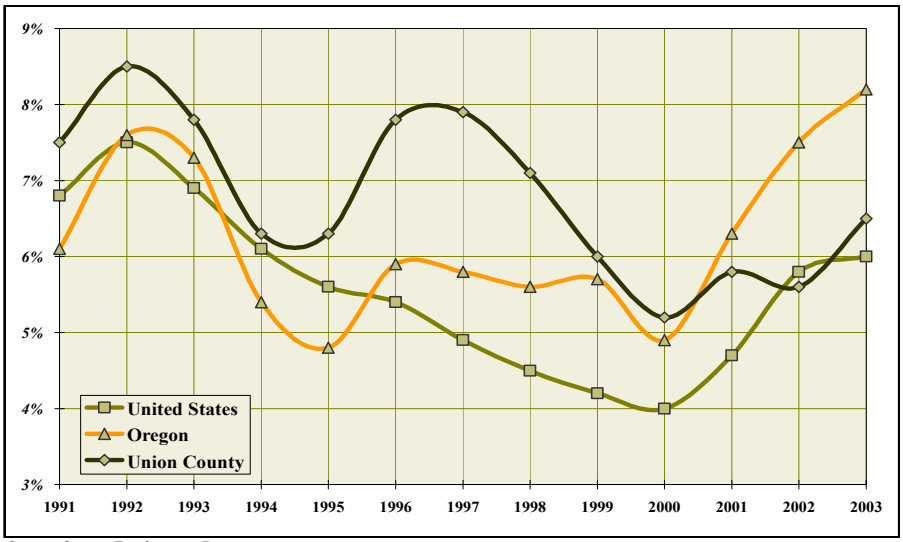
B. STATE & COUNTY TRENDS

1. Unemployment and Job Growth

Like many other counties in Oregon, Union County fared better than the State during the recent recession by several measures including unemployment and job growth. Economic sluggishness in the Portland metro area has largely contributed to the State's high unemployment. The following table provides a comparison of unemployment trends nationally, statewide and in Union County.

Table 6

National, State & Union County Unemployment Trends



Source: Oregon Employment Department

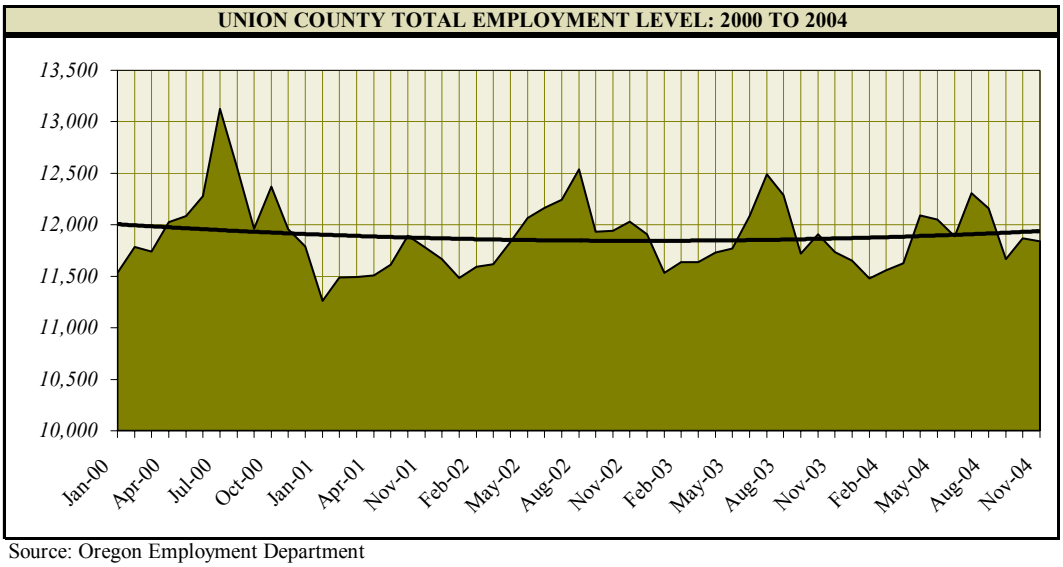
- The Union County unemployment rate suffered a roughly 1.3%-point increase, to 6.5%, as a result of the recent recession. The local jobless rate fared better than the Oregon rate which increased a 3%-point increase to 8.2%.

- At the end of 2003, the national and Union County unemployment rates were not significantly different at 6.0% and 6.5%, respectively.

- Economic weakness between 2001 and 2003 marked a dramatic turnaround for Union County's unemployment rate compared to statewide; before 2001 the Union County jobless

rate typically exceeded the State by an average of 1.1% but since 2001, the State jobless rate has exceeded Union County's by an average of 1.4%.

Table 7



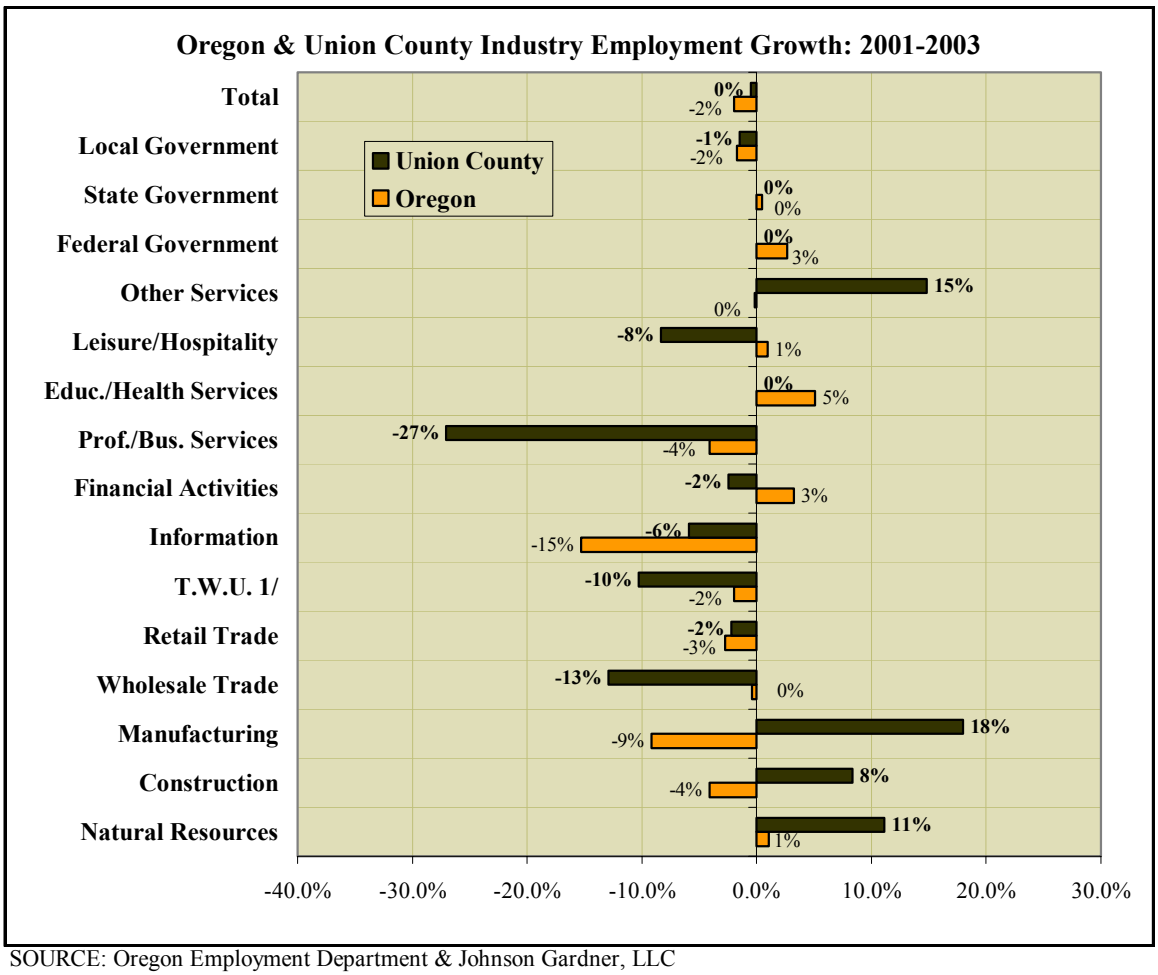
Source: Oregon Employment Department

- Union County employment has changed relatively little since 2000 with less than 1% job loss as a result of the recent recession. In the twelve months ending in November of 2004, Union County is estimated to have lost roughly 20 jobs.
- The State, in contrast, enjoyed its first 12-month period of positive job growth in 2003 and continued job growth, though sluggishly, in 2004.
- Historically, annual job growth has been far more erratic in Union County than Statewide, largely due to the historically seasonal nature of local industry.

2. Industry Job Growth

- 2003 industry employment in Union County was less than 1% lower than industry jobs at the end of 2000; the local economy has, in effect, weathered the recession relatively well.
- The State, in comparison, has not performed as well through the recession; industry employment at the end of 2003 was still 2% below its mark at the end of 2000.

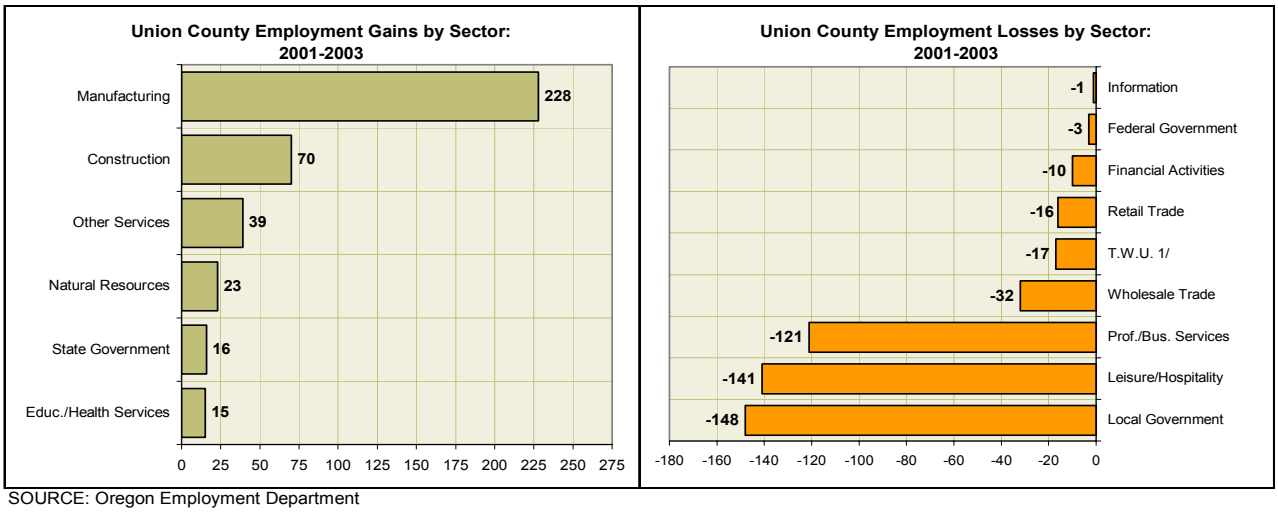
Table 8



SOURCE: Oregon Employment Department & Johnson Gardner, LLC
1/ Transportation, Warehousing & Utilities

- Union County Manufacturing, Other Services, Natural Resources and Construction exhibited the greatest strength over the last four years. Despite very recent weakness, the county's core manufacturing firms actually added over 200 payroll jobs during the national and state recession, anchored by transportation equipment manufacturing.
- Other expanding sectors benefited in part to ripple effects from Manufacturing growth, as well as stability in Health Services and State Government employment, the two other primary economic sectors in the county.
- Statewide, Education & Health Services, Financial Activities, and Federal Government employment experienced growth, though modestly, through the recession. All other sectors declined, particularly Information (software, internet and publishing) and Manufacturing were the hardest hit.

Table 9

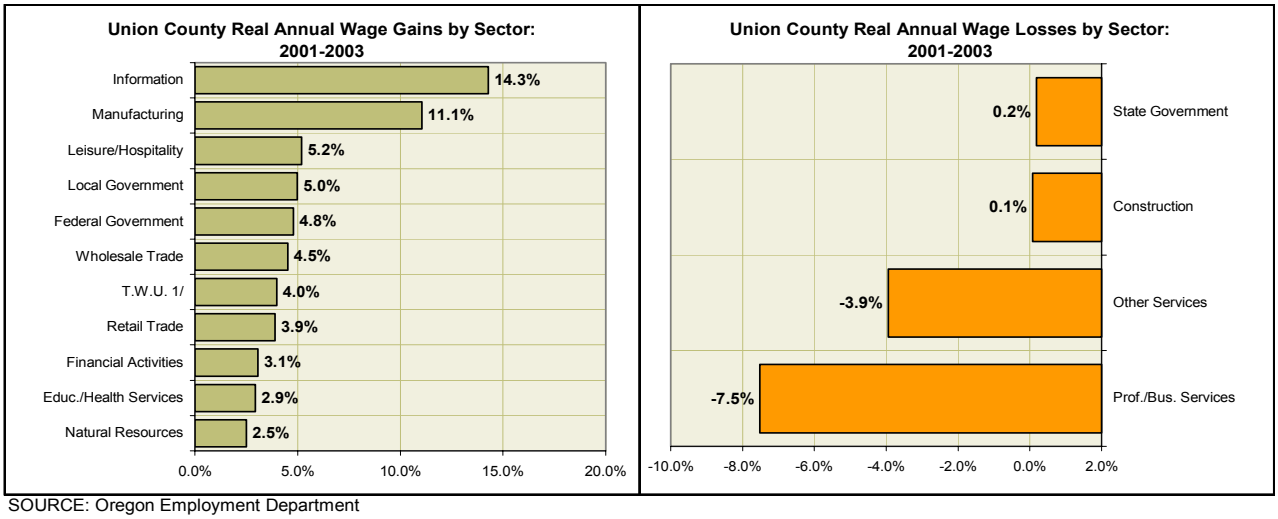


SOURCE: Oregon Employment Department
1/ Transportation, Warehousing & Utilities

- Expanding local industries, as summarized in the table above, are generally industrial space and/or land-utilizing sectors, specifically Manufacturing, Construction, Repair (Other) Services and some State Government functions.
- Alternatively, sectors demonstrating employment losses predominantly utilize Office & Retail Commercial Space and/or land, specifically Local Government, Leisure & Hospitality, and Professional & Business Services.
- Industries expanding the fastest in Union County are generally family wage-paying jobs, specifically Manufacturing, Construction, State Government and Health Services sectors.
- Alternatively, Union County industries suffering during the recession also predominantly pay family wages. These specifically include Local Government, Professional & Business Services, Wholesale Trade and Transportation, Warehousing & Utilities.

A summary of industries demonstrating the wage growth strength and weakness since 2001 is found in the following table.

Table 10

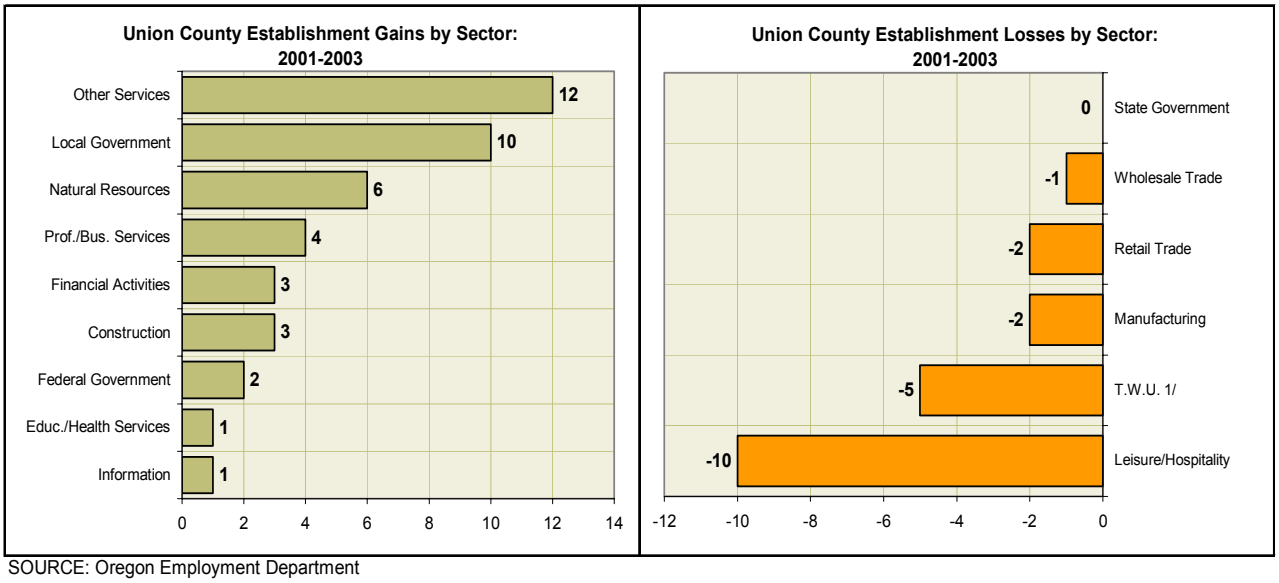


SOURCE: Oregon Employment Department
1/ Transportation, Warehousing & Utilities

3. Union County Business Expansion & Loss

As the regional government and economic hub of Northeast Oregon, Union County has traditionally experienced a reasonably stable rate of business turnover compared to Statewide. The following table demonstrates business count trends in Union County that have remained stable and have expanded despite the recent recession. Gains were diverse across many sectors, with net, three-year business count growth at 22 establishments. Business losses were largely concentrated in the Leisure & Hospitality sector.

Table 11



SOURCE: Oregon Employment Department
1/ Transportation, Warehousing & Utilities

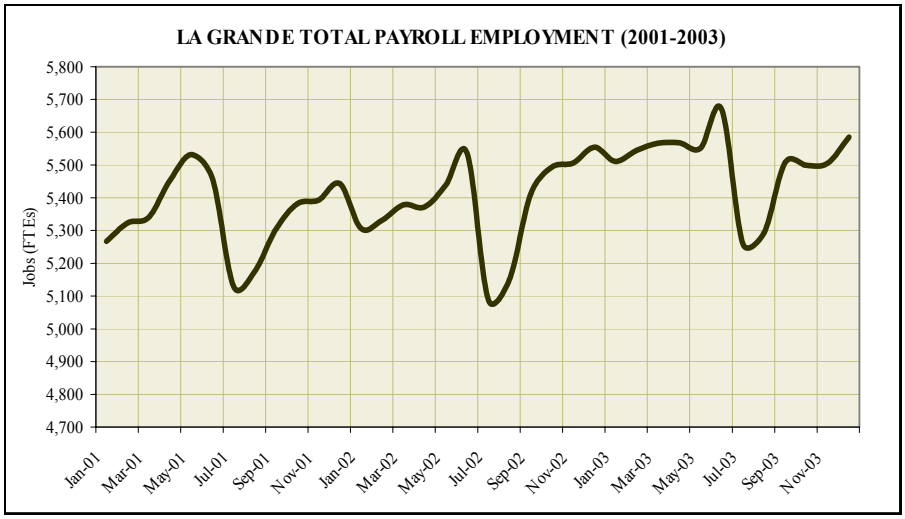
C. CITY ECONOMIC TRENDS

1. Industry Job Trends

An analysis of La Grande's economy during the recent recession was conducted by the Project Team utilizing confidential Oregon Employment Department data for La Grande employers. Data include details of monthly and quarterly employment, payroll and business/establishment counts. To the maximum extent possible, confidential data have not been disclosed in this analysis and raw data errors have been verified and/or corrected. To the extent that errors do occur, the Project Team acknowledges they are unintentional in nature and will be remedied accordingly.

Although the Union County economy has been tepid over the past few years – largely comprising the City of La Grande – new Oregon Employment Department data indicate that the City's economy has in fact experienced growth since 2001, largely beginning in 2002. La Grande's economy, measured in terms of payroll/business employment, has expanded by 2.9% since 2001, or 155 jobs. Since Union County employment has narrowly contracted during that time, it is clear that La Grande is benefiting from business relocating to the city from elsewhere in Union County. The table on the following page provides an illustration of overall employment in La Grande since 2001 on a monthly basis.

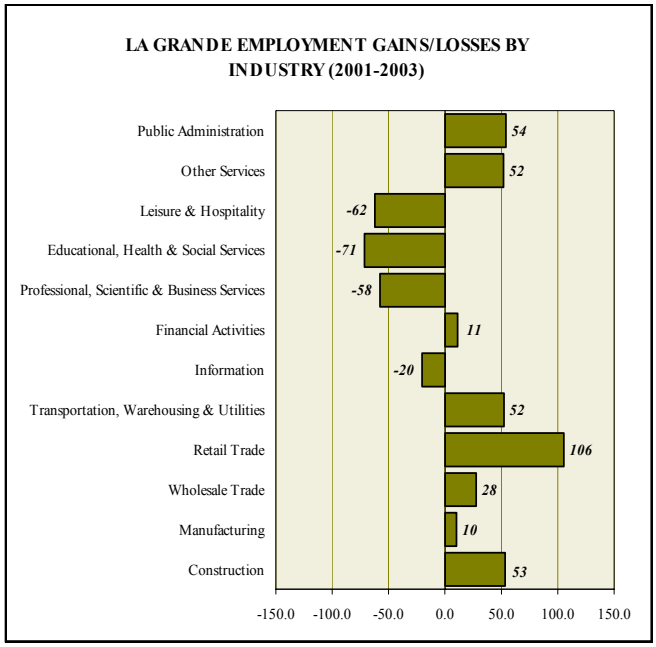
Table 12



Seasonal patterns are still prevalent in La Grande, as indicated by the peak-and-valley behavior of employment from June to August. The severity of seasonality does not appear to be abating. However, it is clear that between January of 2001 and July of 2002, little net positive or negative change in activity occurred. After the Summer of 2002, local employment growth began to occur with the monthly jobs trend beginning to climb upward.

As indicated in the following table, Retail Trade provided the largest boost to the local economy by adding 106 jobs. Public Administration (54 jobs), Construction (53 jobs), Other Services (52 jobs) also led expansion of the local job base.

Table 13



SOURCE: Oregon Employment Department and Johnson Garner, LLC

Alternatively, several industries did continue to contract through the end of 2003. These were led by Educational, Health & Social Services (71 jobs), Leisure & Hospitality (62 jobs) and Professional, Scientific and Business Services (58 jobs). The following table provides a comprehensive summary of industry employment growth and loss trends since 2001.

Table 14

LA GRANDE INDUSTRY EMPLOYMENT TRENDS, 2001-2003

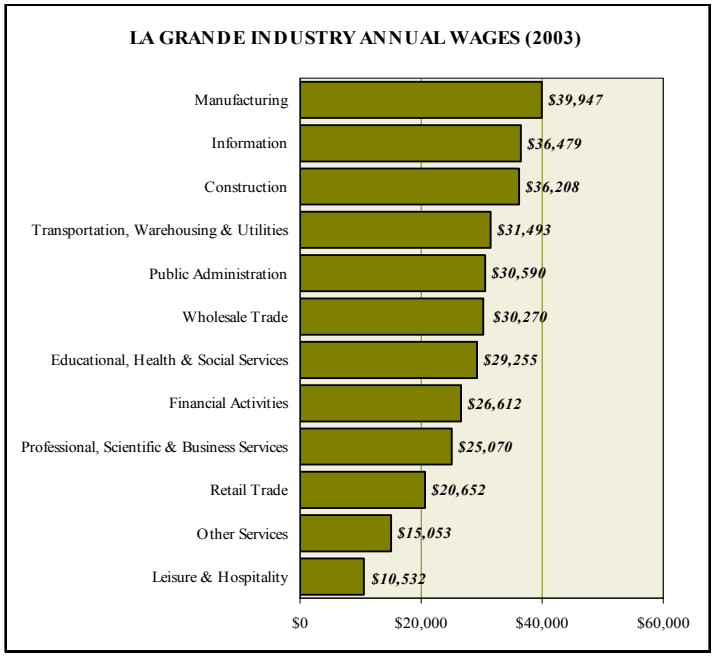
				Two-Year Change		
Industry	**2001**	**2002**	**2003**	**Jobs**	**% Change**	**% Annual**
Construction	224.5	228.3	277.8	53.3	23.8%	11.2%
Manufacturing	280.3	264.0	290.5	10.3	3.7%	1.8%
Wholesale Trade	104.9	111.9	132.7	27.8	26.4%	12.4%
Retail Trade	733.8	769.4	839.3	105.5	14.4%	6.9%
Transportation, Warehousing & Utilities	85.3	128.0	137.7	52.4	61.5%	27.1%
Information	169.4	150.7	149.1	-20.3	-12.0%	-6.2%
Financial Activities	290.3	297.6	301.3	11.1	3.8%	1.9%
Professional, Scientific & Business Services	286.6	284.5	228.9	-57.7	-20.1%	-10.6%
Educational, Health & Social Services	1,967.8	1,898.0	1,896.4	-71.4	-3.6%	-1.8%
Leisure & Hospitality	677.3	653.3	615.1	-62.2	-9.2%	-4.7%
Other Services	158.7	184.3	210.6	51.9	32.7%	15.2%
Public Administration	371.3	410.7	425.5	54.2	14.6%	7.0%
Industry Totals	***5,350.1***	***5,380.7***	***5,504.9***	***154.8***	***2.9%***	***1.4%***

SOURCE: Oregon Employment Department & Johnson Gardner, LLC

2. Industry Wage Trends

Wages in La Grande grew nearly three times faster than jobs - 5.4% vs. 1.4% annually - during the recent recession based on Oregon Employment Department data. The following table summarizes 2003 average annual wages in La Grande by major industry category.

Table 15

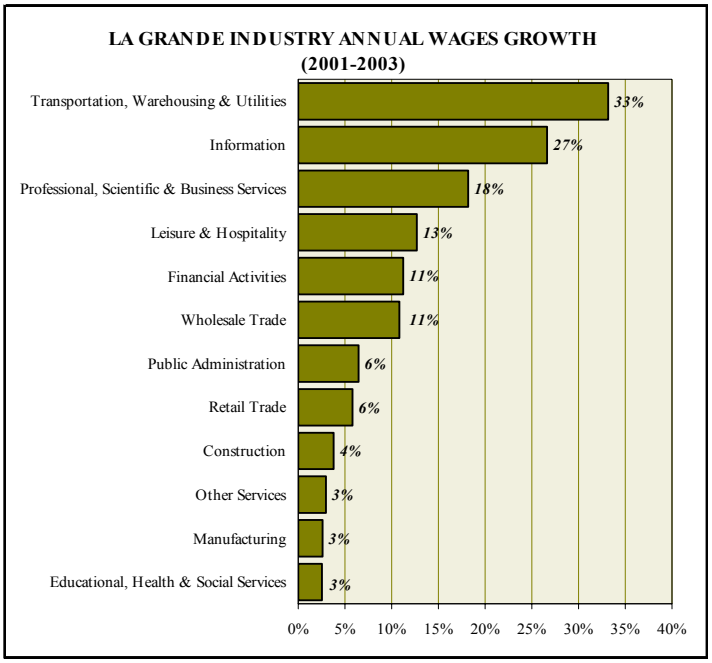


SOURCE: Oregon Employment Department and Johnson Garner, LLC

2003 wage figures indicate that La Grande has seen expansion since 2001 in five of the six top-paying industries summarized above. Further, seven of the City's industries pay more than the County 2003 median covered employment wage of $27,108. Among those, five sectors added an impressive total of 197 jobs during the recession.

The following table provides a comparison of wage growth rates among La Grande industries since 2001. Although the La Grande economy has had success adding high-paying jobs in a number of industries, sectors with the fastest-growing wages have largely not expanded in the area. The sole exception is the Transportation, Warehousing & Utilities sector, which tied with Public Administration for fourth-fastest growing industry in La Grande.

Table 16



SOURCE: Oregon Employment Department and Johnson Garner, LLC

The following table provides a comprehensive summary of industry wages and wage growth trends in La Grande since 2001.

Table 17

LA GRANDE INDUSTRY WAGE TRENDS, 2001-2003

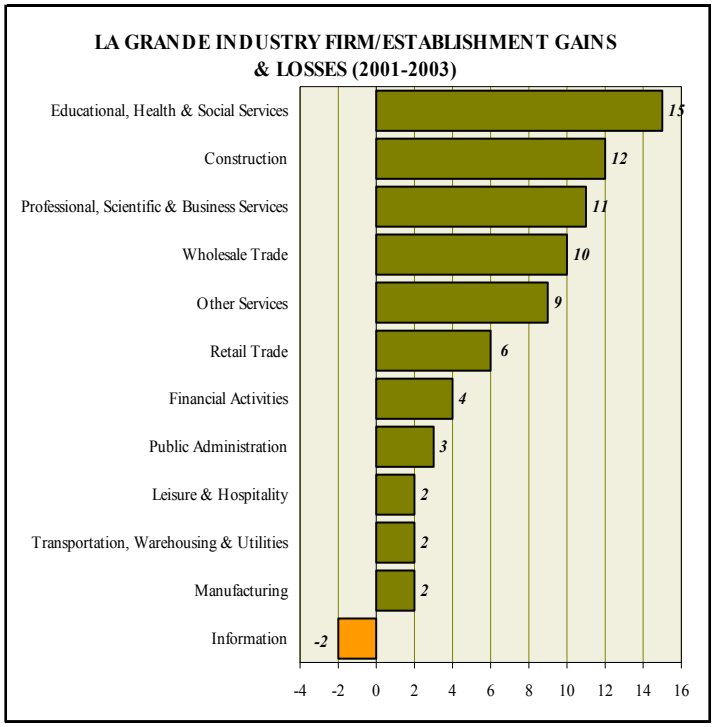
				Two-Year Change		
Industry	**2001**	**2002**	**2003**	**Wages**	**% Change**	**% Annual**
Construction	$34,893	$36,639	$36,208	$1,316	3.8%	1.9%
Manufacturing	$38,934	$40,008	$39,947	$1,013	2.6%	1.3%
Wholesale Trade	$27,316	$27,042	$30,270	$2,954	10.8%	5.3%
Retail Trade	$19,520	$19,258	$20,652	$1,132	5.8%	2.9%
Transportation, Warehousing & Utilities	$23,649	$29,575	$31,493	$7,845	33.2%	15.4%
Information	$28,805	$27,900	$36,479	$7,674	26.6%	12.5%
Financial Activities	$23,924	$23,973	$26,612	$2,687	11.2%	5.5%
Professional, Scientific & Business Services	$21,214	$22,826	$25,070	$3,856	18.2%	8.7%
Educational, Health & Social Services	$28,536	$29,094	$29,255	$719	2.5%	1.3%
Leisure & Hospitality	$9,346	$10,183	$10,532	$1,186	12.7%	6.2%
Other Services	$14,621	$15,110	$15,053	$432	3.0%	1.5%
Public Administration	$28,735	$23,877	$30,590	$1,855	6.5%	3.2%
Industry Totals	***$299,492***	***$305,484***	***$332,161***	***$32,669***	***10.9%***	***5.3%***

SOURCE: Oregon Employment Department & Johnson Gardner, LLC

3. Industry Firm Trends

Oregon Employment Data reveal that the La Grande economy has had success in attracting and growing new businesses in a wide variety of industries during the recessionary years. The following table provides a summary of firm and establishment counts, i.e. employers reporting payroll data to the Employment Department, from 2001 to 2003.

Table 18



SOURCE: Oregon Employment Department and Johnson Garner, LLC

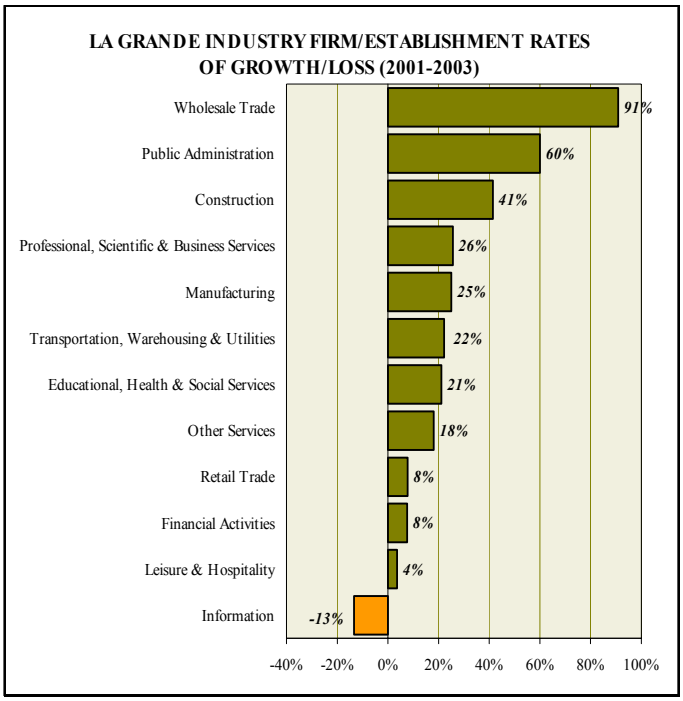
All industries in La Grande but Information added new firms and establishment employers between 2001 and 2003. Further, four of the top expanding industries are among the highest-paying sectors in the local economy as summarized above. These were: Education, Health & Social Services; Construction; Professional, Scientific, and Business Services; and Wholesale Trade.

However, not all industries with greater business counts added jobs during the period. Based on a review of Oregon Employment Department data, the Project Team gleans the following economic trends.

- Greater robustness of firm and establishment creation than job creation typically signifies greater growth in small business, particularly sole proprietorships, self-employed and new spin-off companies.
- Such small business and attraction growth has been greatly concentrated in office-utilizing professions, primarily Education & Health Services (individual health care providers in particular) and Professional, Scientific and Business Services (of note, legal services).
- Small business attraction and growth has happened in nearly all subsectors, but with less concentration.
- Construction, Retail, Wholesale Trade, and Transportation, Warehousing & Utilities have added a more balanced share of small businesses and companies with larger payrolls.
- Information, the sole industry with firm count decline, lost components of its publishing sector and suffered from cellular telephone/communications industry consolidation.

The following table provides a comprehensive summary of growth rates for payroll-reporting business and establishment counts in La Grande between 2001 and 2003.

Table 19



SOURCE: Oregon Employment Department and Johnson Garner, LLC

Among industries being attracted to La Grande or growing from within, industrial space and land-utilizing firms are presently growing the fastest. Since 2001, Wholesale Trade (91% growth), Construction (41% growth), Manufacturing (25% growth), and Transportation, Warehousing & Utilities (22% growth) establishments comprise the most rapidly expanding sectors in La Grande. With the exceptions of Public Administration and Professional, Scientific & Business Services, commercial space and land-utilizing industries have seen less-rapid expansion of business in La Grande. Retail-concentrated firms, including the Retail Trade and Leisure & Hospitality sectors, demonstrated the slowest growth among the general land use categories.

The following is a comprehensive summary of business and establishment count trends in La Grande since 2001.

Table 20

LA GRANDE INDUSTRY ESTABLISHMENT COUNT TRENDS, 2001-2003

				Two-Year Change		
Industry	**2001**	**2002**	**2003**	**Firms**	**% Change**	**% Annual**
Construction	29	27	41	12	41.4%	18.9%
Manufacturing	8	7	10	2	25.0%	11.8%
Wholesale Trade	11	13	21	10	90.9%	38.2%
Retail Trade	77	75	83	6	7.8%	3.8%
Transportation, Warehousing & Utilities	9	10	11	2	22.2%	10.6%
Information	15	11	13	-2	-13.3%	-6.9%
Financial Activities	53	53	57	4	7.5%	3.7%
Professional, Scientific & Business Services	43	47	54	11	25.6%	12.1%
Educational, Health & Social Services	71	76	86	15	21.1%	10.1%
Leisure & Hospitality	55	58	57	2	3.6%	1.8%
Other Services	50	57	59	9	18.0%	8.6%
Public Administration	5	7	8	3	60.0%	26.5%
Industry Totals	***426***	***441***	***500***	***74***	***17.4%***	***8.3%***

SOURCE: Oregon Employment Department & Johnson Gardner, LLC

D. INDUSTRY CLUSTER ANALYSIS

An analysis of Union County's industry clusters was conducted to help identify current and future economic development opportunities for the City of La Grande. Economic clusters are the networks of core businesses and their vendors and support services that help support the broader economy of a community. Clusters are determined by the relative prevalence or concentration of an industry group relative to nationwide averages. Clusters are, therefore, not necessarily large industries in and of themselves, but sectors with appreciably above-average presence relative to elsewhere.[7] Clusters are by no means the entire economy, but rather those networks of businesses that are the most distinct and specialized to an area and its various competitive advantages.

Industry clusters are typically driven by the unique nature of local geography, environment, population, culture and public investment. Because of their unique qualities in any given location, it must be a high priority in economic development efforts to retain, strengthen and build upon existing clusters to maintain an economic competitive advantage.

[7] Industry concentration is measured by a location quotient (LQ). The numerator of the industry LQ is the share of local employment attributable to the specific sector. The denominator of the industry LQ is the share of national employment attributable to the sector nationwide. An LQ greater than 1.0 signifies an industry with above-average concentration in a local economy. An LQ less than 1.0 signifies an industry with below-average presence in a local economy.

Table 21

Union County Location Quotient Analysis

Industry	Employment	Location Quotient
Reconstituted wood product manufacturing	296	173.7
Support activities for other mining	63	130.0
Travel trailer and camper manufacturing	375	125.1
Veneer and plywood manufacturing	250	60.0
Lawn and garden equipment manufacturing	92	55.2
All other crop farming	531	37.9
Sugarcane and sugar beet farming	165	26.7
Sawmills	246	26.1
Rail transportation	215	15.6
Logging	117	10.7
Prefabricated wood building manufacturing	22	10.3
Grain farming	325	6.6
Agriculture and forestry support activities	351	5.8
Sign manufacturing	34	5.5
Adhesive manufacturing	10	5.5
Vegetable and melon farming	54	4.7
Religious organizations	657	4.6
Other Federal Government enterprises	24	4.5
Bowling centers	24	4.4
Cattle ranching and farming	246	4.3
Total Employment	***13,430***	

SOURCE: Implan, Oregon Employment Department, and Johnson Gardner

Economic data for the City of La Grande, Union County and the State of Oregon indicate that Union County presently is host to three distinct clusters. These are:

- Agriculture;
- Wood Products; and
- Other Manufacturing

Although an important component of the La Grande and Union County economy, Eastern Oregon University is, in and of itself, not a cluster but certainly a leading and important employer. A brief discussion of the university's economic implications follows a description of the three economic clusters.

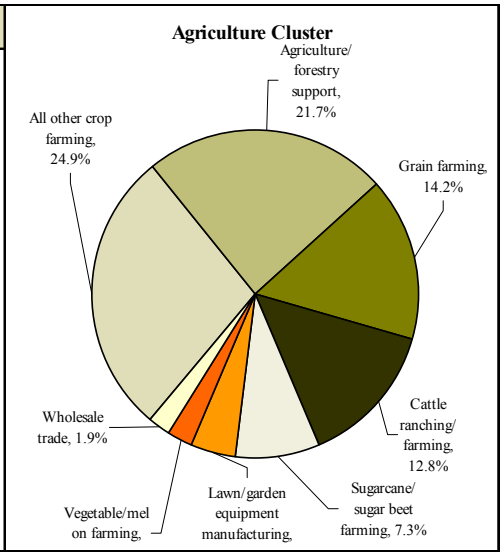
1. Agriculture

La Grande's largest economic cluster is agriculture and all support goods and services in the area that make the industry viable. Table 2 below provides a summary of the cluster in terms of employment within agriculture (direct employment), employment created by agriculture via vendors of goods and services (indirect employment), as well as indirect or tertiary employment created as a result of indirect and induced activity.

Table 22

Agriculture Cluster Analysis

Industry	Employment (FTEs) Direct	Indirect	Induced	Total
All other crop farming	531.0	53.4	0.1	584.5
Agriculture/ forestry support	351.0	157.1	0.3	508.4
Grain farming	325.0	9.1	0.2	334.2
Cattle ranching/ farming	246.0	54.4	0.2	300.6
Sugarcane/ sugar beet farming	165.0	5.8	0.1	170.9
Lawn/garden equipment manufacturing	92.0	1.1	0.0	93.1
Vegetable/melon farming	54.0	0.7	0.6	55.3
Wholesale trade	0.0	35.9	7.8	43.7
Real estate	0.0	32.4	5.7	38.1
Truck transportation	0.0	14.6	2.0	16.6
Architectural/engineering services	0.0	11.6	0.5	12.1
Animal production except cattle/poultry	0.0	9.2	0.4	9.6
Insurance carriers	0.0	5.9	3.3	9.2
Automotive repair/maintenance	0.0	1.8	6.9	8.7
Monetary authorities and depository credit	0.0	4.8	3.7	8.6
Maintenance/repair of nonresid. buildings	0.0	5.3	0.8	6.1
Other State/local government enterprises	0.0	4.7	1.3	6.0
Veterinary services	0.0	4.9	0.8	5.7
Accounting/bookkeeping services	0.0	3.9	1.3	5.2
Employment/services	0.0	3.0	2.1	5.2
Totals/Averages:	**1,764.0**	**426.2**	**155.4**	**2,345.6**



SOURCE: Implan and Johnson Gardner

- The cluster directly employs no less than 1,764 people directly within the county. True employment is actually much greater due to the seasonal nature of the industry, a significant component of which is not included here.
- Vendors and support industries for local agriculture provide over 426 additional jobs on an annual basis, still concentrated in various agriculture-related industries. Wholesale trade, transportation and professional and technical services firms are also important to the cluster.
- Direct and indirect employment create an additional 155 jobs in the local economy, concentrated in wholesale trade and various services.
- Total employment in the cluster of industries exceeds 2,345 jobs annually, or nearly 18% of all local economic activity.
- Oregon Employment Department suggest that natural agriculture-related employment in La Grande grew by 15 jobs annually between 2001 and 2003, indicating health in the cluster.

2. Wood Products

The second largest economic cluster in the Union County economy is wood products, which includes a diverse range of primary business sectors. Table 3 below summarizes the cluster in terms of direct, indirect and tertiary/induced employment by local business sector.

- Wood products directly employs roughly 834 individuals in Union County, robustly led by manufacturing - reconstituted wood product manufacturing, veneer and plywood manufacturing and local sawmill employment.

- Vendors and services to the primary wood products firms employ 349 people annually, led by agriculture and forestry support services, wholesale trade, transportation and sawmill firms.

- Additional, or tertiary/induced economic activity from primary and secondary business in the cluster generate 154 jobs annually in the local economy. Jobs are concentrated in financial/real estate services, wholesale trade and various other services.

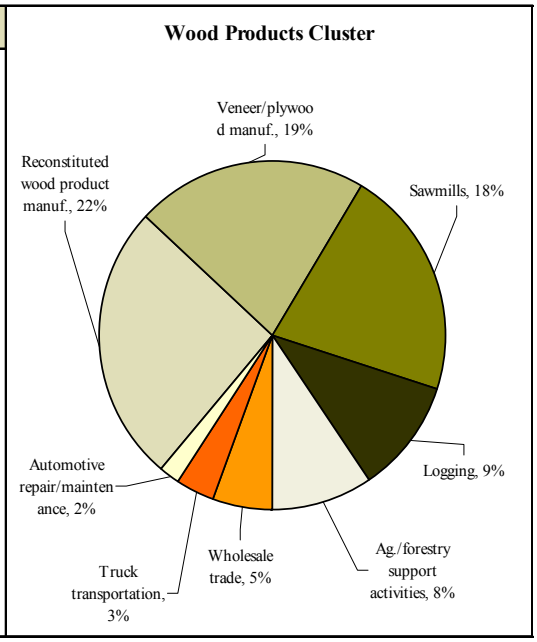
- Total, annual employment in the cluster is nearly 1,337 jobs, or roughly 10% of the Union County economy.

- Primary industry in La Grande has been stagnant over the past few years, with only 1 job added in the core manufacturing sectors between 2001 and 2003. Alternatively, La Grande is not home to most of the county's primary cluster employment and can seek to play a larger role as an employment center for the cluster as the national and global economy improves.

Table 23

Wood Products Cluster Analysis

Industry	Employment (FTEs) Direct	Indirect	Induced	Total
Reconstituted wood product manuf.	282.3	13.7	0.0	296.1
Veneer/plywood manuf.	236.2	13.8	0.1	250.1
Sawmills	214.6	31.4	0.1	246.1
Logging	100.7	21.0	0.0	121.7
Ag./forestry support activities	0.0	107.4	0.6	108.0
Wholesale trade	0.0	45.6	16.8	62.4
Truck transportation	0.0	37.0	4.4	41.4
Automotive repair/maintenance	0.0	8.4	15.0	23.4
Power generation/supply	0.0	7.1	1.5	8.6
Monetary authorities/depository credit	0.0	6.0	8.0	14.1
Architectural/engineering services	0.0	5.6	1.1	6.7
Employment services	0.0	5.5	4.7	10.1
Management of companies/enterprises	0.0	4.9	1.2	6.0
Accounting/bookkeeping services	0.0	4.6	2.8	7.4
Real estate	0.0	3.7	12.3	16.0
Maintenance/repair of nonresid. buildings	0.0	3.6	1.6	5.3
Electronic equipment repair/maintenance	0.0	2.9	0.3	3.2
Rail transportation	0.0	2.8	0.3	3.1
Other State/local government enterprises	0.0	2.7	2.7	5.5
Insurance carriers	0.0	2.5	7.3	9.8
Securities/commodity contracts/investments	0.0	2.4	4.2	6.6
Machine shops	0.0	2.3	0.1	2.3
Totals/Averages:	833.8	349.0	153.9	1,336.8



SOURCE: Implan & Johnson Gardner

3. Other Manufacturing

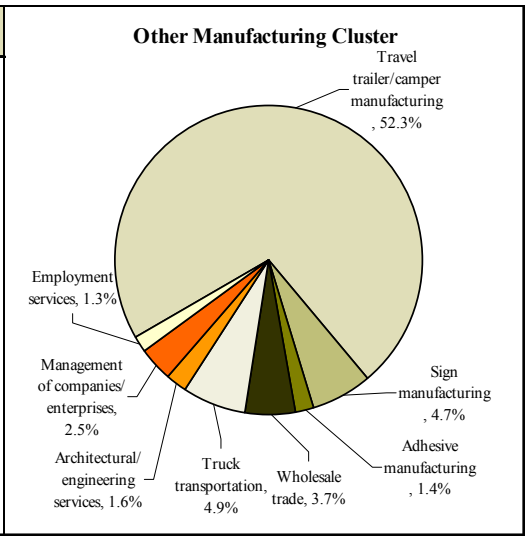
Union County, and particularly the La Grande area, has grown to be an attractive location for various manufacturers that do not rely upon traditional local industry, namely agriculture and timber. Access to I-84, the central location between the Columbia River and Idaho, as well as past greater land availability have made La Grande and Union County marketable to firms also seeking manufacturing and sales opportunity in a sales tax-free environment.

Table 4 below summarizes this emerging cluster of non-traditional manufacturers and the growing array of sectors they help to support locally. Results are summarized in terms of annual employment.

- Primary businesses in the cluster employ 419 on an annual basis, the vast majority of which are in travel trailer and camper manufacturing. Countywide sign manufacturing and adhesive manufacturing also contribute.
- Local providers of goods and services in the cluster employ nearly 136 people on an annual basis, led by wholesale trade, additional travel trailer/camper manufacture jobs, transportation and various professional services.
- Tertiary or induced employment created by primary and secondary commerce in the cluster numbers an additional 162 jobs annually, led by local wholesale trade, real estate and various financial and miscellaneous services.
- Primary industry grew by 10% between 2001 and 2003, indicating robust health for the cluster through the recession.
- The outlook for the cluster may be tempered by erratic and escalated fuel costs, which not only drive up the cost of production, but also make recreational vehicle and trailer usage more expensive to consumers as well.

TABLE 24
OTHER MANUFACTURING CLUSTER ANALYSIS

Industry	Employment (FTEs) Direct	Indirect	Induced	Total
Travel trailer/camper manufacturing	346.0	29.0	0.1	375.0
Sign manufacturing	32.7	1.2	0.1	34.0
Adhesive manufacturing	10.0	0.0	0.0	10.0
Wholesale trade	0.0	29.3	5.9	35.2
Truck transportation	0.0	16.3	1.5	17.9
Architectural/ engineering services	0.0	7.7	0.4	8.0
Management of companies/ enterprises	0.0	3.5	0.4	3.9
Employment services	0.0	2.9	1.6	4.5
Other State/local government enterprises	0.0	2.7	1.0	3.6
Real estate	0.0	2.4	4.3	6.7
Scientific research/development services	0.0	2.4	0.2	2.6
Accounting/bookkeeping services	0.0	2.4	1.0	3.3
Monetary authorities/depository credit	0.0	2.2	2.8	5.0
Maintenance/repair of nonresid. buildings	0.0	2.0	0.6	2.5
Advertising/related services	0.0	2.0	0.5	2.5
Legal services	0.0	1.3	1.8	3.1
Securities/commodity contracts/investments	0.0	1.3	1.5	2.8
Rail transportation	0.0	1.0	0.1	1.1
Totals/Averages:	**419.0**	**135.8**	**162.1**	**716.8**



SOURCE: Implan and Johnson Gardner

4. Higher Education

Eastern Oregon University is an important asset to the economy of La Grande, Union County and the broader eastern Oregon region. The university is one of La Grande's largest employers. But more importantly, its other impacts include:

- Attracts and retains a highly educated workforce;
- Enhances workforce strength regionally and statewide;
- Assists local industry through continuing education, industry research, technical assistance and other partnerships; and
- Creates economic activity by hosting visiting researchers, faculty, conferences and university events, injecting additional spending for local businesses and services.

Eastern Oregon University's industry contributions to the La Grande and Union County area, as measured by direct jobs created by day-to-day operations of the institution, are found in Table 5 below.

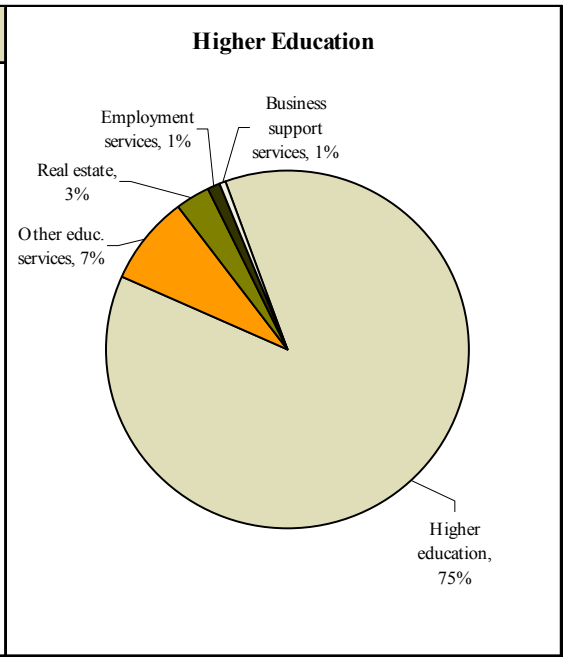
Interestingly, mundane daily operations of the university do not support a broad diversity and significant magnitude of local industry as measured in terms of annual jobs. With university employment between 400 and 410 jobs, an additional 180 jobs are supported annually throughout the Union County economy by the university. Again, it is important to remember that indirect and induced jobs as estimated below are due to the university's day-to-day operations, such as administration, teaching activities, maintenance and other standard functions. Results reconfirm that the broader mission of the university, education, research and enhanced economic

development, is its greatest economic contribution and is not easily quantified on a point-in-time basis.

Results do indicate, however, that local industry does not exhibit an unhealthy dependence upon the university for economic well-being. As results from the analysis of the area's three clusters indicate, local private industry has a substantial, regional role and support network of commerce. In other words, private industry certainly benefits from the university, but the lower, healthier level of interdependence between the clusters and the university indicates the local economy exhibits a stable level of diversification.

Table 25.
Eastern Oregon University/Higher Education

	Employment (FTEs)			
Industry	**Direct**	**Indirect**	**Induced**	**Total**
Higher education	440.0	0.0	1.2	441.3
Other educ. services	0.0	39.7	0.5	40.2
Real estate	0.0	11.8	3.7	15.5
Employment services	0.0	3.5	2.0	5.6
Business support services	0.0	2.4	0.6	3.0
Services to buildings	0.0	1.8	1.1	2.9
Wholesale trade	0.0	1.7	4.3	5.9
Securities/commodity contracts/investi	0.0	1.5	1.9	3.4
General/consumer goods rental	0.0	1.1	0.3	1.5
Transit/ground passenger transport.	0.0	0.9	0.6	1.4
Architectural/engineering services	0.0	0.8	0.3	1.2
Maintenance/repair of nonresid. buildi	0.0	0.7	0.3	1.1
Civic/social/prof./similar organizations	0.0	0.6	0.9	1.5
Accounting/bookkeeping services	0.0	0.6	0.9	1.5
Auto. repair/maintenance	0.0	0.6	1.9	2.4
Drycleaning/laundry services	0.0	0.5	0.6	1.1
Legal services	0.0	0.5	1.6	2.2
Telecommunications	0.0	0.5	0.8	1.3
Radio/television broadcasting	0.0	0.5	0.2	0.7
Truck transportation	0.0	0.5	0.9	1.4
Totals/Averages:	**440.0**	**84.4**	**67.8**	**592.2**



SOURCE: Implan and Johnson Gardner

Research and Technology Opportunity for Higher Education

Eastern Oregon University, or higher education in general, are presently enjoying a 1% annual growth rate, which exceeds the rate of population growth. As the university growth in personnel and capital facilities, higher education promises to be a major factor in future growth potential. But among features of recent growth at the university, the completion of the Eastern Oregon University Science Center provides the greatest promise for future economic development efforts.

Including a research greenhouse, the facilities will measure 105,000 square feet, largely comprising renovated and state-of-the-art research laboratories and teaching areas. Partnership with Oregon Health & Sciences University, Oregon State University Agriculture Extension, Oregon Department of Fish and Wildlife, and Portland State University's Engineering program should provide for substantial economic development opportunities for La Grande.

- *Bio-Tech Facilities:* Dedicated bio-tech research facilities can attract a growing body of researchers to La Grande in coordination with OHSU. To push local research opportunities into the realm of commerce, the City can have a partnership role with the university and OHSU to enhance commercial viability. Bio-tech industry, as opposed to just research and development, is a three-legged stool comprising innovative R&D, entrepreneurial initiative and available venture capital.
- *Agriculture Research & Technical Assistance:* The Science Center provides a major launch pad for expanded research and technical assistance to Union County's largest economic cluster, agriculture. New products, production techniques, disease prevention and other fruits of partnership, with which the City can have a productive role, can only serve to enhance largest portion of the region's economic foundation.
- *New Products and Industry:* A greater diversity of research activities in new scientific disciplines will enhance the ability for the region to naturally grow or attract industries that not only pay family-wage jobs, but help to diversify the local industrial base and provide fertile ground for further business spin-off.

5. Cluster-Driven Targeted Industries

A cluster-based analysis of industries may prove most feasible or successful for any City or County-based economic development efforts. The theory employed is that industries and business that most likely will seek a La Grande location are those that would like to be nearby major customers or major vendors, in order that transportation, production, and marketing costs can be reduced while regional market share can more easily be enhanced.

Utilizing IMPLAN methodology, as well as Oregon Employment Department data, the following methodological steps were utilized:

- Local Cluster Customers: Industries that regularly purchased goods and services produced by Union County's clusters were identified with input-output analysis utilizing IMPLAN.
- Local Cluster Vendors: Industries that provide goods and services to each of the clusters, and higher education, were identified via results expressed above as well as additional analysis of OED data.
- Local Input Analysis: After identifying all vendors to local industry, the share of products and services sold to local clusters by local businesses was estimated.
- Input Import Analysis: Once local input production for business was know, the quantity of goods and services imported from outside Union County by local businesses was then estimated.

Table 26 on the following page provides a summary of top thirty candidate industries for recruitment, in terms of gross annual sales to local businesses, but located outside Union County. Oregon average annual wages for each candidate industry are also provided.

As Table 26 indicates, local economic development efforts have the opportunity to tap a broad swath of manufacturing industries that supply local businesses. Motor vehicle parts, plastics, petroleum, metals, fertilizer, engine parts and agricultural chemicals are all some of the many manufacturing sectors from outside the area that local business rely on most heavily and to whom they sell most frequently.

Non-manufacturing candidate industries are led by timber tract operations and nurseries, wholesale trade, logging, real estate and scenic and sightseeing transportation. Noticeably absent are many transportation sectors, largely due to Union County and La Grande's existing strengths in transportation services due to existing infrastructure and location.

Table 26

Leading Candidate Targeted Industry Sectors for Union County and La Grande

NAICS	Industry	Imported Goods & Services *	Average Statewide Pay
11311-21	Timber tract operations and nurseries	11.010	$40,893
42000	Wholesale trade	9.100	$50,090
33621-39	Motor vehicle parts manufacturing	8.980	$33,116
11331	Logging	8.770	$36,899
32613-19	Plastics material and resin manufacturing	6.010	$33,287
53100	Real estate	5.180	$27,313
48700	Scenic and sightseeing transportation	4.060	$22,966
32400	Petroleum and coal products manufacturing	4.050	$45,550
33111	Iron and steel mills and ferroalloy manufacturing	3.650	$56,587
33299	All other fabricated metal product manufacturing	3.400	$33,844
32531	Fertilizer manufacturing	2.810	$38,342
33631	Motor vehicle gasoline engine and parts	2.720	$25,915
52200	Credit intermediation and related activities	2.540	$47,786
32532	Pesticide and other agricultural chemical manufacturing	2.420	$38,646
32111	Sawmills and wood preservation	2.280	$41,875
55100	Management of Companies	2.240	$61,655
33211	Forging and stamping	2.220	$38,409
81131	Commercial machinery repair and maintenance	1.930	$51,331
22100	Utilities	1.580	$64,150
32551	Paint and coating manufacturing	1.560	$42,748
32621	Tire manufacturing	1.510	$24,626
32612	Plastics, pipe and fittings	1.370	$35,772
32611	Plastics packaging materials- film and sheet	1.230	$50,075
33131	Alumina and aluminum production	1.130	$41,389
32629	Other rubber product manufacturing	1.100	$34,550
32721	Glass and glass product manufacturing	1.060	$37,833
33650	Railroad rolling stock manufacturing	1.040	n/a
31111	Animal food manufacturing	1.040	$40,210
54100	Professional, scientific and technical services	1.010	$48,201
53241-49	Machinery and equipment rental and leasing	1.010	$46,985

SOURCE: Johnson Gardner, LLC
* in Milllions of 2003 dollars.

Finally, not only are the above industries presently underrepresented in the local economy based on commercial import or sales export, the candidate industries pay quality, family wages on average. The lowest annual wage among the candidates is $22,966 for scenic and sightseeing transportation services. The highest is utilities employment, which averages over $64,000 in annual pay. The average salary in La Grande in 2003, according to confidential Oregon Employment Department data, was roughly $27,700. Twenty-five of the thirty targeted industries pay in excess of the local average based on Oregon averages, indicating significant room to enhance local income over the short and long-term.

IV. Future Land Need

An analysis of the City of La Grande's 20-year need for industrial and commercial land was conducted as part of the 2005 City Goal 9 Review.

The following section provides a summary of analysis results, followed by a description of the methodology employed to estimate employment growth, need for commercial and industrial space, and, accordingly, industrial and commercial land. The attached exhibits provided detailed findings of this analysis in five-year increments through 2025.

Four employment growth scenarios were analyzed to provide a baseline confidence interval for which the City should plan. Assumed growth rates are largely based on historical trends for the City of La Grande, but modified to reflect recent developments in the local economy as appropriate. The four scenarios are:

- Medium Growth Scenario: The baseline or conservative forecast of likely employment growth in La Grande. Annual average payroll growth is assumed to be 0.925%, roughly 25% faster than the State of Oregon forecast for Union County from 2002 to 2012. The rate of growth was escalated for the Medium Growth Scenario to reflect the recent strength of the La Grande economy in the midst of the State's worst recession in recent memory.
- High Growth Scenario: An average, annual rate of growth of 1.0%, or roughly a 20% upper confidence interval for the Medium Growth Scenario. Reflects greater-than-expected success with local and County economic development efforts over the next twenty years.
- Slow Growth Scenario: An average, annual growth rate of 0.8%, the average annual growth rate projected by the Oregon Employment Department for Union County for 2002 to 2012. Recent economic strength of La Grande, though balanced by less impressive performance countywide, renders this annual growth rate a more conservative lower bound for the confidence interval.
- Mill Closure: The fourth scenario assumes that the local mill hypothetically closes in 2010, resulting in a loss of 250 manufacturing jobs, as well as 311 indirect and induced job losses via multiplier effects.[8] Growth rates thereafter are assumed to be consistent with those for the Medium Growth Scenario. The following table provides the results of the economic impact analysis of 250 manufacturing jobs directly lost in the La Grande economy.

[8] IMPLAN direct, indirect and induced multipliers based on the most recent year of data available, 2002.

Table 27

NEGATIVE ECONOMIC IMPACTS FROM LOSS OF SAWMILL EMPLOYMENT CITY OF LA GRANDE, OREGON

	La Grande Job Losses (FTEs)				La Grande
Industry	**Direct**	**Indirect**	**Induced**	**Total**	**% Loss**
Construction	0.0	1.1	1.0	2.1	**1%**
Manufacturing	250.0	27.8	10.9	288.7	**98%**
Wholesale Trade	0.0	25.0	7.2	32.3	**24%**
Retail Trade	0.0	3.0	29.8	32.8	**4%**
Transportation, Warehousing & Utilities	0.0	20.3	5.8	26.1	**19%**
Information	0.0	2.0	3.3	5.3	**4%**
Financial Activities	0.0	8.6	18.0	26.6	**9%**
Professional, Technical & Business Services	0.0	22.5	18.0	40.5	**17%**
Education & Health Services	0.0	0.7	39.0	39.7	**2%**
Leisure & Hospitality	0.0	7.5	29.6	37.1	**6%**
Other Services	0.0	15.1	11.1	26.3	**12%**
Public Administration	0.0	1.0	2.5	3.5	**1%**
Combined Job Losses	***250.0***	***134.9***	***176.2***	***561.0***	***10%***

SOURCE: IMPLAN & Johnson Gardner, LLC

A. EMPLOYMENT PROJECTIONS

Over the 20-year study period, the City of La Grande can expect to add over 1,500 jobs in the Medium Growth scenario assuming the local economy generally follows historical trends. Education & Health Services, Public Administration. Leisure & Hospitality and Retail Trade can be expected to lead the next two decades. Still, Education, & Health Services, led by Eastern Oregon University and the Grand Ronde Hospital, should continue to comprise the majority of local employment. Growth rates for Education & Health Services and Professional & Business Services lead the local economy at 2.2% annually under the Medium Growth Scenario. Results of the employment forecast are summarized in Table 28 on the following page.

By comparison, loss of the local mill by 2010 would represent a 37% reduction in potential economic expansion compared to the Medium Growth Scenario. As demonstrated in Table 27 above, the local Manufacturing sector would be devastated, with significant potential multiplier impacts in other support industries. Industries that utilize industrial land would be particularly hard hit, with slower longer-term growth potential, such as Transportation, Warehousing & Utilities and Wholesale Trade.

Table 28

**20-YEAR EMPLOYMENT FORECAST:
MEDIUM, HIGH, SLOW GROWTH & MILL CLOSURE SCENARIOS**

Medium Growth Scenario	Total Employment				
Employment Sector	2005	2010	2015	2020	2025
Construction	279	285	290	297	303
Manufacturing	294	315	337	360	383
Wholesale Trade	135	148	163	179	197
Retail Trade	847	887	930	976	1,024
Transportation, Warehousing & Utilities	138	140	143	145	147
Information	151	161	171	183	195
Financial Activities	305	321	339	358	379
Professional & Business Services	233	258	285	316	350
Education & Health Services	1,913	1,999	2,094	2,200	2,317
Leisure & Hospitality	623	663	707	753	802
Other Services	214	232	251	272	295
Government	436	495	557	621	688
Total	**5,568**	**5,904**	**6,267**	**6,659**	**7,082**
High Growth Scenario	**Total Employment**				
Employment Sector	**2005**	**2010**	**2015**	**2020**	**2025**
Total	**5,567**	**5,889**	**6,328**	**6,808**	**7,334**
Slow Growth Scenario	**Total Employment**				
Employment Sector	**2005**	**2010**	**2015**	**2020**	**2025**
Total	**5,555**	**5,872**	**6,155**	**6,456**	**6,775**
Mill Closure Scenario	**Total Employment**				
Employment Sector	**2005**	**2010**	**2015**	**2020**	**2025**
Total	**5,568**	**5,343**	**5,706**	**6,098**	**6,521**

B. INDUSTRIAL AND COMMERCIAL LAND NEED

Resulting calculations of land need based on the above employment projections are summarized in Table 23 on the following page. Projections of gross new demand in La Grande for commercial and industrial land between 2005 and 2025 are detailed. The figures include a 25% gross-up factor for roads, public facilities and space.

Through 2025, net new demand for industrial and commercial land is estimated to range from 46.5 acres to 72.1 acres depending upon whether La Grande realizes slower economic growth or high economic growth relative to historical trends. The baseline "Medium Growth Scenario" indicates that La Grande will see demand for industrial and commercial land reach 57.6 acres

through 2025. By contrast, assuming the local mill closes by 2010 and all 250 jobs are lost, total employment land need through 2025 is estimated at only 21.7 acres, less than half of the baseline Medium Growth Scenario estimate.

Table 29

GROSS NEED FOR COMMERCIAL AND INDUSTRIAL LAND
LA GRANDE, OREGON
2005-2025
MEDIUM, HIGH AND LOW GROWTH SCENARIOS

	Gross Need for Land (acres) By Scenario Through:			
	Medium Growth	High Growth	Low Growth	Mill Closure
Use	2025	2025	2025	2025
Office Commercial	*7.9*	*9.2*	*6.3*	*5.8*
Industrial	*24.5*	*28.6*	*19.8*	*-3.8*
Retail Commercial	*25.2*	*34.3*	*20.4*	*19.8*
Resident-Driven	15.1	21.0	13.0	9.7
Visitor-Driven 1/	10.1	13.3	7.4	10.1
Total	***57.6***	***72.1***	***46.5***	***21.7***

1/ Includes tourist/highway traffic as well as shoppers from neighboring areas.
SOURCE: Johnson Gardner LLC

In three of the four scenarios, need for industrial land nearly matches demand for retail commercial land over the 20-year period, signifying La Grande's on-going strength for transportation-dependent uses. In the Medium and High Growth Scenarios, industrial uses comprise 40% to 45% of all employment land need over the next two decades. Under the Low Growth Scenario, Manufacturing and Wholesale Trade are expected to grow at notably slower rates, thus driving a proportionately smaller percentage of need.

C. EMPLOYMENT LAND RESERVE ISSUES

Employment land need forecasts in the above analysis assume a natural or organic rate of expansion for the La Grande economy based on existing industries and trends. In addition to natural growth, however, it will be important for the City to have additional land capacity to accommodate economic developments that are presently impossible to anticipate. These specifically include:

- Abnormally high rates of growth in existing or spin-off industry;
- "Home Run" business attraction, such as a sizeable new distribution center for a national retailer. The recent commitment by Google.com to site a significant internet infrastructure facility in The Dalles on Port of The Dalles property and the new Tillamook Creamery facility in Boardman on Port of Morrow property are examples;
- Contingency for countering potential economic displacement, such as closure of the local mill and its negative economic consequences;
- Ample supply to meet City planning and economic development goals, such as a growing role as a regional trade center.

La Grande's location and public infrastructure investment will largely shape the identity and form of potential "home run" developments and a probable role as the regional economic center. These features include:

- Prime Interstate 84 access with relatively short distance to Interstate 82 and major distribution and transportation traffic through Tri-Cities and Yakima to the Puget Sound;
- Immediate rail access and traffic between the Midwest, the Port of Portland and ports northward to Seattle;
- Location between technology and computer industry centers in Portland, the forthcoming Google facility in The Dalles, technology and research activities at the Northwest National Laboratory in Richland, and the technology and computer industry in Boise; *and*
- Eastern Oregon University.

Finally, industrial parcels of versatile size and reasonable development cost have grown more scarce in the Willamette Valley near Interstate 5, particularly in the Portland metro area. The decision by Google.com to locate in The Dalles – an hour by Interstate 84 to the Portland International Airport – was driven in part by the issue of industrial land availability with excellent transportation access and reasonable cost.

It is, therefore, reasonable to expect that all factors mentioned combined will make La Grande an attractive location for an unprecedented industry or firm to seek a location within the La Grande UGB. It is, therefore, recommended that the City of La Grande consider an industrial land reserve for just such a new traded sector employer in the area.

Assuming the City of La Grande chooses to plan for the contingency of significant manufacturing loss due to mill closure, or have an adequate inventory of land to accommodate future economic goals or "Home Run" developments, the analysis indicates that the City should consider between 160 acres and 195 acres for future 20-year employment land need and reserve. Under the baseline Medium Growth Scenario, the City should consider 176 acres of commercial and industrial land through 2025.

Driving need for reserve land are industrial uses as demonstrated in this analysis. To calculate reserve contingency land need for each of the industrial need scenarios, 90 acres are added due to long-term unavailability of the 90-acre mill site should it close. In addition, closure of the mill would cause foregone economic development due to the losses and structural changes that would occur to the local economy. Utilizing results in Table 23, foregone land need due to ripple effect losses would range from 24 acres to 33 acres for each of the Scenarios.

These industrial land need estimates, however, could be considered conservative due to the fact that they only represent natural economic growth and contingency for manufacturing sector loss. To the extent that City and regional economic development efforts seek to recruit a greater diversity of business types and sizes – or grow in its role as the regional economic center for Eastern Oregon - additional industrial land would need to be considered.

D. 20 YEAR EMPLOYMENT LAND DEMAND BY SPECIFIC USE

A twenty-year employment land use demand analysis by specific type was based on gross land need forecasts already estimated by broad land use category. The following provides a summary of the findings.

1. Existing Commercial & Industrial Base

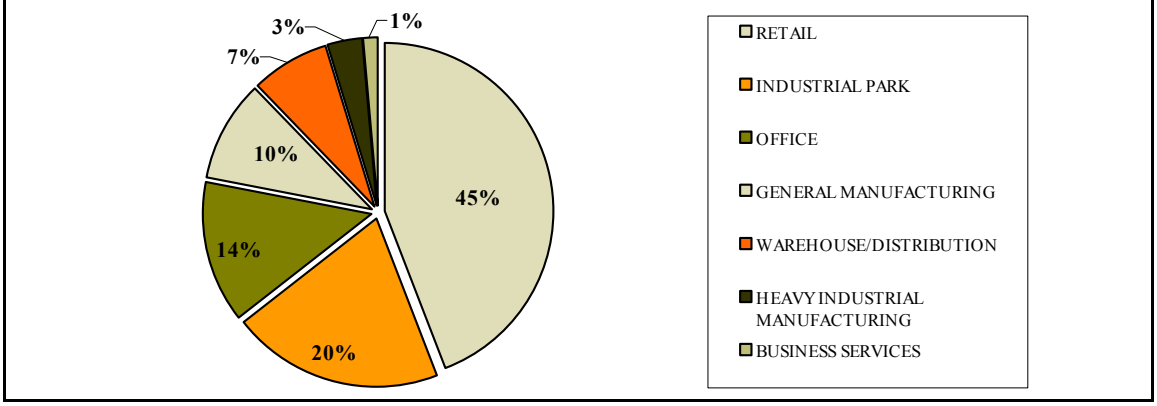
Utilizing the Medium Growth Scenario forecast for broad land use demand categories already established, specific uses were then estimated with greater detail specifically for commercial and industrial need. The table below provides a summary of analysis results by land use designation. Specific uses were determined by the existing industry and sector mix in La Grande based on confidential covered employment data provided by the Oregon Employment Department.

The land need expressed represents gross demand, which includes a 25% gross-up for infrastructure, public facilities and other such uses.

Table 30:
Gross Land Demand: Existing Commercial & Industrial Uses, 2005-2025

	(Acres)				% Share of
Use Type	**2005-2010**	**2015**	**2020**	**2025**	**Demand**
OFFICE	2	4	6	8	14%
RETAIL	6	12	18	25	44%
INDUSTRIAL PARK	3	5	8	12	20%
WAREHOUSE/DISTRIBUTION	1	2	3	4	7%
GENERAL MANUFACTURING	1	3	4	6	10%
BUSINESS SERVICES	0	0	1	1	1%
HEAVY INDUSTRIAL MANUFACTURING	0	1	1	2	3%
TOTAL	***13***	***26***	***41***	***58***	***100%***

PROJECTED SHARE OF LAND DEMAND



Note: Shares of demand in the above pie chart are displayed in descending order, ranging from retail (45%) as the greatest to business services (1%) as the smallest.

The above results depend upon the following two crucial assumptions:

- *La Grande only accommodates expansion of its existing commercial and industrial uses;* and
- *Local mill closure does not occur in the next twenty years.*

Utilizing these two assumptions, Industrial Park need comprises the second-largest industrial use over the twenty-year period at nine acres. Industrial parks typically accommodate a variety of industrial activities as well as related office uses and potential retail commercial uses, depending

upon zoning designation and business park or strictly industrial park orientation. Nearly all industries can utilize industrial park space given the frequent flexibility of sizes and types of space and parcels available.

The remaining need by industrial uses, in descending order, over the twenty-year period are:

- *General Manufacturing* (4 acres) – The category of use comprises more specialized manufacturers in light and general industrial activity. Firms require facilities of similar size as those in Industrial Parks, but frequently require unique or specialized facilities of high investment value. Such facilities are frequently owner-build or build-to-suit. Proximity to rail is frequently an attractor.
- *Warehouse/Distribution* (3 acres) – The category of use largely comprises wholesale trade and warehouse, transportation and utilities sectors. Low office build-out, larger shell space, high-cube and standard bay doors, access/turning radius and sufficient freeway access are all important requirements.
- *Heavy Industrial* (2 acres) - The category of use largely comprises more specialized manufactures with heavy industrial activity. The need in La Grande is not expected to be significant given the current relative lack of existing firms with in the City.
- *Business Services/Call Centers* (1 acre) – Business storage, service annexes and call centers largely comprise this category of use. The need is not significant as existing firm sizes within the La Grande UGB, and likely future firm size distribution, will not support significant demand.

2. Future Industrial Uses

Estimates of land demand expressed above assumed that La Grande would only accommodate growth of its existing commercial and industrial mix and that closure of the mill, and loss of 250 mill jobs, would not occur over the next twenty years. However, based on an analysis summarized in the previous section, the City should consider additional land need for the purposes of contingency for a major economic loss, such as mill closure and unsuitability of re-use of the site, as well as greater diversity and availability of employment sites within the UGB, than currently exist.

Assuming the Medium Growth Scenario, twenty-year estimate of 118 acres of additional need to accommodate such issues, the analysis indicates that Industrial Park, General Manufacturing and Warehouse/Distribution uses would most likely comprise the majority of potential new industry recruitment potential. Local transportation access, existing industry, regional and county economic performance and recent economic development successes along the I-84 corridor are major determinants.

3. Future Medium Format Commercial Uses

As described above, the twenty-year need for retail commercial land in La Grande is estimated at 25 gross acres. While twenty-five acres of need results from growth at status quo trends, to the extent that La Grande seeks to grow as a commercial center, twenty-five acres of retail

commercial land is not adequate. An additional 30 acres is needed to accommodate Medium Format Commercial uses.

To successfully pursue such an economic development objective, La Grande will require at least two times the estimated need for commercial retail land. Up to 55 acres of retail commercial land availability would be advisable, configured as follows:

- Status Quo Growth: 25 acres in varying sized parcels, from 0.5 acres up to 5 acres, for various retail development serving new population and visitors.
- Medium Format Retail: At least two parcels ranging from 10 to 20 acres each would be necessary to encourage medium-format retail development. This would include smaller-format Lowe's, Home Depot, auto dealerships or RV dealerships complementary to local and regional manufacturing, or a grocery store-anchored center with restaurant and miscellaneous retail/services and speculative space.

Table 31:
Gross Land Demand: Existing & Future Commercial & Industrial Uses, 2005-2025

	(Acres)				% Share of
Use Type	2005-2010	2015	2020	2025	Demand
OFFICE	**2**	**4**	**6**	**8**	**4%**
RETAIL	**21**	**27**	**48**	**55**	**27%**
Status Quo Growth	*6*	*12*	*18*	*25*	*12%*
Medium-Format Sites	*15*	*15*	*30*	*30*	*15%*
INDUSTRIAL PARK	**12**	**25**	**38**	**51**	**25%**
Status Quo Growth	*3*	*5*	*8*	*12*	*6%*
Expanded Industry	*10*	*20*	*30*	*39*	*19%*
WAREHOUSE/DISTRIBUTION	**11**	**22**	**33**	**44**	**21%**
Status Quo Growth	*1*	*2*	*3*	*4*	*2%*
Expanded Industry	*10*	*20*	*30*	*39*	*19%*
GENERAL MANUFACTURING	**11**	**22**	**34**	**45**	**22%**
Status Quo Growth	*1*	*3*	*4*	*6*	*3%*
Expanded Industry	*10*	*20*	*30*	*39*	*19%*
BUSINESS SERVICES	**0**	**0**	**1**	**1**	**0%**
HEAVY INDUSTRIAL MANUFACTURING	**0**	**1**	**1**	**2**	**1%**
TOTAL	***57***	***101***	***160***	***206***	***100%***

Retail commercial need comprises the single largest category of use (55 acres) over the planning period. Industrial Park (51 acres), General Manufacturing (45 acres), and Warehouse/Distribution (44 acres) uses comprise the top three likely engines of industrial land need over the next twenty years.

V. Analysis of Land Demand and Supply

To assess the adequacy of the City's existing supply of commercial and industrial properties within City Limits and the Urban Growth Boundary (UGB), this section compares the land supply with the land demand. The land demand has been computed based on continuation and growth of the existing industrial base and a diversified/expanded industrial base and expanded commercial site opportunities.

A. Commercial and Industrial Land Supply

An inventory of the commercial and industrial properties has been performed for sites within the City Limits and UGB. Properties included in the analysis were parcels within City Limits that were zoned Central Business (CB), General Commercial (GC), Interchange Commercial (IC), Business Park (BP), Light Industrial (M-1), and Heavy Industrial (M-2), as well as those properties in the UGB with Commercial and Industrial Comprehensive Plan designations. Exhibit 1 illustrates the vacant lands inventory for the commercial and industrial parcels. Information on the parcels depicted in this Exhibit is included in Appendix A.

Only those sites that were vacant, partially vacant, or redevelopable were considered for further site analysis. For commercial properties, sites smaller than ½-acre were deemed too small to contribute toward satisfying the City's commercial land demand. For industrial properties, sites smaller than 1 acre were deemed too small to contribute toward satisfying the City's industrial land demand. The evaluation of specific sites revealed that only a limited number of sites are immediately available for development.

The Benkendorf Associates Corp. evaluated all vacant, partially vacant, and redevelopable commercial sites over ½ acre and the industrial sites over 1 acre. Based on an assessment of water and sewer availability, street access, site shape and location, and environmental considerations, the sites have been grouped into four different categories:

1. Fully serviced, ready to go;
2. Site conditions can be mitigated;
3. Site conditions cannot be mitigated; and
4. Site conditions suggest that current zone is unsuitable.

See Appendix B for the full evaluation of vacant, partially vacant, and redevelopable commercial sites over ½ acre and industrial sites over 1 acre. Only those sites in the first two categories are suitable for satisfying a portion of the City's long-term commercial and industrial land demand. A summary of the supply of vacant buildable land in the first two categories is included in the following table.

Exhibit 1: Vacant Lands Inventory, Commercial & Industrial Parcels

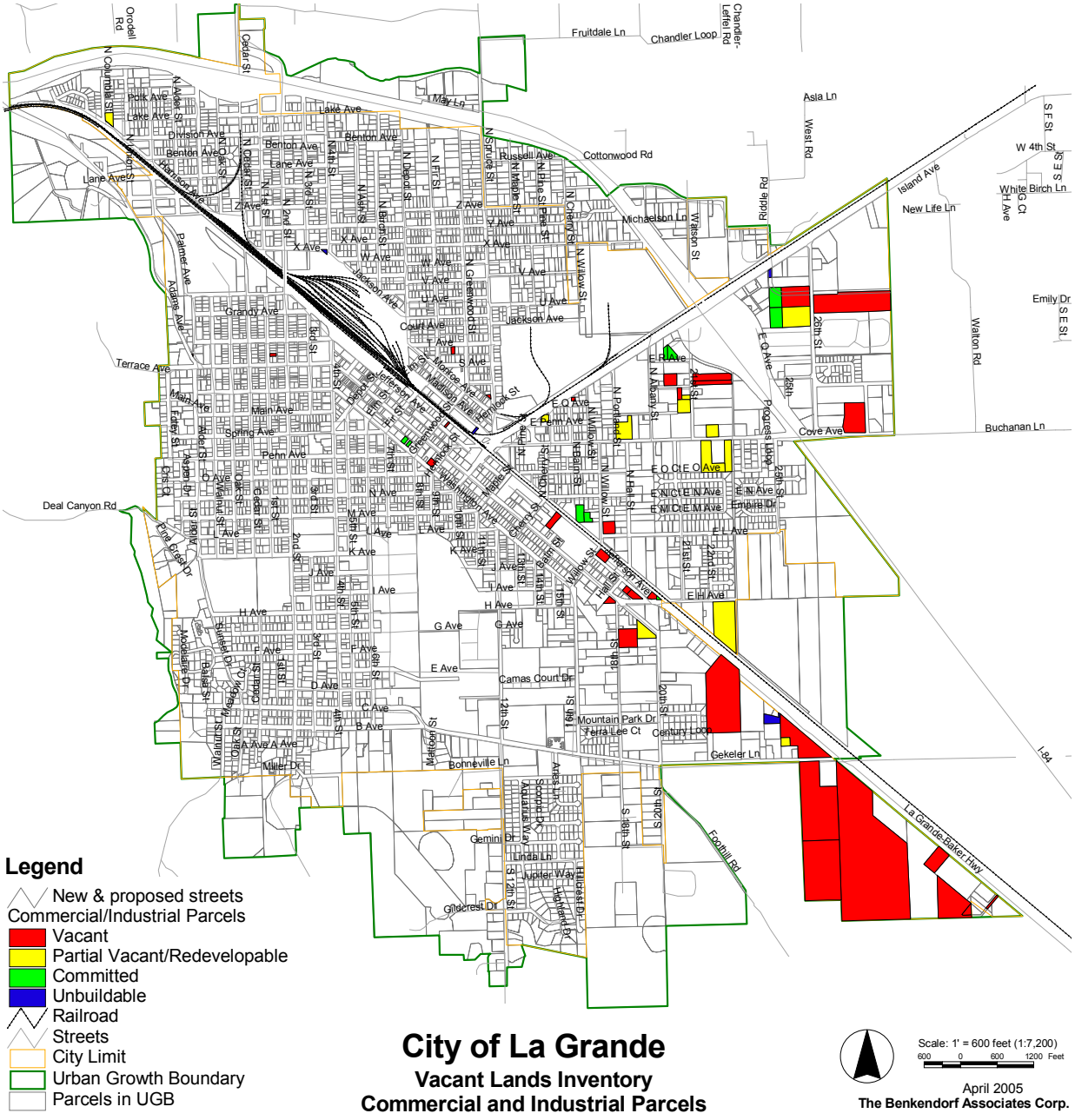


Table 32:
Summary of Buildable Commercial and Industrial Land Supply

Zone	Vacant Buildable Acres by Category		
	Fully Serviced, Ready to Go	Site Conditions can be Mitigated	Total
Business Park (BP)	0	72.3	72.3
Light Industrial (M-1)	0	1.78	1.78
Heavy Industrial (M-2)	0	6.86	6.86
General Commercial (GC)	9.12	29.00	38.12
Interchange Commercial (IC)	0	0	0
Central Business (CB)	0	0	0

B. 2025 GROSS LAND DEMAND FOR EXISTING & FUTURE COMMERCIAL & INDUSTRIAL USES

As observed previously, La Grande requires 206 acres to accommodate the commercial and industrial land needs. The following table illustrates the need for each of the commercial and industrial land uses in the year 2025.

Table 33:
Land Demand, Existing & Expanded Industrial Uses and Commercial Opportunities

Use Type	2025 Demand (Gross Acres)
Office	8
Retail	55
Industrial Park	51
Warehouse/Distribution	44
General Manufacturing	45
Business Services	1
Heavy Industrial Manufacturing	2
TOTAL	***206***

The land demand for these uses is compared to the supply of vacant buildable land in the following subsections.

1. Office and Retail

The 2025 land demand for office is 8 acres, and the land demand for retail is 55 acres; together, these two uses have a need of 63 gross acres. There are currently 9.12 vacant buildable acres with General Commercial zoning in the "fully serviced, ready to go" category. There are an additional 29 vacant buildable acres with General Commercial zoning in the "site conditions can be mitigated" category. No sites in the Central Business or Interchange Commercial zones are in these two categories.

Based on the office and commercial need for 63 acres, and the current availability of 38.12 vacant buildable acres, the existing commercial land supply is insufficient to meet the 2025 land demand under this scenario. Furthermore, the limited number of larger parcels (only two sites have buildable land over 5 acres) could hamper economic development. Recommendations to address the land need for office and retail are found in the next section.

2. Industrial Park, Warehouse/Distribution, General Manufacturing, and Business Services

The 2025 land demand is 51 acres for industrial park, 44 acres for warehouse/distribution, 45 acres for general manufacturing, and 1 acre for business services, totaling 141 acres. The land supply in the Business Park and Light Industrial zones includes 74.08 vacant buildable acres in the "site conditions can be mitigated" category, but no sites in the "fully serviced, ready to go" category. The City's Business Park site is too small to accommodate the 2025 land demand for industrial park, warehouse/distribution, general manufacturing, and business service under this scenario, but does provide a variety of parcel sizes, including larger parcels crucial to flexibility and economic development. Recommendations to address the land need for industrial park, warehouse/distribution, general manufacturing, and business services are found in the next section.

3. Heavy Manufacturing

The 2025 land demand for heavy manufacturing is 2 acres. As noted earlier, there are two sites zoned Heavy Industrial (M-2) with a total buildable area of 6.86 acres in the "site conditions can be mitigated" category, but the two existing M-2 sites could cause negative offsite impacts to adjacent offices. Consequently, the City should consider additional M-2 sites totaling 10 to 20 acres to accommodate the site requirements for heavy industrial users. Recommendations to address the land need for heavy manufacturing are found in the next section.

VI. Recommendations to Address Commercial and Industrial Land Needs

The evaluation of vacant, partially vacant, and redevelopable commercial sites over ½ acre and industrial sites over 1 acre revealed that only a limited number of sites are immediately available for development (see Appendix A).

The City intends to diversify and expand its industrial base, and to moderately grow as a commercial center. The corresponding land demand for commercial and industrial uses is 206 gross acres, as outlined above. There is a need for an additional 30 acres of land for retail and 67 acres for industrial park, warehouse/distribution, general manufacturing, and business services.

The City will take the following actions to increase site availability for commercial and industrial development:

- Amend the Urban Growth Boundary to include the site immediately west of the existing Business Park and designate this area Industrial on the Comprehensive Plan Map. This site is included in the City's design for the Business Park and is comprised of 39.4 vacant buildable acres. The remaining triangular shaped parcel totals 32.9 acres and should eventually be added to the UGB and zoned Light Industrial.

- Amend the Comprehensive Plan Map to re-designate the area immediately north of the Business Park, on the north side of Adams Avenue/Highway 30 and the railroad tracks from Medium Density Residential to Industrial. The parcels are immediately east of the City Limits but in the UGB and adjacent to a light industrial site (tax lot 3S38.9CB/101) occupied in part by Verizon. This area is approximately 31 acres within the UGB. Some of this area may be used to satisfy the heavy industrial need for large sites.

- Amend the Urban Growth Boundary to include the area on the north side of Island Avenue/Highway 82, immediately north of the northeastern corner of the La Grande City Limits and UGB. This site, with an area of approximately 37.8 acres, should be designated Commercial on the Comprehensive Plan Map.

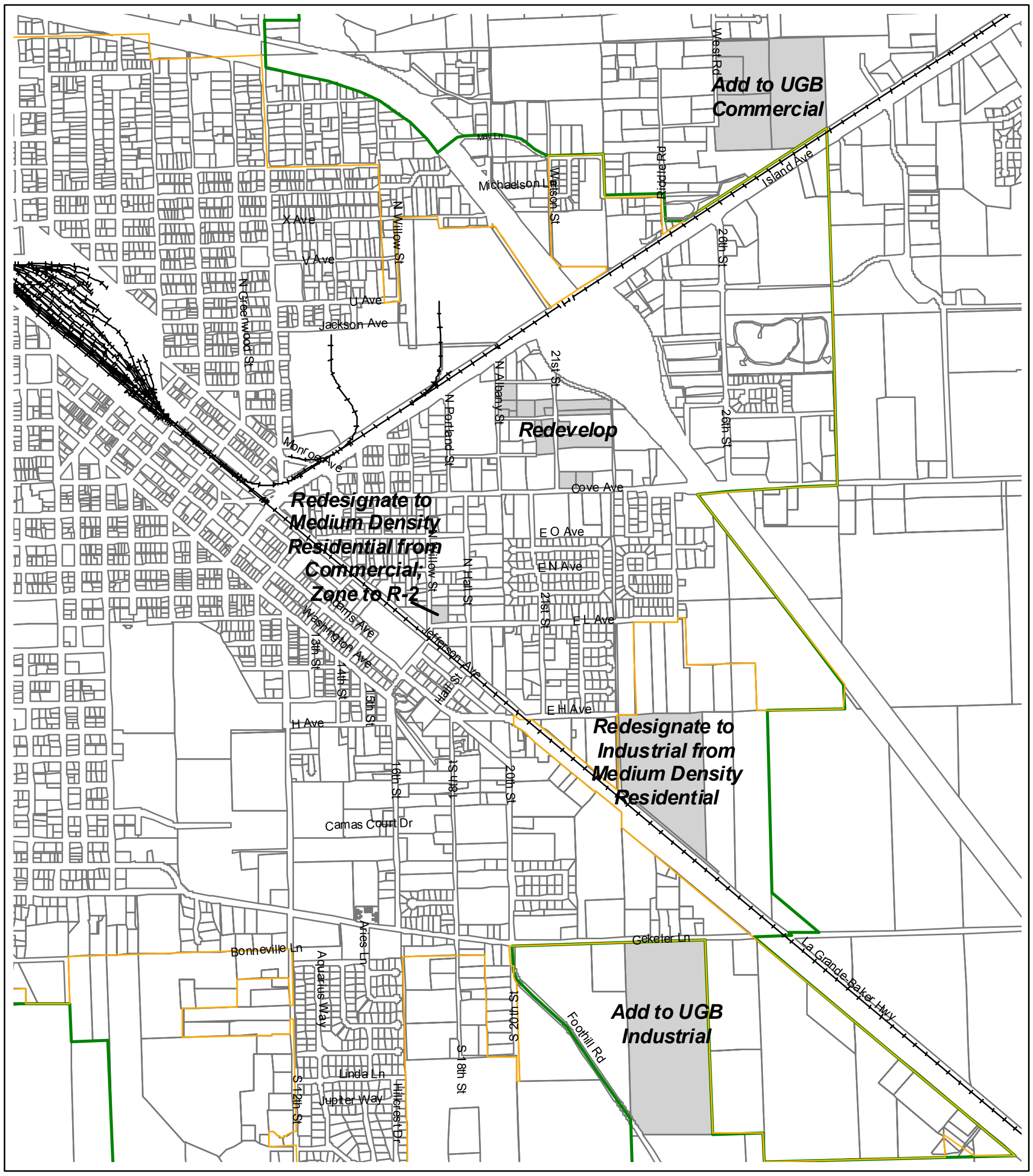
- Utilize the urban renewal agency or other tools to aggregate and redevelop commercial parcels in the area bounded by Cove Avenue, North Albany Street, East R Avenue, and the Grande Ronde Ditch. This area is comprised of 31 parcels with a cumulative area of 35 acres. Four of the parcels are vacant and three parcels are partially vacant/redevelopable; together, the buildable area of these 7 parcels is 5.45 acres. The remainder of the area is currently occupied but redevelopment could occur more efficiently if parcels were merged to create sites with larger areas.

- Utilize the urban renewal agency or other tools to create several vacant buildable commercial sites with a minimum of 5 acres each.

- Rezone one site identified as unsuitable for commercial uses to Residential R-2. The site is tax lot 3S38.8AA/3602_1-32, with an area of 0.92 gross acres.

A diagram of the proposed Comprehensive Plan and Zoning Map amendments is included on Exhibit 2.

Exhibit 2



City of La Grande

Vacant Lands Inventory
Commerical and Industrial Recommendations

0 1000 2000 Feet

Legend
- Streets
- Railroad
- City Limits
- UGB
- Parcels

Appendix A: Vacant Lands Inventory, Commercial & Industrial Parcels

				Size (acres)			
Category	**Zone**	**Classification**	**Parcel ID**	**Parcel**	**Developed**	**Unbuildable**	**Buildable**	**Comments**
NET BUILDABLE AREA OVER 5 ACRES								
Business Park	BP	Vacant	3S38.16/500_1-32	49.12			49.12	
Business Park	BP	Vacant	3S38.16/600_1-32	13.97			13.97	
Business Park	BP	Vacant	3S38.16/690_1-32	15.47			15.47	
		Subtotal, area over 5 acres		**78.56**	**0.00**	**0.00**	**78.56**	
Total BP Lots = 3			**BP Subtotal**	**78.56**	**0.00**	**0.00**	**78.56**	
NET BUILDABLE AREA 0.5 ACRES OR SMALLER								
Central Business	CB	Committed	3S38.5CC/5200_1-32	0.12			0.12	Gravel parking lot (Goss Motors)
Central Business	CB	Committed	3S38.5CC/5400_1-32	0.18			0.18	Gravel parking lot (Goss Motors)
		Subtotal, area 0.5 acres or smaller		**0.30**	**0.00**	**0.00**	**0.30**	
Total CB Lots = 2			**CB Subtotal**	**0.30**	**0.00**	**0.00**	**0.30**	
NET BUILDABLE AREA 0.5 ACRES OR SMALLER								
General Commercial	GC	Vacant	3S38.4CC/1800_1-32	0.34			0.34	
General Commercial	GC	Part. Vac./Redev.	3S38.4CC/1801_1-32	0.22			0.22	
General Commercial	GC	Vacant	3S38.5CA/10400_1-32	0.17			0.17	
General Commercial	GC	Vacant	3S38.5CD/1400_1-32	0.07			0.07	
General Commercial	GC	Part. Vac./Redev.	3S38.5DC/2500_1-32	0.29	0.15		0.14	50% committed (house on south half)
General Commercial	GC	Vacant	3S38.5DC/400_1-32	0.09			0.09	
General Commercial	GC	Vacant	3S38.6DA/6601_1-32	0.11			0.11	
General Commercial	GC	Vacant	3S38.8AD/1300_1-32	0.46			0.46	
General Commercial	GC	Vacant	3S38.8AD/1400_1-32	0.25			0.25	
General Commercial	GC	Vacant	3S38.8BA/7200_1-32	0.27	0.07		0.20	0.07 ac developed (Globe Furniture storage & loading zone)
General Commercial	GC	Vacant	3S38.8DA/1702_1-32	0.30			0.30	
General Commercial	GC	Part. Vac./Redev.	3S38.9BB/200_1-32	1.33	0.20	0.63	0.50	Storage units (0.5 ac vacant)
General Commercial	GC	Part. Vac./Redev.	3S38.9BB/202_1-32	2.73	2.30		0.43	Storage units (0.43 ac vacant)
General Commercial	GC	Part. Vac./Redev.	3S38.9CD/101_1-32	0.48	0.48		0.00	Redevelopable
General Commercial	GC	Unbuildable	3S38.9CD/200_1-32	0.82		0.82	0.00	Riparian/other
		Subtotal, area 0.5 acres or smaller		**7.93**	**3.20**	**1.45**	**3.28**	

Appendix A (continued)

Category	Zone	Classification	Parcel ID	Parcel	Size (acres)			Comments
					Developed	Unbuildable	Buildable	
NET BUILDABLE AREA 0.51-2 ACRES								
General Commercial	GC	Committed	3S38.4CA/1400_1-25	1.50		0.20	1.30	Proposed Riddle Road extension (0.20 ac); Gravel truck parking for hotel
General Commercial	GC	Committed	3S38.4CA/1700_1-25	1.50			1.50	Gravel truck parking for hotel
General Commercial	GC	Part. Vac./Redev.	3S38.4CC/1200_1-32	0.90		0.30	0.60	Existing house; 0.30 ac unbuildable (riparian area)
General Commercial	GC	Part. Vac./Redev.	3S38.4CC/1400_1-32	1.05	0.25		0.80	Redevelopable
General Commercial	GC	Vacant	3S38.4CC/601_1-1	1.66			1.66	
General Commercial	GC	Vacant	3S38.4CC/700_1-1	0.88			0.88	
General Commercial	GC	Part. Vac./Redev.	3S38.5DD/1000_1-32	1.86	0.93		0.93	50% vacant; existing house
General Commercial	GC	Vacant	3S38.6DB/11905_1-1	0.53			0.53	
General Commercial	GC	Vacant	3S38.8AA/3602_1-32	0.92			0.92	
General Commercial	GC	Vacant	3S38.8AB/5501_1-32	0.67			0.67	
General Commercial	GC	Part. Vac./Redev.	3S38.8DA/500_1-32	1.26	0.60		0.66	Redevelopable
		Subtotal, area 0.51-2 acres		**12.73**	**1.78**	**0.50**	**10.45**	
NET BUILDABLE AREA 2.01-5 ACRES								
General Commercial	GC	Vacant	3S38.4/9800_1-25	9.31	6.98		2.33	
General Commercial	GC	Vacant	3S38.4CA/1500_1-25	3.50		0.64	2.86	Proposed Riddle Road extension (0.64 ac); 50% vacant; 50% redevelopable
General Commercial	GC	Part. Vac./Redev.	3S38.4CA/1600_1-25	3.50	0.50		3.00	Vacant w/ 0.5 acre redevelopable
General Commercial	GC	Vacant	3S38.4DC/700_1-25	3.89			3.89	
General Commercial	GC	Vacant	3S38.8DA/1200_1-32	2.12			2.12	
		Subtotal, area 2.01-5 acres		**22.32**	**7.48**	**0.64**	**14.20**	
NET BUILDABLE AREA OVER 5 ACRES								
General Commercial	GC	Vacant	3S38.9CC/101_1-32	15.53			15.53	
General Commercial	GC	Vacant	3S38.9CD/100_1-32	5.19		0.13	5.06	0.13 ac unbuildable (riparian area)
		Subtotal, area over 5 acres		**20.72**	**0.00**	**0.13**	**20.59**	
Total GC Lots = 33			**GC Subtotal**	**63.70**	**12.46**	**2.72**	**48.52**	
NET BUILDABLE AREA 0.5 ACRES OR SMALLER								
Interchange Commercial	IC	Unbuildable	3S38.4BD/2600_1-25	0.19		0.19	0.00	Proposed Riddle Road extension. Parking lot
Interchange Commercial	IC	Committed	3S38.4CB/600_1-1	0.31		0.31	0.00	Parking lot Motel truck pkg
Interchange Commercial	IC	Committed	3S38.4CB/701_1-1	0.58		0.58	0.00	Parking lot gravel pkg for Super 8
		Subtotal, area 0.5 acres or smaller		**1.08**	**0.00**	**1.08**	**0.00**	
NET BUILDABLE AREA 0.51-2 ACRES								
Interchange Commercial	IC	Vacant	3S38.4CC/200_1-1	0.95			0.95	
		Subtotal, area 0.51-2 acres		**0.95**	**0.00**	**0.00**	**0.95**	
Total IC Lots = 4			**IC Subtotal**	**2.03**	**0.00**	**1.08**	**0.95**	

Appendix A (continued)

				Size (acres)				
Category	**Zone**	**Classification**	**Parcel ID**	**Parcel**	**Developed**	**Unbuildable**	**Buildable**	**Comments**
NET BUILDABLE AREA 0.5 ACRES OR SMALLER								
Light Industrial	M-1	Part. Vac./Redev.	2S38.31CD/1101_1-1	0.55	0.33		0.22	Developed (redevelopable) portion built, portion vacant/outdoor storage).
Light Industrial	M-1	Vacant	3S38.5CD/7500_1-32	0.08			0.08	
Light Industrial	M-1	Unbuildable	3S38.5CD/9000_1-32	0.11		0.11	0.00	Undevelopable (railroad)
Light Industrial	M-1	Unbuildable	3S38.6AD/5000_1-1	0.09		0.09	0.00	Vacant/undevelopable - at an intersection and within sight triangle. Would not support perm. structures
Light Industrial	M-1	Committed	3S38.8AA/4500_1-32	0.41			0.41	Used for outdoor storage (no perm. structures). City garbage service.
Light Industrial	M-1	Vacant	3S38.8AD/1001_1-32	0.28			0.28	
Light Industrial	M-1	Committed	3S38.9BC/1500_1-6	0.07			0.07	Developed w/ Billboard (Meadow Outdoor Advertising) - long term lease
		Subtotal, area 0.5 acres or smaller		**1.59**	**0.33**	**0.20**	**1.06**	
NET BUILDABLE AREA 0.51-2 ACRES								
Light Industrial	M-1	Committed	3S38.8AA/4400_1-32	0.83	0.08	0.19	0.56	Mostly vacant- One building 10% of site, 90% of site is vacant, outdoor storage. 0.19 ac unbuildable (riparian). Ditch company.
Light Industrial	M-1	Vacant	3S38.8AD/400_1-32	0.60			0.60	
Light Industrial	M-1	Part. Vac./Redev.	3S38.9CB/101_1-32	5.78	4.00		1.78	
		Subtotal, area 0.51-2 acres		**7.21**	**4.08**	**0.19**	**2.94**	
Total M-1 Lots = 10			**M-1 Subtotal**	**8.80**	**4.41**	**0.39**	**4.00**	
NET BUILDABLE AREA 0.51-2 ACRES								
Heavy Industrial	M-2	Vacant	3S38.16AD/102_1-32	0.80		0.26	0.54	Used for outdoor storage (no perm. structures). 0.26 ac Riparian
Heavy Industrial	M-2	Vacant	3S38.16AD/200_1-32	2.00		0.26	1.74	0.26 ac Riparian
		Subtotal, area 0.51-2 acres		**2.80**	**0.00**	**0.52**	**2.28**	
NET BUILDABLE AREA OVER 5 ACRES								
Heavy Industrial	M-2	Vacant	3S38.16AD/101_1-32	5.94		0.82	5.12	Used for outdoor storage (no perm. structures). 0.82 ac Riparian
		Subtotal, area over 5 acres		**5.94**	**0.00**	**0.82**	**5.12**	
Total M-2 Lots = 3			**M-2 Subtotal**	**8.74**	**0.00**	**1.34**	**7.40**	
Total Lots = 55			**Total**	**162.13**	**16.87**	**5.53**	**139.72**	

Appendix B: Evaluation of Vacant Commercial & Industrial Land

BUSINESS PARK & INDUSTRIAL SITES

Site conditions can be mitigated

Parcel ID	Gross Acres	Buildable Acres	Zone	Water Availability	Sewer Availability	Street Access	Shape	Location	Environmental considerations
3S38.16/500_1-32	49.12	47.10	BP	16"	27"	Minor Arterial (Rt. 30)	Deep		Portion in floodplain.
3S38.16/600_1-32	13.97	12.30	BP	Approx. 1,300' to 14"	Approx. 1,300' to 24"	No frontage. Approx. 1,300' to Minor Arterial (through another lot)	Deep	Industrial Park Master Plan	Portion in floodplain.
3S38.16/690_1-32	15.47	12.90	BP	14"	24"	Minor Arterial	Deep	Industrial Park Master Plan	Portion in floodplain.
3S38.9CB/101_1-32	5.78	1.78	M-1	Approx. 50' to 8"	8"	2 blocks to Principal Arterial (Rt. 30)	Deep		
3S38.16AD/101_1-32	5.94	5.12	M-2	Approx. 450' to 16"	Approx 250' to 27"	Narrow frontage on Minor Arterial (Rt. 30)	Unusual shape		Portion in floodplain.
3S38.16AD/200_1-32	2.00	1.74	M-2	16"	27"	Minor Arterial (Rt. 30)			Stream. Portion in floodplain.

COMMERCIAL SITES

Fully serviced, ready to go

3S38.4/9800_1-25	9.31	2.33	GC	10"	8"	Major Collector	Deep		
3S38.4CA/1500_1-25	3.50	2.86	GC	10"	8"	Major Collector			
3S38.4CA/1600_1-25	3.50	3.00	GC	10"	12"	Major Collector			
3S38.5DD/1000_1-32	1.86	0.93	GC	6", 8", & 18"	8"	Minor Arterial	L-shaped		

Site conditions can be mitigated

3S38.4CA/1400_1-25	1.50	1.30	GC	Approx. 400' to 18"	10"	1 block to Principal Arterial (Rt. 82)			
3S38.4CC/1200_1-32	0.90	0.60	GC	Approx. 250' to 12"	8"	Minor Arterial			
3S38.4DC/700_1-25	3.89	3.89	GC	Approx. 500' to 10"	8"	Minor Arterial	Deep		
3S38.8DA/1200_1-32	2.12	2.12	GC	8"	8"	1 block to Principal Arterial (Rt. 30)			Stream. Portion in floodplain.
3S38.9BB/200_1-32	1.33	0.50	GC	Approx. 200' to 12"	8"	Minor Arterial	L-shaped		
3S38.9CC/101_1-32	15.53	15.53	GC	8"	8"	Principal Arterial (Rt. 30)	Deep		Stream. Portion in floodplain.
3S38.9CD/100_1-32	5.19	5.06	GC	8"	24"	Minor Arterial	Wide. Long Rt. 30 frontage		Stream. Portion in floodplain.

Site conditions cannot be mitigated

3S38.4CA/1700_1-25	1.50	1.50	GC	Approx. 500' to 10"	Approx. 500' to 12"	No frontage. 1 block to Principal Arterial (Rt. 82).			
3S38.8AB/5501_1-32	0.67	0.67	GC	Approx. 270' to 14" (through another lot)	Approx. 270' to 10" (through another lot)	No frontage. 1 block to Principal Arterial (Rt. 30).			
3S38.8DA/500_1-32	1.26	0.66	GC	4" & 8"	Approx. 100' to 8"	Minor Arterial	Triangular		
3S38.9BB/202_1-32	2.73	0.43	GC	Approx. 150' to 12"	8"	Minor Arterial	Narrow, long		

Site conditions suggest current zone is unsuitable

3S38.4CC/1400_1-32	1.05	0.80	GC	8"	8"	1 block to Minor Arterial		Poor location	
3S38.4CC/601_1-1	1.66	1.66	GC	8"	8"	950' to Minor Arterial	Deep	Poor location	
3S38.4CC/700_1-1	0.88	0.88	GC	8"	8"	850' to Minor Arterial	Deep	Poor location	
3S38.8AA/3602_1-32	0.92	0.92	GC	8"	Approx. 250' to 8" (through another lot)	Minor Arterial		Poor location	Stream
3S38.9CD/200_1-32	0.82	0.00	GC	8"	Approx. 200' to 27"	Narrow frontage on Minor Arterial (Rt. 30)	L-shaped		Stream. Floodplain.
3S38.4CB/701_1-1	0.58	0.00	IC	8"	8"	1 block to Principal Arterial (Rt. 82)	Wedge		
3S38.4CC/200_1-1	0.95	0.95	IC	8"	8"	2 blocks to Principal Arterial (Rt. 82)		Poor location	

Note: the shading denotes those conditions which can be mitigated.

Statewide Planning Goal 10 - Housing

Objective –

1. To provide for the housing needs of the citizens of La Grande, and to support development of an adequate supply of housing in terms of quantity, quality, and availability especially to groups, such as low and moderate income households, elderly and handicapped households

2. To assure environmental quality in residential areas, and to enhance the financial ability of households to obtain and retain decent dwelling units.

3. To assure an open housing market for all La Grande citizens, and to assure a balance of individual and community needs in residential areas.

4. To provide areas suitable and desirable for all types of single and multiple family residential uses which have or will need public water and sewage services, commercial and education support facilities and employment opportunities.

I. Buildable Land Inventory

The objective of this section is to calculate the number of acres of buildable land in each plan designation in the existing Urban Growth Boundary (UGB) of the City of La Grande. Buildable land is defined as land that is suitable and available and necessary for the designated uses. This section provides the basis for subsequent calculations on the capacity of the UGB to accommodate future growth.

The following analysis uses a methodology suggested by *Planning for Residential Growth: A Workbook for Oregon's Urban Areas* produced by the Transportation and Growth Management Program (TGM) of the Oregon Department of Transportation (ODOT) and the Oregon Department of Land Conservation and Development (DLCD). The steps used in this methodology have been followed to the greatest extent possible, given the data available for the City of La Grande.

A. Gross buildable vacant acres by zoning district

The City of La Grande has a GIS-based parcel database that was current as of December 2000. TBAC field-checked a preliminary list of vacant parcels in January 2001. The City and TBAC refined this list through further field-checking and GIS analysis in February and March 2001.

Those parcels considered as vacant in the following analysis include fully vacant parcels and parcels that are partially vacant and/or redevelopable.

Table I.1 shows the land use zones designated by the City of La Grande in its Zoning Ordinance. These zones account for all the land within the UGB.

Table I.1 City of La Grande Zoning Districts

Zone	Code
Non-Residential	
Commercial	
General Commercial	GC
Central Business	CB
Interchange Commercial	IC
Industrial	
Light Industrial	M-1
Heavy Industrial	M-2
Other	
Public Facilities	PF
Residential	
Hillside Development Residential	HD
Rural Residential	RR-1
Low Density Residential	R-1
Medium Density Residential	R-2
High Density Residential	R-3
Residential-Professional	R-P

Source: City of La Grande Land Development Code Ordinance

Table I.2 shows the total land within the UGB of the City of La Grande. Note: the Public Facilities (PF) Zone was added to the City of La Grande Zoning Code in March 2001, but the GIS system was not updated as of the writing of this report to allow an inventory of PFzoned parcels.

Table I.2 Land within UGB by Zoning District

Zone	Total Acres	Total Parcels	Total Acres in Parcels
PF	338.34	-	-
CB	35.01	113	19.44
GC	390.57	537	324.47
IC	29.45	35	26.82
M-1	191.84	106	69.03
M-2	210.57	29	211.93
HD	160.70	115	150.62
R-1	316.80	173	324.12
R-2	1,322.39	3,173	1,159.41
R-3	302.73	548	239.86
R-P	64.95	155	53.05
RR-1	90.30	15	99.86
Not Zoned (Highway Area)	128.74	-	-
UGB Total	**3,582.35**	**4,999**	**2,678.62**

Source: The Benkendorf Associates Corp., 2001 from data provided by the City of La Grande (December 2000) and updated by the City of La Grande (March 2001).

The gross vacant buildable acreage figures within the UGB of the City of La Grande are shown in Table I.3. Unbuildable vacant land is defined as vacant land which is subject to physical constraints, such as steep slopes or riparian corridors, or was otherwise

identified by the City of La Grande as unbuildable. For the purposes of this calculation, unbuildable vacant land also includes the developed portion of partially vacant or redevelopable parcels. For the purposes of this calculation, the vacant land inventory excludes all of the vacant land that is zoned PF (Public Facilities) and/or is owned by a public entity.

Table I.3 below contains an inventory of all parcels identified as vacant and in the UGB. The parcels have been given four classifications: 1) "vacant" - 100% of the parcel has been identified by City Staff as buildable; 2) "partially vacant/redevelopable" - parcels with some development on the site and with development potential on the vacant portion of site, or parcels with major development constraints (such as steep slopes) on a portion of the site; 3) "committed" - the site has already committed to development; and 4) "unbuildable" - 100% of the site has been identified by City Staff as unbuildable, due to constraints such as steep slopes or committed uses on the site.

The "preliminary unbuildable acres" column represents the area of the parcel that was identified by the City of La Grande as unbuildable for a variety of reasons, including: parcels committed to development, steep slopes, and creeks. TBAC and the City conducted further GIS analysis to identify other constraints on the development potential of parcels. These constraints are identified in the table as City-designated riparian buffer areas, pond/lakes, elevations greater than 3,000 feet, and "other/combined" constraints identified by the City, including power transmission lines by themselves or combined with riparian areas. "Preliminary unbuildable acres," "riparian acres," "pond acres," "greater than 3,000 feet acres, " and "other/ combined constraints" acres are subtracted from total parcel area to arrive at the "final gross buildable acres" figure for each parcel.

The table also shows land within the 100-year floodplain for each parcel. This land is not exclusive from the other constraints listed and can potentially overlap with other constraints shown, such as riparian areas. Also, since development is currently allowed in floodplain areas, the presence of floodplains does not necessarily limit development. The City may address this issue as part of Periodic Review.

As shown in Table I.3, a total of 575.68 acres of land in the City of La Grande UGB is classified as vacant buildable, out of a total of 430 vacant parcels containing 856.70 acres. There are a total of 141.1 acres in the parcels listed as in the 100-year floodplain, including: 28.05 acres on 22 unbuildable parcels, 6.34 acres on 3 committed parcels, 63.88 acres on 15 partially vacant/redevelopable parcels (including 49.818 acres on 5 parcels proposed for an industrial/business park; many of the parcels have riparian areas already subtracted from the buildable acreage total), and 42.83 acres on 54 vacant parcels (many of these parcels already have riparian areas subtracted from the buildable acreage total).

In Table I.3, all commercially-zoned land with a final gross buildable acreage figure of less than 0.25 acres has been classified as unbuildable. All industrially-zoned land with a final gross buildable acreage figure of less than 0.5 acres has been classified as unbuildable. The City does not feel that these sites are viable for development.

Table I.3 Inventory of Vacant Parcels by Zoning District

Parcel	Zone 1	Zone 2	TBAC Final Classification	Notes	Total Acres	Un-buildable Acres	Riparian Acres	Pond Acres	Greater than 3,000' acres	Other/ Combined Constraints	Final gross buildable acres	100 year flood-plain acres
3S38.5CC/5200	CB		unbuildable	parking lot	0.118	0.118	0.000	0.000	0.000	0.000	0.000	
3S38.5CC/7200	CB		unbuildable	final buildable acres < 0.25	0.220	0.000	0.000	0.000	0.000	0.000	0.220	
3S38.5CD/8600	GC		committed	committed	0.077	0.077	0.000	0.000	0.000	0.000	0.000	
3S38.5CD/1202	GC		committed	committed	0.121	0.121	0.000	0.000	0.000	0.000	0.000	
3S38.8AC/100	GC		committed	committed; Safeway	6.846	6.846	0.000	0.000	0.000	0.000	0.000	
3S38.9BB/202	GC		committed		2.866	2.866	0.000	0.000	0.000	0.000	0.000	
3S38.9BB/200	GC		committed	committed (storage units) w/ .627 ac unb	1.371	1.371	0.261	0.000	0.000	0.000	0.000	
3S38.4DC/701	GC		committed	committed (La Grande Automotive)	0.921	0.921	0.000	0.000	0.000	0.000	0.000	
3S38.5DD/1001	GC		committed	committed	0.459	0.459	0.000	0.000	0.000	0.000	0.000	
3S38.4DC/500	GC		committed	committed	1.992	1.992	0.000	0.000	0.000	0.000	0.000	
3S38.4/9800	GC		committed	committed (Roberts Ford Expansion)	9.342	9.342	0.000	0.000	0.000	0.000	0.000	
3S38.8DA/500	GC		partial/redevelop	redevelopable	1.284	0.000	0.000	0.000	0.000	0.000	1.284	
3S38.5DD/1000	GC		partial/redevelop	50% vacant; existing house	1.873	0.936	0.000	0.000	0.000	0.000	0.937	
3S38.9CD/101	GC		partial/redevelop	redevelopable	0.489	0.000	0.000	0.000	0.000	0.000	0.489	0.204
3S38.4CC/1200	GC		partial/redevelop	1.79 acres (.75 acre committed); existing house; .302 ac unbuildable (riparian area)	1.922	0.750	0.302	0.000	0.000	0.000	0.870	
3S38.4CA/1600	GC		partial/redevelop	vacant w/ .5 acre redevelopable	3.395	0.000	0.000	0.000	0.000	0.000	3.395	
3S38.4CA/1500	GC		partial/redevelop	50% vacant, 50% redevelopable	3.426	1.714	0.000	0.000	0.000	0.000	1.712	
3S38.6DA/6601	GC		unbuildable	final buildable acres < 0.25	0.114	0.000	0.000	0.000	0.000	0.000	0.114	
3S38.5CD/3800	GC		unbuildable	paved pkg lot	0.218	0.218	0.000	0.000	0.000	0.000	0.000	
3S38.5CA/9900	GC		unbuildable	gravel pkg lot; final buildable acres < 0.25	0.206	0.206	0.000	0.000	0.000	0.000	0.000	
3S38.5CD/2800	GC		unbuildable	final buildable acres < 0.25	0.106	0.000	0.000	0.000	0.000	0.000	0.106	
3S38.5CA/10400	GC		unbuildable	final buildable acres < 0.25	0.166	0.000	0.000	0.000	0.000	0.000	0.166	
3S38.5CD/1400	GC		unbuildable	final buildable acres < 0.25	0.065	0.000	0.000	0.000	0.000	0.000	0.065	
3S38.8BA/100	GC		unbuildable	.146 ac unbuildable (riparian area); final buildable acres < 0.25	0.276	0.000	0.146	0.000	0.000	0.000	0.130	
3S38.8DA/1803	GC		unbuildable	undevelopable (vacant)	0.117	0.117	0.000	0.000	0.000	0.000	0.000	0.115
3S38.8AD/3100	GC		unbuildable	final buildable acres < 0.25	0.127	0.000	0.000	0.000	0.000	0.000	0.127	
3S38.9CD/200	GC		unbuildable	Riparian/other	0.806	0.806	0.245	0.000	0.000	0.000	0.000	0.806
3S38.9CD/202	GC		unbuildable	.065 ac unbuildable (riparian area); final buildable acres < 0.25	0.239	0.000	0.065	0.000	0.000	0.000	0.174	0.239
3S38.5DC/2500	GC		unbuildable	50% committed (house on south half); final buildable acres < 0.25	0.279	0.139	0.000	0.000	0.000	0.000	0.140	
3S38.5DC/501	GC		unbuildable	final buildable acres < 0.25	0.084	0.000	0.000	0.000	0.000	0.000	0.084	
3S38.5DC/400	GC		unbuildable	final buildable acres < 0.25	0.091	0.000	0.000	0.000	0.000	0.000	0.091	
3S38.4CC/1801	GC		unbuildable	committed	0.216	0.216	0.000	0.000	0.000	0.000	0.000	
3S38.4CC/701	GC		unbuildable	.01 ac unbuildable (riparian area); final buildable acres < 0.25	0.092	0.000	0.010	0.000	0.000	0.000	0.082	

Table I.3 Inventory of Vacant Parcels by Zoning Districts

Parcel	Zone 1	Zone 2	TBAC Final Classification	Notes	Total Acres	Un-buildable Acres	Riparian Acres	Pond Acres	Greater than 3,000' acres	Other/ Combined Constraints	Final gross buildable acres	100 year flood-plain acres
3S38.4CA/1700	GC		unbuildable	hotel-gravel truck pkg	1.443	1.443	0.000	0.000	0.000	0.000	0.000	
3S38.4CA/1400	GC		unbuildable	hotel-gravel truck pkg	1.450	1.450	0.000	0.000	0.000	0.000	0.000	
3S38.4AC/700	GC		unbuildable	gravel truck pkg	4.128	4.128	0.000	0.000	0.000	0.000	0.000	
3S38.8AB/2106	GC	M-1	unbuildable	redevelopable; final buildable acres < 0.25	0.174	0.000	0.000	0.000	0.000	0.000	0.174	
3S38.8AB/5501	GC		vacant		0.682	0.000	0.000	0.000	0.000	0.000	0.682	
3S38.8DA/1702	GC		vacant		0.432	0.000	0.000	0.000	0.000	0.000	0.432	0.022
3S38.8AD/2801	GC		vacant		0.253	0.000	0.000	0.000	0.000	0.000	0.253	
3S38.8DA/1200	GC		vacant		2.166	0.000	0.000	0.000	0.000	0.000	2.166	
3S38.8AD/1400	GC		vacant		0.260	0.000	0.000	0.000	0.000	0.000	0.260	
3S38.8AA/3602	GC		vacant		0.941	0.000	0.000	0.000	0.000	0.000	0.941	
3S38.9CD/100	GC		vacant	.128 ac unbuildable (riparian area)	5.344	0.000	0.128	0.000	0.000	0.000	5.216	5.342
3S38.4CD/1200	GC		vacant	.063 ac unbuildable (riparian area)	2.983	0.000	0.063	0.000	0.000	0.000	2.920	
3S38.4DC/700	GC		vacant		3.922	0.000	0.000	0.000	0.000	0.000	3.922	
3S38.4DC/900	GC		vacant		2.893	0.000	0.000	0.000	0.000	0.000	2.893	
3S38.4CC/1400	GC		vacant		1.031	0.000	0.000	0.000	0.000	0.000	1.031	
3S38.4CC/1800	GC		vacant		0.333	0.000	0.000	0.000	0.000	0.000	0.333	
3S38.4CC/700	GC		vacant	.095 ac unbuildable (riparian area)	0.884	0.000	0.095	0.000	0.000	0.000	0.789	
3S38.4CC/601	GC		vacant	.176 ac unbuildable (riparian area)	1.667	0.000	0.176	0.000	0.000	0.000	1.491	
3S38.4DC/800	GC		vacant		1.085	0.000	0.000	0.000	0.000	0.000	1.085	
3S38.9CC/101	GC	R-2	vacant	1.304 ac unbuildable (riparian area)	15.225	0.000	1.304	0.000	0.000	0.000	13.921	12.122
3S38.6DB/11905	GC	R-3	vacant		0.584	0.000	0.000	0.000	0.000	0.000	0.584	
3S38.7BD/900	HD		committed	committed (private/community pool)	0.119	0.119	0.000	0.000	0.000	0.000	0.000	
3S38.18AA/100	HD		partial/redevelop	redevelopable; stables; 1.052 acres undevelopable (power line)	4.727	1.052	0.000	0.000	0.000	0.000	3.675	
3S38.7DC/3500	HD		unbuildable	entire parcel >3000'	0.929	0.929	0.000	0.000	0.926	0.000	0.000	
3S38.7DC/3601	HD		unbuildable	45% slope; >3000'	7.612	7.612	0.000	0.000	7.477	0.000	0.000	
3S38.7/1010	HD		unbuildable	entire parcel >3000'	3.757	0.000	0.000	0.000	3.760	0.000	0.000	
3S38.7DC/3600	HD		unbuildable	unbuildable. 45% slope; >3000'	2.926	2.926	0.000	0.000	2.910	0.000	0.000	
3S38.7/1011	HD		unbuildable	undevelopable (steep and insuf setback); >3000'	2.798	2.798	0.000	0.000	2.629	0.000	0.000	
3S38.7DC/3009	HD		unbuildable	riparian, other	0.272	0.272	0.065	0.000	0.000	0.000	0.000	
3S38.7DC/3002	HD		unbuildable	undevelopable (creek); riparian	0.042	0.042	0.033	0.000	0.000	0.000	0.000	0.041
3S38.7DC/3000b	HD		unbuildable	undevelopable (creek); riparian	0.043	0.043	0.019	0.000	0.000	0.000	0.000	
3S38.7DB/4200	HD		unbuildable	undevelopable (25%+ slope, too small); entire parcel >3000'	0.081	0.081	0.000	0.000	0.084	0.000	0.000	
3S38.7DB/5800	HD		unbuildable	undevelopable (25%+ slope, too small); >3000'	0.140	0.140	0.000	0.000	0.072	0.000	0.000	
3S38.7DB/4200	HD		unbuildable	undevelopable (25%+ slope, too small); entire parcel >3000'	0.278	0.278	0.000	0.000	0.284	0.000	0.000	

Table I.3 Inventory of Vacant Parcels by Zoning Districts

Parcel	Zone 1	Zone 2	TBAC Final Classification	Notes	Total Acres	Un-buildable Acres	Riparian Acres	Pond Acres	Greater than 3,000' acres	Other/ Combined Constraints	Final gross buildable acres	100 year flood-plain acres
3S38.7DB/5700	HD		unbuildable	undevelopable (25%+ slope, too small); riparian; >3000'	0.516	0.516	0.006	0.000	0.485	0.000	0.000	
3S38.7DB/5400	HD		unbuildable	undevelopable (25%+ slope, too small); riparian; >3000'	2.197	2.197	0.108	0.000	1.371	0.000	0.000	
3S38.7/710	HD		unbuildable	undevelopable (25%+ slope, too small); >3000'	8.115	8.115	0.000	0.000	8.046	0.000	0.000	
3S38.18/304	HD		unbuildable	pond; entire parcel >3000'	0.303	0.000	0.000	0.049	0.302	0.000	0.000	
3S38.18AA/500	HD		unbuildable	committed	0.404	0.404	0.000	0.000	0.000	0.000	0.000	
3S38.7BA/200	HD		unbuildable	unbuildable (landlocked)	0.461	0.461	0.000	0.000	0.000	0.000	0.000	
3S38.6B/500	HD		unbuildable	entire parcel >3000'	0.969	0.969	0.000	0.000	0.969	0.000	0.000	
3S38.18/303	HD		vacant	pond; >3000'	9.568	0.000	0.000	0.584	9.524	0.000	0.000	
3S38.7DC/3603	HD		vacant		0.266	0.000	0.000	0.000	0.000	0.000	0.266	
3S38.18/700	HD		vacant	>3000'; 3.46 ac unbuildable (power line & riparian area)	4.917	0.000	0.000	0.000	4.155	3.460	0.000	
3S38.7DC/3602	HD		vacant		0.204	0.000	0.000	0.000	0.000	0.000	0.204	
3S38.7DB/5200	HD		vacant		0.143	0.000	0.000	0.000	0.000	0.000	0.143	
3S38.18AA/600	HD		vacant	.372 acres undevelopable (power line)	1.465	0.372	0.000	0.000	0.000	0.000	1.093	
3S38.7BD/1200	HD		vacant		0.544	0.544	0.000	0.000	0.000	0.000	0.000	
3S38.7BA/1100	HD		vacant		0.214	0.000	0.000	0.000	0.000	0.000	0.214	
3S38.6B/200	HD		vacant	>3000'	5.529	0.000	0.000	0.000	3.628	0.000	1.901	
3S38.6B/1100	HD		vacant		1.094	0.000	0.000	0.000	0.000	0.000	1.094	
3S38.6B/300	HD		vacant	>3000'	0.231	0.000	0.000	0.000	0.137	0.000	0.094	
3S38.17DB/101	HD		vacant		1.022	0.000	0.000	0.000	0.000	0.000	1.022	
3S38.17DB/104	HD		vacant	.883 ac unbuildable (riparian area)	1.963	0.000	0.883	0.000	0.000	0.000	1.080	0.220
3S38.17DB/102	HD		vacant		0.494	0.000	0.000	0.000	0.000	0.000	0.494	
3S38.4CB/600	IC		unbuildable	parking lot	0.299	0.299	0.000	0.000	0.000	0.000	0.000	
3S38.4CB/701	IC		unbuildable	parking lot	0.578	0.578	0.000	0.000	0.000	0.000	0.000	
3S38.4CA/500	IC		unbuildable	parking lot	0.167	0.167	0.000	0.000	0.000	0.000	0.000	
3S38.4CA/1200	IC		unbuildable	parking lot	0.842	0.842	0.000	0.000	0.000	0.000	0.000	
3S38.4BD/2600	IC		unbuildable	parking lot	0.186	0.186	0.000	0.000	0.000	0.000	0.000	
3S38.4BD/2800	IC		unbuildable	parking lot	0.568	0.568	0.000	0.000	0.000	0.000	0.000	
3S38.4CC/200	IC		vacant		0.981	0.000	0.000	0.000	0.000	0.000	0.981	
3S38.5CD/6500	M-1		committed	committed (Miller's Hardware uses for tr	0.387	0.387	0.000	0.000	0.000	0.000	0.000	
3S38.6AD/5000	M-1		committed	committted (City owned)	0.077	0.077	0.000	0.000	0.000	0.000	0.000	
3S38.8AD/700	M-1		committed	committed (possibly redevelopable)	0.541	0.541	0.000	0.000	0.000	0.000	0.000	
3S38.8AA/4400	M-1		committed	committed; .19 ac unbuildable (riparian	0.871	0.871	0.190	0.000	0.000	0.000	0.000	
3S38.8AA/4500	M-1		committed	committed; trucks; riparian	0.647	0.647	0.001	0.000	0.000	0.000	0.000	
3S38.5AD/101	M-1		committed	committed (industrial use)	0.288	0.288	0.000	0.000	0.000	0.000	0.000	
3S38.8AD/1000	M-1		partial/redevelop	redevelopable	0.719	0.000	0.000	0.000	0.000	0.000	0.719	

Table I.3 Inventory of Vacant Parcels by Zoning Districts

Parcel	Zone 1	Zone 2	TBAC Final Classification	Notes	Total Acres	Un-buildable Acres	Riparian Acres	Pond Acres	Greater than 3,000' acres	Other/ Combined Constraints	Final gross buildable acres	100 year flood-plain acres
3S38.5CD/7500	M-1		unbuildable	final buildable acres < 0.5	0.071	0.000	0.000	0.000	0.000	0.000	0.071	
3S38.5CD/7100	M-1		unbuildable	final buildable acres < 0.5	0.149	0.000	0.000	0.000	0.000	0.000	0.149	
3S38.5CD/9000	M-1		unbuildable	undevelopable (railroad)	0.115	0.115	0.000	0.000	0.000	0.000	0.000	
3S38.5CD/9100	M-1		unbuildable	undevelopable (railroad)	0.068	0.068	0.000	0.000	0.000	0.000	0.000	
3S38.5CD/6100	M-1		unbuildable	undevelopable (railroad)	0.186	0.186	0.000	0.000	0.000	0.000	0.000	
2S38.31CD/1101	M-1		unbuildable	redevelopable; .215 ac unbuildable (riparian area); final buildable acres < 0.5	0.522	0.000	0.215	0.000	0.000	0.000	0.307	
3S38.8AD/1001	M-1		unbuildable	redevelopable; final buildable acres < 0.5	0.265	0.000	0.000	0.000	0.000	0.000	0.265	
3S38.9BC/1500	M-1		unbuildable	only redev. w/ adj. prop.	0.050	0.050	0.000	0.000	0.000	0.000	0.000	
3S38.9CB/100	M-1		unbuildable	undevelopable	0.124	0.124	0.000	0.000	0.000	0.000	0.000	
3S38.4BC/1100	M-1		unbuildable	unbuildable (riparian area, other); final buildable acres < 0.5	0.371	0.000	0.335	0.000	0.000	0.000	0.036	
3S38.4BD/2500	M-1		unbuildable	undevelopable (vacant/small)	0.136	0.136	0.000	0.000	0.000	0.000	0.000	
3S38.5AA/2200	M-1		unbuildable	unbuildable (riparian area, other)	0.084	0.084	0.000	0.000	0.000	0.000	0.000	
3S38.8AD/400	M-1		vacant		0.598	0.000	0.000	0.000	0.000	0.000	0.598	
3S38.16AD/400	M-2		committed	committed	1.279	1.279	0.000	0.000	0.000	0.000	0.000	1.280
3S38.16/691	M-2		partial/redevelop	proposed industrial-business park; riparian and landscaping - 25% unbuildable	2.949	0.000	0.737	0.000	0.000	0.000	2.212	2.938
3S38.16/500	M-2		partial/redevelop	proposed industrial-business park; riparian and landscaping - 25% unbuildable	48.962	0.000	12.241	0.000	0.000	0.000	36.721	25.331
3S38.16/600	M-2		partial/redevelop	proposed industrial-business park; riparian and landscaping - 25% unbuildable	14.352	0.000	3.588	0.000	0.000	0.000	10.764	1.431
3S38.16/690	M-2		partial/redevelop	proposed industrial-business park; riparian and landscaping - 25% unbuildable	15.515	0.000	3.879	0.000	0.000	0.000	11.636	15.416
3S38.16/501	M-2		partial/redevelop	redev. 3 ac; 1.310 ac unbuildable (riparian area); proposed industrial-business park; riparian and l	4.715	1.715	1.310	0.000	0.000	0.000	1.690	4.702
3S38.16AD/101	M-2		partial/redevelop	redev. 100%; .07 ac unbuildable (riparian area)	5.170	0.000	0.070	0.000	0.000	0.000	5.100	3.752
3S38.16AD/600	M-2		partial/redevelop	redev. 100%; .231 ac unbuildable (riparian area)	0.149	0.000	0.231	0.000	0.000	0.000	0.000	0.406
3S38.16AD/200	M-2		unbuildable	Riparian/other	1.938	1.938	0.205	0.000	0.000	0.000	0.000	1.938
3S38.16AD/600	M-2		unbuildable	redev. 100%; .231 ac unbuildable (riparian area); final buildable acres < 0.5	0.258	0.000	0.231	0.000	0.000	0.000	0.027	0.406

Table I.3 Inventory of Vacant Parcels by Zoning Districts

Parcel	Zone 1	Zone 2	TBAC Final Classification	Notes	Total Acres	Un-buildable Acres	Riparian Acres	Pond Acres	Greater than 3,000' acres	Other/ Combined Constraints	Final gross buildable acres	100 year flood-plain acres
3S38.16AD/102	M-2		unbuildable	redev. 100%; .006 ac unbuildable (riparian area); final buildable acres < 0.5	0.405	0.000	0.006	0.000	0.000	0.000	0.399	0.769
3S38.16AD/101	M-2		unbuildable	redev. 100%; .07 ac unbuildable (riparian area); final buildable acres < 0.5	0.196	0.000	0.070	0.000	0.000	0.000	0.126	3.752
3S38.16AD/102	M-2		unbuildable	redev 100%; .006 ac unbuildable (riparian area); final buildable acres < 0.5	0.366	0.000	0.006	0.000	0.000	0.000	0.360	0.769
3S38.16AD/500	M-2		unbuildable	riparian, other	1.036	1.036	0.074	0.000	0.000	0.000	0.000	1.511
3S38.16AD/500	M-2		unbuildable	riparian, other	0.506	0.506	0.227	0.000	0.000	0.000	0.000	1.511
3S38.15/900	M-2		unbuildable	committed; riparian	1.983	1.983	0.232	0.000	0.000	0.000	0.000	1.982
3S38.16AD/100	M-2		vacant	12.97 ac. undeveloped w/ 1.389 ac unbuildable (rip	12.257	0.000	1.389	0.000	0.000	0.000	10.868	4.199
3S38.17/1801	R-1		committed	Committed	1.385	1.385	0.000	0.000	0.000	0.000	0.000	
3S38.17BA/100	R-1		committed	committed	2.612	2.612	0.000	0.000	0.000	0.000	0.000	
3S38.17/1600	R-1		partial/redevelop	1 acre committed (rest is vacant); .570 acres undevelopable (power line)	5.729	1.570	0.000	0.000	0.000	0.000	4.159	
3S38.17/1800	R-1		partial/redevelop	17.44 acres (1 acre committed); riparian; 2.719 acres undev (powerline/riparian)	18.106	1.000	0.000	0.000	0.000	2.719	14.387	
3S38.17BA/600	R-1		partial/redevelop	4.76 acres (.5 acre committed, wetlnds); existing house; .053 ac unbuildable (riparian area)	4.845	0.500	0.053	0.000	0.000	0.000	4.292	
3S38.6BA/1290	R-1		partial/redevelop	25% committed	1.221	0.305	0.000	0.000	0.000	0.000	0.916	
3S38.17AA/600	R-1		partial/redevelop	4.77 acres vacant, .48 ac committed; .017 ac unbuildable (riparian area)	5.249	0.480	0.017	0.000	0.000	0.000	4.752	0.135
3S38.17AA/500	R-1		partial/redevelop	5 acres vacant, .48 committed; .947 ac unbuildable (riparian area)	5.378	0.480	0.947	0.000	0.000	0.000	3.951	1.256
3S38.17AA/301	R-1		partial/redevelop	.5 acres committed	1.635	0.500	0.000	0.000	0.000	0.000	1.135	
3S38.17AA/501	R-1		partial/redevelop	100% redevelopable; .484 ac unbuildable (riparian area)	1.179	0.000	0.484	0.000	0.000	0.000	0.695	0.621
3S38.17AA/400	R-1		partial/redevelop	vacant w/ 1.5 acres committed; .543 acres undevelopable (power line and riparian	1.867	1.500	0.000	0.000	0.000	0.543	0.000	0.158
3S38.17/2100	R-1	HD	partial/redevelop	39.83 acres (3.5 acres committed); riparian; pond; .770 ac unbuildable (riparian area)	39.255	3.500	0.770	0.526	0.000	0.000	34.459	
3S38.6/300	R-1		unbuildable	city park; riparian	3.118	3.118	0.183	0.000	0.000	0.000	0.000	
3S38.6BA/1000	R-1		unbuildable	committed	0.072	0.072	0.000	0.000	0.000	0.000	0.000	
3S38.6BA/800	R-1		unbuildable	committed	0.251	0.251	0.000	0.000	0.000	0.000	0.000	
3S38.6BA/900	R-1		unbuildable	committed	0.330	0.330	0.000	0.000	0.000	0.000	0.000	

Table I.3 Inventory of Vacant Parcels by Zoning Districts

Parcel	Zone 1	Zone 2	TBAC Final Classification	Notes	Total Acres	Un-buildable Acres	Riparian Acres	Pond Acres	Greater than 3,000' acres	Other/ Combined Constraints	Final gross buildable acres	100 year flood-plain acres
2S38.31DD/100	R-1		unbuildable	ODOT owned/landlocked	0.262	0.262	0.000	0.000	0.000	0.000	0.000	
2S38.32CC/100	R-1		unbuildable	riparian; ODOT owned/landlocked	13.527	13.527	5.054	0.000	0.000	0.000	0.000	8.887
3S38.17AA/503	R-1		unbuildable	riparian, other	1.304	1.304	0.058	0.000	0.000	0.000	0.000	0.381
3S38.17BA/700	R-1		vacant	.035 ac unbuildable (riparian area)	2.440	0.000	0.035	0.000	0.000	0.000	2.405	
3S38.17BD/602	R-1		vacant		0.279	0.000	0.000	0.000	0.000	0.000	0.279	
3S38.17BD/600	R-1		vacant		5.945	0.000	0.000	0.000	0.000	0.000	5.945	
3S38.6/300	R-1		vacant	.475 ac unbuildable (riparian area)	3.665	0.000	0.475	0.000	0.000	0.000	3.190	
3S38.6B/1102	R-1		vacant		1.318	0.000	0.000	0.000	0.000	0.000	1.318	
3S38.6B/1101	R-1		vacant		1.582	0.000	0.000	0.000	0.000	0.000	1.582	
3S38.6BA/1102	R-1		vacant		0.636	0.000	0.000	0.000	0.000	0.000	0.636	
2S38.32CD/301	R-1		vacant		1.166	0.000	0.000	0.000	0.000	0.000	1.166	0.814
2S38.32CD/304	R-1		vacant		0.329	0.000	0.000	0.000	0.000	0.000	0.329	0.248
3S38.17AC/9800	R-1		vacant		0.264	0.000	0.000	0.000	0.000	0.000	0.264	
3S38.17AC/5100	R-1		vacant		0.409	0.000	0.000	0.000	0.000	0.000	0.409	0.041
3S38.17DB/103	R-1		vacant	.318 ac unbuildable (riparian area)	0.750	0.000	0.318	0.000	0.000	0.000	0.432	0.007
3S38.17AA/200	R-1		vacant		7.917	0.000	0.000	0.000	0.000	0.000	7.917	0.003
3S38.17AA/300	R-1		vacant		1.922	0.000	0.000	0.000	0.000	0.000	1.922	
3S38.17AA/502	R-1		vacant	.427 acres undev (power line/riparian)	3.030	0.000	0.000	0.000	0.000	0.427	2.603	4.248
3S38.17/1900	R-1	HD	vacant	riparian; pond; 2.82 acres unbuildable (roadway and riparian area)	38.925	0.000	0.000	7.828	0.000	2.820	28.277	
3S38.17/2000	R-1	HD	vacant	2.95 ac unbuildable (riparian area); >3000'	37.354	0.000	2.950	0.000	1.331	0.000	33.073	
3S38.6AB/5600	R-2		committed	committed (future park land)	3.228	3.228	0.000	0.000	0.000	0.000	0.000	
3S38.6AB/3301	R-2		committed	committed; riparian	0.374	0.374	0.138	0.000	0.000	0.000	0.000	
3S38.6AA/6400	R-2		committed	committed	0.189	0.189	0.000	0.000	0.000	0.000	0.000	
3S38.5BC/7400	R-2		committed	committed (City owned-snow storage)	0.489	0.489	0.000	0.000	0.000	0.000	0.000	
3S38.5BB/3500	R-2		committed	committed	0.290	0.290	0.000	0.000	0.000	0.000	0.000	
3S38.6AA/9301	R-2		committed	committed	0.125	0.125	0.000	0.000	0.000	0.000	0.000	
2S38.32CC/1000	R-2		Committed	Committed	0.117	0.117	0.000	0.000	0.000	0.000	0.000	
3S38.8DD/1314	R-2		committed	committed	0.202	0.202	0.000	0.000	0.000	0.000	0.000	
3S38.8DD/1800	R-2		committed	committed (Nazarene Church w/ devel ball field on east half); developed (no designation)	6.008	6.008	0.000	0.000	0.000	0.000	0.000	4.970
3S38.8AA/4501	R-2		committed	committed; trucks	0.255	0.255	0.000	0.000	0.000	0.000	0.000	
3S38.8AA/2801	R-2		committed	committed	0.097	0.097	0.000	0.000	0.000	0.000	0.000	
3S38.9CD/501	R-2		committed	committed	2.221	2.221	0.000	0.000	0.000	0.000	0.000	
3S38.9CD/600	R-2		committed	committed	0.512	0.512	0.000	0.000	0.000	0.000	0.000	0.088
3S38.9BB/757	R-2		committed	committed	0.172	0.172	0.000	0.000	0.000	0.000	0.000	
3S38.9BB/754	R-2		committed	committed	0.170	0.170	0.000	0.000	0.000	0.000	0.000	
3S38.9BB/785	R-2		committed	committed	0.175	0.175	0.000	0.000	0.000	0.000	0.000	
3S38.9BA/2100	R-2		committed	committed	0.200	0.200	0.000	0.000	0.000	0.000	0.000	

Table I.3 Inventory of Vacant Parcels by Zoning Districts

Parcel	Zone 1	Zone 2	TBAC Final Classification	Notes	Total Acres	Un-buildable Acres	Riparian Acres	Pond Acres	Greater than 3,000' acres	Other/ Combined Constraints	Final gross buildable acres	100 year flood-plain acres
3S38.5AD/603	R-2		committed	committed (future road)	0.470	0.000	0.000	0.000	0.000	0.000	0.470	
3S38.5AB/1601	R-2		committed	committed	0.276	0.276	0.000	0.000	0.000	0.000	0.000	
3S38.7DD/4009	R-2		partial/redevelop	6.5 acres vacant (rest is undevelopable); pond	4.527	0.000	0.000	0.960	0.000	0.000	3.567	
3S38.7DD/4000	R-2		partial/redevelop	redevelopable (small out buildings)	0.497	0.000	0.000	0.000	0.000	0.000	0.497	
3S38.8CC/3400	R-2		partial/redevelop	50% vacant	3.062	1.531	0.000	0.000	0.000	0.000	1.531	
3S38.6DA/6000	R-2		partial/redevelop	redevelopable	0.188	0.000	0.000	0.000	0.000	0.000	0.188	
3S38.6AD/4800	R-2		partial/redevelop	redevelopable	0.203	0.000	0.000	0.000	0.000	0.000	0.203	
3S38.6DA/400	R-2		partial/redevelop	redevelopable; existing house	0.241	0.000	0.000	0.000	0.000	0.000	0.241	
3S38.6BA/1600	R-2		partial/redevelop	25% committed	2.587	0.647	0.000	0.000	0.000	0.000	1.940	
3S38.6AB/5400	R-2		partial/redevelop	redevelopable	0.307	0.000	0.000	0.000	0.000	0.000	0.307	
3S38.6AB/5300	R-2		partial/redevelop	redevelopable	0.717	0.000	0.000	0.000	0.000	0.000	0.717	
2S38.31DC/3900	R-2		partial/redevelop	redevelopable	0.539	0.000	0.000	0.000	0.000	0.000	0.539	
3S38.6AA/1100	R-2		partial/redevelop	redevelopable	0.183	0.000	0.000	0.000	0.000	0.000	0.183	
2S38.31DD/3500	R-2		partial/redevelop	redevelopable	0.488	0.000	0.000	0.000	0.000	0.000	0.488	
2S38.31DD/500	R-2		partial/redevelop	50% vacant; east half is vacant; riparian; .186 ac unbuildable (riparian area)	0.700	0.350	0.186	0.000	0.000	0.000	0.164	
3S38.6AA/1101	R-2		partial/redevelop	redevelopable	0.186	0.000	0.000	0.000	0.000	0.000	0.186	
3S38.5BD/15500	R-2		partial/redevelop	redevelopable	0.151	0.000	0.000	0.000	0.000	0.000	0.151	
3S38.6AA/3200	R-2		partial/redevelop	50% vacant	0.328	0.164	0.000	0.000	0.000	0.000	0.164	
3S38.5BA/1900	R-2		partial/redevelop	50% vacant	1.480	0.740	0.000	0.000	0.000	0.000	0.740	
3S38.8AA/3300	R-2		partial/redevelop	1.84 acres (.91 vacant); eastern half	1.888	0.978	0.000	0.000	0.000	0.000	0.910	
3S38.9BC/500	R-2		partial/redevelop	redevelopable	2.390	0.000	0.000	0.000	0.000	0.000	2.390	
3S38.8AB/5100	R-2		partial/redevelop	redevelopable	0.201	0.000	0.000	0.000	0.000	0.000	0.201	
3S38.5DB/800	R-2		partial/redevelop	redevelopable	0.412	0.000	0.000	0.000	0.000	0.000	0.412	
3S38.4BC/300	R-2		partial/redevelop	4.75 acres (1 acre committed)	4.935	1.000	0.000	0.000	0.000	0.000	3.935	
3S38.5AB/3800	R-2		partial/redevelop	50% vacant	0.823	0.411	0.000	0.000	0.000	0.000	0.412	
3S38.5AB/3701	R-2		partial/redevelop	2/3 vacant (steel garage built only)	0.463	0.153	0.000	0.000	0.000	0.000	0.310	
3S38.4BB/400	R-2		partial/redevelop	1.65 acres (1 acre vacant)	1.379	0.379	0.000	0.000	0.000	0.000	1.000	
3S38.18/500	R-2		unbuildable	undevelopable (creek); riparian	0.028	0.028	0.026	0.000	0.000	0.000	0.000	0.026
3S38.18/400	R-2		unbuildable	undevelopable (creek; riparian	0.805	0.805	0.184	0.000	0.000	0.000	0.000	0.259
3S38.7DD/6000	R-2		unbuildable	riparian	0.519	0.519	0.010	0.000	0.000	0.000	0.000	0.055
3S38.7DD/6300	R-2		unbuildable	committed	0.070	0.070	0.000	0.000	0.000	0.000	0.000	
3S38.7DD/6200	R-2		unbuildable	committed	0.220	0.220	0.000	0.000	0.000	0.000	0.000	
3S38.7BA/1201	R-2		unbuildable	undevelopable (too steep & no access); riparian	0.084	0.084	0.071	0.000	0.000	0.000	0.000	0.076
3S38.6DC/5512	R-2		unbuildable	undevelopable (too steep & narrow)	0.071	0.071	0.000	0.000	0.000	0.000	0.000	
3S38.6DC/7600	R-2		unbuildable	undevelopable (too steep & no access)	0.247	0.247	0.000	0.000	0.000	0.000	0.000	
3S38.6AD/4502	R-2		unbuildable	committed	0.165	0.165	0.000	0.000	0.000	0.000	0.000	

Table I.3 Inventory of Vacant Parcels by Zoning Districts

Parcel	Zone 1	Zone 2	TBAC Final Classification	Notes	Total Acres	Un-buildable Acres	Riparian Acres	Pond Acres	Greater than 3,000' acres	Other/ Combined Constraints	Final gross buildable acres	100 year flood-plain acres
3S38.6BA/1800	R-2		unbuildable	unbuildable (steep slopes)	1.314	1.314	0.000	0.000	0.000	0.000	0.000	
3S38.6AB/1400	R-2		unbuildable	Riparian areas, other	0.150	0.150	0.020	0.000	0.000	0.000	0.000	
2S38.31CC/100	R-2		unbuildable	undevelopable (GR river); riparian	0.369	0.369	0.368	0.000	0.000	0.000	0.000	0.017
2S38.31CD/100	R-2		unbuildable	undevelopable (GR river); Riparian/other	0.826	0.826	0.829	0.000	0.000	0.000	0.000	
2S38.31CD/101	R-2		unbuildable	unbuildable (river)	0.941	0.941	0.681	0.000	0.000	0.000	0.000	
2S38.31CD/102	R-2		unbuildable	unbuildable (river)	1.271	1.271	0.747	0.000	0.000	0.000	0.000	
2S38.31DD/400	R-2		unbuildable	undevelopable (GR river); riparian	0.512	0.512	0.514	0.000	0.000	0.000	0.000	
2S38.31DD/600	R-2		unbuildable	ODOT owned/river; riparian	1.267	1.267	0.461	0.000	0.000	0.000	0.000	
2S38.32CC/702	R-2		unbuildable	unbuildable (size/shape)	0.165	0.165	0.000	0.000	0.000	0.000	0.000	
2S38.32CC/701	R-2		unbuildable	unbuildable (shape)	0.462	0.462	0.000	0.000	0.000	0.000	0.000	
2S38.32CD/802	R-2		unbuildable	undevelopable (small/setback conflict)	0.224	0.224	0.000	0.000	0.000	0.000	0.000	
3S38.17AA/502	R-2		unbuildable	100' power easement; 1.194 acres undev (power line/riparian)	1.714	1.714	0.000	0.000	0.000	1.194	0.000	4.248
3S38.17AA/400	R-2		unbuildable	100' power easement; riparian; .551 acres undevelopable (power line)	1.076	1.076	0.000	0.000	0.000	0.551	0.000	0.158
3S38.5DB/1003	R-2		unbuildable	committed	0.110	0.110	0.000	0.000	0.000	0.000	0.000	
3S38.5AB/900	R-2		unbuildable	unbuildable (shape)	0.333	0.333	0.000	0.000	0.000	0.000	0.000	
3S38.5AD/414	R-2		unbuildable	undevelopable (can't meet setbacks)	0.164	0.164	0.000	0.000	0.000	0.000	0.000	
3S38.7DC/3002	R-2		vacant	.042 ac unbuildable (riparian area)	0.104	0.000	0.042	0.000	0.000	0.000	0.062	0.041
3S38.7DC/3000	R-2		vacant		0.115	0.000	0.000	0.000	0.000	0.000	0.115	
3S38.7DC/100	R-2		vacant		0.242	0.000	0.000	0.000	0.000	0.000	0.242	
3S38.7DD/5700	R-2		vacant	.114 ac unbuildable (riparian area)	0.339	0.000	0.114	0.000	0.000	0.000	0.225	0.097
3S38.7DA/1801	R-2		vacant		0.127	0.000	0.000	0.000	0.000	0.000	0.127	
3S38.7AD/5100	R-2		vacant	vacant (existing structure outbuilding); northeastern quadrant	1.005	0.000	0.000	0.000	0.000	0.000	1.005	
3S38.7BA/1202	R-2		vacant		1.382	0.000	0.000	0.000	0.000	0.000	1.382	
3S38.7AB/2700	R-2		vacant	.039 ac unbuildable (riparian area)	0.374	0.000	0.039	0.000	0.000	0.000	0.335	0.053
3S38.7AB/2901	R-2		vacant	.063 ac unbuildable (riparian area)	0.227	0.000	0.063	0.000	0.000	0.000	0.164	0.055
3S38.7AB/2701	R-2		vacant		0.030	0.000	0.000	0.000	0.000	0.000	0.030	
3S38.7AB/2600	R-2		vacant		0.234	0.000	0.000	0.000	0.000	0.000	0.234	
3S38.6DC/7700	R-2		vacant		0.113	0.000	0.000	0.000	0.000	0.000	0.113	
3S38.8CC/3501	R-2		vacant		0.198	0.000	0.000	0.000	0.000	0.000	0.198	
3S38.8CC/3000	R-2		vacant		2.004	0.000	0.000	0.000	0.000	0.000	2.004	
3S38.7AD/6000	R-2		vacant		0.229	0.000	0.000	0.000	0.000	0.000	0.229	
3S38.7AD/5801	R-2		vacant		0.080	0.000	0.000	0.000	0.000	0.000	0.080	
3S38.8CC/2600	R-2		vacant	.087 ac unbuildable (riparian area)	8.065	0.000	0.087	0.000	0.000	0.000	7.978	
3S38.8CD/1604	R-2		vacant	.115 ac unbuildable (riparian area)	0.213	0.000	0.115	0.000	0.000	0.000	0.098	
3S38.8CD/1600	R-2		vacant	.145 ac unbuildable (riparian area)	0.220	0.000	0.145	0.000	0.000	0.000	0.075	
3S38.8/202	R-2		vacant	.657 ac unbuildable (riparian area)	4.066	0.000	0.657	0.000	0.000	0.000	3.409	
3S38.6DC/5502	R-2		vacant		0.152	0.000	0.000	0.000	0.000	0.000	0.152	

Table I.3 Inventory of Vacant Parcels by Zoning Districts

Parcel	Zone 1	Zone 2	TBAC Final Classification	Notes	Total Acres	Un-buildable Acres	Riparian Acres	Pond Acres	Greater than 3,000' acres	Other/ Combined Constraints	Final gross buildable acres	100 year flood-plain acres
3S38.6DC/5200	R-2		vacant		0.183	0.000	0.000	0.000	0.000	0.000	0.183	
3S38.6DB/7000	R-2		vacant		0.105	0.000	0.000	0.000	0.000	0.000	0.105	
3S38.6AD/4700	R-2		vacant		0.804	0.000	0.000	0.000	0.000	0.000	0.804	
3S38.6AD/2501	R-2		vacant		0.145	0.000	0.000	0.000	0.000	0.000	0.145	
3S38.6BA/1290	R-2		vacant		0.304	0.000	0.000	0.000	0.000	0.000	0.304	
3S38.6BA/2400	R-2		vacant		0.114	0.000	0.000	0.000	0.000	0.000	0.114	
3S38.6BA/1102	R-2		vacant		0.313	0.000	0.000	0.000	0.000	0.000	0.313	
3S38.6BA/100	R-2		vacant		1.005	0.000	0.000	0.000	0.000	0.000	1.005	
3S38.6AB/5700	R-2		vacant		0.347	0.000	0.000	0.000	0.000	0.000	0.347	
3S38.6AB/3500	R-2		vacant		0.222	0.000	0.000	0.000	0.000	0.000	0.222	
3S38.6AB/3501	R-2		vacant	.215 ac unbuildable (riparian area)	0.245	0.000	0.215	0.000	0.000	0.000	0.030	
2S38.31CD/2004	R-2		vacant	.076 ac unbuildable (riparian area)	0.191	0.000	0.076	0.000	0.000	0.000	0.115	
2S38.31CC/300	R-2		vacant	.697 ac unbuildable (riparian area)	0.902	0.000	0.697	0.000	0.000	0.000	0.205	
2S38.31CC/200	R-2		vacant	.605 ac unbuildable (riparian area)	0.655	0.000	0.605	0.000	0.000	0.000	0.050	
2S38.31CD/424	R-2		vacant	.095 ac unbuildable (riparian area)	0.114	0.000	0.095	0.000	0.000	0.000	0.019	
2S38.31CD/423	R-2		vacant	.09 ac unbuildable (riparian area)	0.119	0.000	0.090	0.000	0.000	0.000	0.029	
2S38.31CD/426	R-2		vacant	.115 ac unbuildable (riparian area)	0.117	0.000	0.115	0.000	0.000	0.000	0.002	
2S38.31CD/427	R-2		vacant	.112 ac unbuildable (riparian area)	0.118	0.000	0.112	0.000	0.000	0.000	0.006	
2S38.31CD/425	R-2		vacant	.106 ac unbuildable (riparian area)	0.116	0.000	0.106	0.000	0.000	0.000	0.010	
2S38.31CD/415	R-2		vacant	.167 ac unbuildable (riparian area)	0.235	0.000	0.167	0.000	0.000	0.000	0.068	
2S38.31CD/1102	R-2		vacant		0.252	0.000	0.000	0.000	0.000	0.000	0.252	
2S38.31CD/1400	R-2		Vacant		0.301	0.000	0.000	0.000	0.000	0.000	0.301	
3S38.6AB/4500	R-2		Vacant		0.140	0.000	0.000	0.000	0.000	0.000	0.140	
3S38.6AB/4600	R-2		vacant		0.170	0.000	0.000	0.000	0.000	0.000	0.170	
3S38.6AB/4800	R-2		vacant		0.102	0.000	0.000	0.000	0.000	0.000	0.102	
3S38.6AA/1500	R-2		vacant		0.464	0.000	0.000	0.000	0.000	0.000	0.464	
3S38.6AB/108	R-2		vacant		0.258	0.000	0.000	0.000	0.000	0.000	0.258	
3S38.5CA/8100	R-2		vacant		0.193	0.000	0.000	0.000	0.000	0.000	0.193	
3S38.5CA/8000	R-2		vacant		0.170	0.000	0.000	0.000	0.000	0.000	0.170	
3S38.5CA/7900	R-2		vacant		0.163	0.000	0.000	0.000	0.000	0.000	0.163	
3S38.5BC/7501	R-2		vacant		0.139	0.000	0.000	0.000	0.000	0.000	0.139	
3S38.5BC/7600	R-2		vacant		0.137	0.000	0.000	0.000	0.000	0.000	0.137	
3S38.5CA/7800	R-2		vacant		0.255	0.000	0.000	0.000	0.000	0.000	0.255	
3S38.5CA/1201	R-2		vacant		0.147	0.000	0.000	0.000	0.000	0.000	0.147	
3S38.5CA/1200	R-2		vacant		0.074	0.000	0.000	0.000	0.000	0.000	0.074	
3S38.5BD/12600	R-2		vacant		0.154	0.000	0.000	0.000	0.000	0.000	0.154	
3S38.5BB/1700	R-2		vacant		0.215	0.000	0.000	0.000	0.000	0.000	0.215	
3S38.6AD/200	R-2		vacant		0.126	0.000	0.000	0.000	0.000	0.000	0.126	
3S38.5BB/2300	R-2		vacant		0.266	0.000	0.000	0.000	0.000	0.000	0.266	
3S38.5BC/1101	R-2		vacant		0.115	0.000	0.000	0.000	0.000	0.000	0.115	
3S38.5BC/1200	R-2		vacant		0.138	0.000	0.000	0.000	0.000	0.000	0.138	

Table I.3 Inventory of Vacant Parcels by Zoning Districts

Parcel	Zone 1	Zone 2	TBAC Final Classification	Notes	Total Acres	Un-buildable Acres	Riparian Acres	Pond Acres	Greater than 3,000' acres	Other/ Combined Constraints	Final gross buildable acres	100 year flood-plain acres
3S38.5BB/111	R-2		vacant		0.128	0.000	0.000	0.000	0.000	0.000	0.128	
3S38.5BB/114	R-2		vacant		0.508	0.000	0.000	0.000	0.000	0.000	0.508	
3S38.5BB/112	R-2		vacant		0.129	0.000	0.000	0.000	0.000	0.000	0.129	
3S38.5BB/109	R-2		vacant		0.131	0.000	0.000	0.000	0.000	0.000	0.131	
3S38.5BA/4700	R-2		vacant		0.283	0.000	0.000	0.000	0.000	0.000	0.283	
3S38.5BA/3700	R-2		vacant		0.905	0.000	0.000	0.000	0.000	0.000	0.905	
3S38.5BA/1501	R-2		vacant		0.195	0.000	0.000	0.000	0.000	0.000	0.195	
3S38.5BA/4103	R-2		vacant		0.316	0.000	0.000	0.000	0.000	0.000	0.316	
3S38.5BA/4200	R-2		vacant		0.411	0.000	0.000	0.000	0.000	0.000	0.411	
3S38.5BA/4102	R-2		vacant		0.335	0.000	0.000	0.000	0.000	0.000	0.335	
3S38.5BB/110	R-2		vacant		0.128	0.000	0.000	0.000	0.000	0.000	0.128	
3S38.5BA/601	R-2		vacant		0.245	0.000	0.000	0.000	0.000	0.000	0.245	
3S38.17AB/9200	R-2		vacant		0.212	0.000	0.000	0.000	0.000	0.000	0.212	
3S38.17AB/11300	R-2		vacant	.101 ac unbuildable (riparian area)	0.200	0.000	0.101	0.000	0.000	0.000	0.099	0.042
3S38.17AB/11800	R-2		vacant		0.201	0.000	0.000	0.000	0.000	0.000	0.201	0.059
3S38.17AB/11700	R-2		vacant		0.210	0.000	0.000	0.000	0.000	0.000	0.210	0.134
3S38.17AB/11600	R-2		vacant		0.208	0.000	0.000	0.000	0.000	0.000	0.208	0.180
3S38.17AB/11500	R-2		vacant	.126 ac unbuildable (riparian area)	0.205	0.000	0.126	0.000	0.000	0.000	0.079	0.141
3S38.17AB/11400	R-2		vacant	.171 ac unbuildable (riparian area)	0.210	0.000	0.171	0.000	0.000	0.000	0.039	0.145
3S38.17AB/5100	R-2		vacant		0.197	0.000	0.000	0.000	0.000	0.000	0.197	
3S38.17AB/3800	R-2		vacant		0.198	0.000	0.000	0.000	0.000	0.000	0.198	
3S38.17AB/4300	R-2		vacant		0.206	0.000	0.000	0.000	0.000	0.000	0.206	0.086
3S38.17AB/4000	R-2		vacant		0.201	0.000	0.000	0.000	0.000	0.000	0.201	0.056
3S38.17AB/3900	R-2		vacant		0.196	0.000	0.000	0.000	0.000	0.000	0.196	0.069
3S38.17AB/4100	R-2		vacant		0.206	0.000	0.000	0.000	0.000	0.000	0.206	
3S38.17AB/4200	R-2		vacant		0.204	0.000	0.000	0.000	0.000	0.000	0.204	0.083
3S38.17AB/9100	R-2		vacant		0.202	0.000	0.000	0.000	0.000	0.000	0.202	
3S38.17AB/11000	R-2		vacant	.189 ac unbuildable (riparian area)	0.208	0.000	0.189	0.000	0.000	0.000	0.019	0.046
3S38.17AB/10200	R-2		vacant		0.201	0.000	0.000	0.000	0.000	0.000	0.201	
3S38.17AB/10300	R-2		vacant		0.203	0.000	0.000	0.000	0.000	0.000	0.203	
3S38.17AB/9300	R-2		vacant		0.206	0.000	0.000	0.000	0.000	0.000	0.206	0.011
3S38.17AB/10100	R-2		vacant		0.201	0.000	0.000	0.000	0.000	0.000	0.201	
3S38.17AB/11100	R-2		vacant	.171 ac unbuildable (riparian area)	0.201	0.000	0.171	0.000	0.000	0.000	0.030	0.009
3S38.17AB/10400	R-2		vacant		0.199	0.000	0.000	0.000	0.000	0.000	0.199	
3S38.17AB/10500	R-2		vacant	.014 ac unbuildable (riparian area)	0.202	0.000	0.014	0.000	0.000	0.000	0.188	
3S38.17AB/10000	R-2		vacant		0.204	0.000	0.000	0.000	0.000	0.000	0.204	
3S38.17AB/9400	R-2		vacant		0.204	0.000	0.000	0.000	0.000	0.000	0.204	0.088
3S38.17AB/9500	R-2		vacant		0.210	0.000	0.000	0.000	0.000	0.000	0.210	0.141
3S38.17AB/10600	R-2		vacant	.165 ac unbuildable (riparian area)	0.189	0.000	0.165	0.000	0.000	0.000	0.024	0.001
3S38.17AB/10900	R-2		vacant	.039 ac unbuildable (riparian area)	0.187	0.000	0.039	0.000	0.000	0.000	0.148	0.169
3S38.17AB/10800	R-2		vacant		0.217	0.000	0.000	0.000	0.000	0.000	0.217	0.046

Table I.3 Inventory of Vacant Parcels by Zoning Districts

Parcel	Zone 1	Zone 2	TBAC Final Classification	Notes	Total Acres	Un-buildable Acres	Riparian Acres	Pond Acres	Greater than 3,000' acres	Other/ Combined Constraints	Final gross buildable acres	100 year flood-plain acres
3S38.17AB/10700	R-2		vacant	.103 ac unbuildable (riparian area)	0.221	0.000	0.103	0.000	0.000	0.000	0.118	0.133
3S38.17AB/9900	R-2		vacant	.034 ac unbuildable (riparian area)	0.190	0.000	0.034	0.000	0.000	0.000	0.156	
3S38.17AB/9600	R-2		vacant		0.192	0.000	0.000	0.000	0.000	0.000	0.192	0.042
3S38.17AB/9700	R-2		vacant	.177 ac unbuildable (riparian area)	0.217	0.000	0.177	0.000	0.000	0.000	0.040	
3S38.17AB/9800	R-2		vacant	.213 ac unbuildable (riparian area)	0.216	0.000	0.213	0.000	0.000	0.000	0.003	0.004
3S38.8DD/1200	R-2		vacant		2.826	0.000	0.000	0.000	0.000	0.000	2.826	1.193
3S38.8DD/1801	R-2		vacant		0.266	0.000	0.000	0.000	0.000	0.000	0.266	0.263
3S38.8DD/1802	R-2		vacant		0.313	0.000	0.000	0.000	0.000	0.000	0.313	0.307
3S38.8DD/700	R-2		vacant	.174 ac unbuildable (riparian area)	0.996	0.000	0.174	0.000	0.000	0.000	0.822	0.996
3S38.8AB/5406	R-2		vacant	.118 ac unbuildable (riparian area)	0.167	0.000	0.118	0.000	0.000	0.000	0.049	
3S38.8AA/3601	R-2		vacant		0.482	0.000	0.000	0.000	0.000	0.000	0.482	
3S38.8AA/3503	R-2		vacant		0.348	0.000	0.000	0.000	0.000	0.000	0.348	
3S38.8AA/3000	R-2		vacant		0.613	0.000	0.000	0.000	0.000	0.000	0.613	
3S38.8AA/3001	R-2		vacant		0.608	0.000	0.000	0.000	0.000	0.000	0.608	
3S38.9/1500	R-2		vacant	.160 ac unbuildable (riparian area)	22.662	0.000	0.160	0.000	0.000	0.000	22.502	0.054
3S38.9/1600	R-2		vacant	3.771 ac unbuildable (riparian area)	30.540	0.000	3.771	0.000	0.000	0.000	26.769	
3S38.9/1500	R-2		vacant	.16 ac unbuildable (riparian area)	15.378	0.000	0.160	0.000	0.000	0.000	15.218	0.054
3S38.9BC/300	R-2		vacant		0.289	0.000	0.000	0.000	0.000	0.000	0.289	
3S38.9BB/726	R-2		vacant		0.183	0.000	0.000	0.000	0.000	0.000	0.183	
3S38.9BC/605	R-2		vacant		0.258	0.000	0.000	0.000	0.000	0.000	0.258	
3S38.9BC/602	R-2		vacant		0.148	0.000	0.000	0.000	0.000	0.000	0.148	
3S38.9BD/3500	R-2		vacant	1.174 ac unbuildable (riparian area)	4.951	0.000	1.174	0.000	0.000	0.000	3.777	
3S38.9BD/3400	R-2		vacant	.380 ac unbuildable (riparian area)	4.915	0.000	0.380	0.000	0.000	0.000	4.535	
3S38.9BA/9501	R-2		vacant	.148 ac unbuildable (riparian area)	0.392	0.000	0.148	0.000	0.000	0.000	0.244	
3S38.9BB/759	R-2		vacant		0.175	0.000	0.000	0.000	0.000	0.000	0.175	
3S38.9BB/758	R-2		vacant		0.173	0.000	0.000	0.000	0.000	0.000	0.173	
3S38.9BB/752	R-2		vacant		0.172	0.000	0.000	0.000	0.000	0.000	0.172	
3S38.9BB/753	R-2		vacant		0.169	0.000	0.000	0.000	0.000	0.000	0.169	
3S38.9BB/762	R-2		vacant		0.181	0.000	0.000	0.000	0.000	0.000	0.181	
3S38.9BB/760	R-2		vacant		0.176	0.000	0.000	0.000	0.000	0.000	0.176	
3S38.9BB/761	R-2		vacant		0.182	0.000	0.000	0.000	0.000	0.000	0.182	
3S38.9BB/751	R-2		vacant		0.173	0.000	0.000	0.000	0.000	0.000	0.173	
3S38.9BB/764	R-2		vacant		0.172	0.000	0.000	0.000	0.000	0.000	0.172	
3S38.9BB/763	R-2		vacant		0.170	0.000	0.000	0.000	0.000	0.000	0.170	
3S38.9BB/765	R-2		vacant		0.179	0.000	0.000	0.000	0.000	0.000	0.179	
3S38.9BD/100	R-2		vacant		8.844	0.000	0.000	0.000	0.000	0.000	8.844	
3S38.9BA/4300	R-2		vacant		0.151	0.000	0.000	0.000	0.000	0.000	0.151	
3S38.9BA/11700	R-2		vacant		7.009	0.000	0.000	0.000	0.000	0.000	7.009	
3S38.9AC/4200	R-2		vacant	.238 ac unbuildable (riparian area)	3.642	0.000	0.238	0.000	0.000	0.000	3.404	
3S38.9AC/8400	R-2		vacant	2.084 ac unbuildable (riparian area)	27.564	0.000	2.084	0.000	0.000	0.000	25.480	
3S38.9AC/4200	R-2		vacant	.238 ac unbuildable (riparian area)	2.856	0.000	0.238	0.000	0.000	0.000	2.618	

Table I.3 Inventory of Vacant Parcels by Zoning Districts

Parcel	Zone 1	Zone 2	TBAC Final Classification	Notes	Total Acres	Un-buildable Acres	Riparian Acres	Pond Acres	Greater than 3,000' acres	Other/ Combined Constraints	Final gross buildable acres	100 year flood-plain acres
3S38.9AB/800	R-2		vacant		5.573	0.000	0.000	0.000	0.000	0.000	5.573	
3S38.9BA/3900	R-2		vacant		3.518	0.000	0.000	0.000	0.000	0.000	3.518	
3S38.5AC/6002	R-2		vacant		0.247	0.000	0.000	0.000	0.000	0.000	0.247	
3S38.5AC/6000	R-2		vacant		0.355	0.000	0.000	0.000	0.000	0.000	0.355	
3S38.5AD/800	R-2		vacant		0.998	0.000	0.000	0.000	0.000	0.000	0.998	
3S38.4BC/1500	R-2		vacant	.147 ac unbuildable (riparian area)	1.074	0.000	0.147	0.000	0.000	0.000	0.927	
3S38.4BC/1200	R-2		vacant	.14 ac unbuildable (riparian area)	1.158	0.000	0.140	0.000	0.000	0.000	1.018	
3S38.5AB/3703	R-2		vacant		0.121	0.000	0.000	0.000	0.000	0.000	0.121	
3S38.5AB/4300	R-2		vacant		0.576	0.000	0.000	0.000	0.000	0.000	0.576	
3S38.5AC/100	R-2		vacant		0.213	0.000	0.000	0.000	0.000	0.000	0.213	
3S38.5AB/4400	R-2		vacant		0.418	0.000	0.000	0.000	0.000	0.000	0.418	
3S38.4DC/200	R-3		committed	committed; subdividing	7.592	7.592	0.000	0.000	0.000	0.000	0.000	
3S38.8DB/1200	R-3		committed	west 1.6 ac committed (rest developed)	1.800	1.590	0.000	0.000	0.000	0.000	0.210	
3S38.6DB/3700	R-3		partial/redevelop	redevelopable	0.189	0.000	0.000	0.000	0.000	0.000	0.189	
3S38.8DA/3100	R-3		partial/redevelop	redevelopable; drive-in; 1.356 ac unbuildable (riparian area)	6.264	0.000	1.356	0.000	0.000	0.000	4.908	6.264
3S38.8DA/1000	R-3		partial/redevelop	.36 ac committed (dev. limited by creek); .526 ac unbuildable (riparian area)	1.017	0.360	0.526	0.000	0.000	0.000	0.131	0.872
3S38.8DA/2601	R-3		partial/redevelop	redevelopable; .121 ac unbuildable (riparian area)	0.470	0.000	0.121	0.000	0.000	0.000	0.349	0.391
3S38.8DC/900	R-3		unbuildable	100' power easement; power lines (only 55' width outside of easement)	2.410	2.410	0.000	0.000	0.000	0.000	0.000	
3S38.8AD/3203	R-3		unbuildable	undevelopable (vacant)	0.100	0.100	0.000	0.000	0.000	0.000	0.000	0.100
3S38.6DB/2602	R-3		vacant		0.301	0.000	0.000	0.000	0.000	0.000	0.301	
3S38.8DB/1404	R-3		vacant		3.063	0.000	0.000	0.000	0.000	0.000	3.063	
3S38.8DB/1406	R-3		vacant		0.288	0.000	0.000	0.000	0.000	0.000	0.288	
3S38.8DB/1405	R-3		vacant		0.280	0.000	0.000	0.000	0.000	0.000	0.280	
3S38.8DA/2900	R-3		vacant	vacant (w/barn-redevelopable)	3.441	0.000	0.000	0.000	0.000	0.000	3.441	2.482
3S38.8DA/2400	R-3		vacant	.01 ac unbuildable (riparian area)	1.461	0.000	0.010	0.000	0.000	0.000	1.451	1.291
3S38.8DD/501	R-3		vacant	.19 ac unbuildable (riparian area)	0.630	0.000	0.190	0.000	0.000	0.000	0.440	0.095
3S38.8DD/500	R-3		vacant	.976 ac unbuildable (riparian area)	3.250	0.000	0.976	0.000	0.000	0.000	2.274	1.232
3S38.8DD/300	R-3		vacant		0.230	0.000	0.000	0.000	0.000	0.000	0.230	0.140
3S38.8DD/100	R-3		vacant	1.259 ac unbuildable (riparian area)	2.764	0.000	1.259	0.000	0.000	0.000	1.505	2.766
3S38.8AC/2700	R-3		vacant		0.361	0.000	0.000	0.000	0.000	0.000	0.361	0.362
3S38.8DB/501	R-3		vacant		0.669	0.000	0.000	0.000	0.000	0.000	0.669	
3S38.8DB/1000	R-3		vacant		0.837	0.000	0.000	0.000	0.000	0.000	0.837	
3S38.8DB/1100	R-3		vacant		0.621	0.000	0.000	0.000	0.000	0.000	0.621	
3S38.8AC/9000	R-3		vacant		0.204	0.000	0.000	0.000	0.000	0.000	0.204	
3S38.8DA/2701	R-3		vacant	.332 ac unbuildable (riparian area)	1.285	0.000	0.332	0.000	0.000	0.000	0.953	0.701

Table I.3 Inventory of Vacant Parcels by Zoning Districts

Parcel	Zone 1	Zone 2	TBAC Final Classification	Notes	Total Acres	Un-buildable Acres	Riparian Acres	Pond Acres	Greater than 3,000' acres	Other/ Combined Constraints	Final gross buildable acres	100 year flood-plain acres
3S38.8DA/2702	R-3		vacant	.047 ac unbuildable (riparian area)	0.076	0.000	0.047	0.000	0.000	0.000	0.029	0.064
3S38.8DA/2402	R-3		vacant	.315 ac unbuildable (riparian area)	1.462	0.000	0.315	0.000	0.000	0.000	1.147	1.313
3S38.8DA/1802	R-3		vacant		0.294	0.000	0.000	0.000	0.000	0.000	0.294	0.065
3S38.4DC/400	R-3		vacant		4.922	0.000	0.000	0.000	0.000	0.000	4.922	
3S38.4DC/100	R-3		vacant	subdividing	0.460	0.000	0.000	0.000	0.000	0.000	0.460	
3S38.4DC/300	R-3		vacant		5.020	0.000	0.000	0.000	0.000	0.000	5.020	
3S38.7DA/5600	R-P		partial/redevelop	50% vacant; western half; riparian	1.288	0.644	0.040	0.000	0.000	0.000	0.604	
3S38.6DD/7600	R-P		vacant		0.232	0.000	0.000	0.000	0.000	0.000	0.232	
3S38.17CA/201	RR-1		partial/redevelop	6.92 acre lot (1 acre committed)	6.600	1.000	0.000	0.000	0.000	0.000	5.600	
3S38.17BD/800	RR-1		partial/redevelop	50% committed; pond	4.214	2.107	0.000	0.008	0.000	0.000	2.099	
3S38.16/900	RR-1		partial/redevelop	6.28 acres vacant (rest is committed); 1.398 ac unbuildable (riparian area)	12.482	6.202	1.398	0.000	0.000	0.000	4.882	
3S38.18/400	RR-1		vacant	.851 acres undevelopable (power line and riparian	2.557	0.000	0.000	0.000	0.000	0.851	1.706	0.259
3S38.17/1700	RR-1		vacant	riparian; pond; >3000'; 1.339 acres undev (power line/riparian)	36.453	0.000	0.000	0.262	14.582	1.339	20.270	
3S38.17CA/202	RR-1		vacant	>3000'	1.165	0.000	0.000	0.000	0.469	0.000	0.696	
TOTALS					**856.70**	**170.04**	**65.27**	**10.22**	**63.14**	**13.90**	**575.68**	**141.10**

Source: The Benkendorf Associates Corp., 2001 from data provided by the City of La Grande (December 2000) and updated by the City of La Grande (March and May 2001).

Table I.4 below shows a summary of the data in Table I.3 by zoning district. As described previously, all commercially-zoned land with a final gross buildable land figure of less than 0.25 acres and all industrially-zoned land with a final gross buildable land figure of less than 0.5 acres have been classified as unbuildable. Since these sites are classified as unbuildable, the buildable acreage is treated as zero. In Table I.4 below, only sites classified as "vacant" and "partially vacant/redevelopable" contribute to the buildable acreage total.

Table I.4 Summary of Vacant Parcels within UGB by Zoning District

	Total			Vacant			Partially Vacant/Redevelopable			Committed		Unbuildable	
Primary Zone	Parcels	Total Acres	Buildable Acres	Parcels	Total Acres	Buildable Acres	Parcels	Total Acres	Buildable Acres	Parcels	Total Acres	Parcels	Total Acres
CB	2	0.34	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	2	0.34
GC	52	87.47	47.61	17	40.69	38.92	6	12.39	8.69	9	24.00	20	10.40
IC	7	3.62	0.98	1	0.98	0.98	0	0.00	0.00	0	0.00	6	2.64
M-1	20	6.27	1.32	1	0.60	0.60	1	0.72	0.72	6	2.81	12	2.14
M-2	17	112.04	78.99	1	12.26	10.87	7	91.81	68.12	1	1.28	8	6.69
HD	34	64.34	11.28	14	27.65	7.61	1	4.73	3.68	1	0.12	18	31.84
R-1	36	215.26	160.49	17	107.93	91.75	10	84.46	68.75	2	4.00	7	18.86
R-2	224	250.62	200.47	155	193.06	179.09	25	28.88	21.38	19	15.57	25	13.11
R-3	30	51.76	34.37	22	31.92	28.79	4	7.94	5.58	2	9.39	2	2.51
R-P	2	1.52	0.84	1	0.23	0.23	1	1.29	0.60	0	0.00	0	0.00
RR-1	6	63.47	35.25	3	40.18	22.67	3	23.30	12.58	0	0.00	0	0.00
Totals	**430**	**856.70**	**571.59**	**232**	**455.50**	**381.50**	**58**	**255.51**	**190.09**	**40**	**57.16**	**100**	**88.53**

Source: The Benkendorf Associates Corp., 2001.
Note: figures may not add due to rounding.

Table I.5 below shows the inventory for total parcels, vacant parcels and gross buildable land within the La Grande UGB.

Table I.5 Inventory of Vacant and Developed Land in the City of La Grande UGB

		Total Parcels			Vacant Parcels				
Zone		**Total Acres**	**Total Parcels**	**Total Acres in Parcels**	**Acres**	**Parcels**	**Unbuild -able Acreage**	**Buildable Acreage**	**Buildable Parcels**
Non-Residential									
Commercial									
General Commercial	GC	390.6	537	324.5	87.5	52	39.9	47.6	23
Central Business	CB	35.0	113	19.4	0.3	2	0.3	0.0	0
Interchange Commercial	IC	29.5	35	26.8	3.6	7	2.6	1.0	1
Total Commercial		**455.0**	**685**	**370.7**	**91.4**	**61**	**42.8**	**48.6**	**24**
Industrial									
Light Industrial	M-1	191.8	106	69.0	6.3	20	5.0	1.3	2
Heavy Industrial	M-2	210.6	29	211.9	112.0	17	33.0	79.0	8
Total Industrial		**402.4**	**135**	**281.0**	**118.3**	**37**	**38.0**	**80.3**	**10**
Total Non-Residential		**857.4**	**820**	**651.7**	**209.7**	**98**	**80.8**	**128.9**	**34**
Residential									
Hillside Development Residential	HD	160.7	115	150.6	64.3	34	53.1	11.3	15
Rural Residential	RR-1	90.3	15	99.9	63.5	6	28.2	35.3	6
Low Density Residential	R-1	316.8	173	324.1	215.3	36	54.8	160.5	27
Medium Density Residential	R-2	1,322.4	3,173	1,159.4	250.6	224	50.2	200.5	180
High Density Residential	R-3	302.7	548	239.9	51.8	30	17.4	34.4	26
Residential-Professional	R-P	64.9	155	53.1	1.5	2	0.7	0.8	2
Total Residential		**2,257.9**	**4,179**	**2,026.9**	**647.0**	**332**	**204.3**	**442.7**	**256**
TOTAL		**3,115.3**	**4,999**	**2,678.6**	**856.7**	**430**	**285.1**	**571.6**	**290**

Source: The Benkendorf Associates Corp., 2001.
Note: figures may not add due to rounding.

B. Net buildable acres by zoning district

Net buildable vacant acres are calculated by subtracting land needed for future public facilities from gross buildable vacant acres. For the purpose of this analysis, land needed for future facilities is defined as 25% of all non-public vacant land.

The calculations for subtracting 25% from gross buildable acres to convert to net buildable acres are shown in Table I.6 below.

Table I.6 Inventory of Net Buildable Land by Zoning District

Zone		Buildable Parcels	Gross Buildable Acreage	Net Buildable Acreage
Non-Residential				
Commercial				
General Commercial	GC	23	47.6	35.7
Central Business	CB	0	0.0	0.0
Interchange Commercial	IC	1	1.0	0.7
Total Commercial		**24**	**48.6**	**36.4**
Industrial				
Light Industrial	M-1	2	1.3	1.0
Heavy Industrial	M-2	8	79.0	59.2
Total Industrial		**10**	**80.3**	**60.2**
Total Non-Residential		**34**	**128.9**	**96.7**
Residential				
Hillside Development Residential	HD	15	11.3	8.5
Rural Residential	RR-1	6	35.3	26.4
Low Density Residential	R-1	27	160.5	120.4
Medium Density Residential	R-2	180	200.5	150.3
High Density Residential	R-3	26	34.4	25.8
Residential-Professional	R-P	2	0.8	0.6
Total Residential		**256**	**442.7**	**332.0**
TOTAL		**290**	**571.6**	**428.7**

Source: The Benkendorf Associates Corp., 2001.
Note: figures may not add due to rounding

As shown in Table 1-6 above, there are 96.7 acres of net buildable non-residential land and 332.0 acres of net buildable residential land for a total of 428.7 acres of net buildable land on 290 parcels within the UGB of the City of La Grande.

II. Actual Density and Mix of Housing

A. Residential mix - City of La Grande

Table II.1 below shows the housing units built and demolished in La Grande from 1990 to 2000.

Table II.1
Total Number of Housing Units, 1990 – 2000

Type of Housing	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Total 1990-2000
Single-family	6	4	16	20	28	14	20	19	13	10	16	**166**
Multi-family	4	2	2	4	14	0	35	27	2	2	0	**92**
Manufactured homes (1)	6	17	23	20	24	27	50	44	33	28	18	**290**
Less demolition	3	2	2	1	4	2	0	2	7	4	6	**33**
Total	**13**	**21**	**39**	**43**	**62**	**39**	**105**	**88**	**41**	**36**	**28**	**515**

Notes: (1) includes manufactured homes in parks and manufactured homes on single-family lots. The total number of mobile homes within the City as of June 30, 2000 is 340. The total number of residents living in group facilities as of June 30, 2000 is 680.

Table II.2 indicates the number and percentage of housing units by type for the housing stock in the City of La Grande as a whole. Single-family units include manufactured homes on individual lots and single-family attached units.

As shown in Table II.2, there are an estimated total of 5,427 housing units in the La Grande City limits as of December 1999.

Table II.2 Residential Housing Types in the City of La Grande

	1990 Housing Mix[(2)]	1990 Housing Mix %	New Housing (from 1990-2000)[(3)]	New Housing %	Current Housing Mix (2000)[(4)]	Current Housing Mix %
Single-family (detached and attached)[(1)]	3,165	64.4%	400	77.7%	3,565	65.7%
Multi-family	1,387	28.2%	81	15.7%	1,468	27.0%
Manufactured homes	306	6.2%	34	6.6%	340	6.3%
Other	54	1.1%	0	0.0%	54	1.0%
Total	**4,912**	**100.0%**	**515**	**100.0%**	**5,427**	**100.0%**

Notes: Manufactured home totals are for those in parks.

(1) City of La Grande does not distinguish between single-family detached and single-family attached in its data;

(2) 1990 U.S. Census

(3) Data tabulated by the City of La Grande as shown in Table II.1. Includes 35 demolitions from 1990 to 2000 (assumes 11 each for manufactured home, single-family and multi-family units; also assumes that 245 manufactured home units shown in Table II.1 are on single-family lots and counted as single-family units in this table).

(4) Sum of 1990 U.S. Census data and (3) above.

As shown in Table II.2, single-family units represent a greater share of the development that has occurred in the last ten years in La Grande compared to the 1990 overall housing type mix. In 1990 single-family housing represented 64.4 percent of the housing mix, with multi-family units and manufactured homes representing 28.2 percent and 6.2

percent, respectively. Of the housing built from 1990 to 2000, however, 77.7 percent were single-family homes (including manufactured homes built on single-family lots), while multi-family units and manufactured homes represented 15.7 percent and 6.6 percent of the new housing mix, respectively. In 2000, single-family units represent 65.7 percent of the total housing mix, with multi-family units and manufactured homes at 27.0 percent and 6.3 percent, respectively.

B. Residential density - City of La Grande

In order to determine the existing residential density in the City of La Grande, an inventory of all parcels in the Assessor's parcel database (provided by the City of La Grande and cross-referenced to the City of La Grande parcel database) that met the following criteria was made:

1. In the City of La Grande UGB and in a City of La Grande residential zone: R-1, R-2, R-3, R-P, RR-1, or HD Zone;

2. Listed as in residential use (SFD, SFA-1, MFA, or MHP) in the Assessor's parcel database, and not listed in the vacant parcel list (see Table I.3); and

3. Improved value listed as greater than zero in the Assessor's parcel database.

Residential units in zones other than those listed above were not considered for the purposes of this calculation. This is because the calculation is intended to provide direction for determining projected development densities in City of La Grande residential zones in the next 20 years. Residential density (in dwelling units per acre) was calculated using the following methodology:

- Average density: total dwelling units divided by total acreage;

- Median density: the median of the individual densities (dwelling units on the lot divided by lot size) for each developed lot, weighted by dwelling units;

- Average density totals: average density: total dwelling units divided by total acreage;

- Median density totals for each housing type: average of median densities for each component, weighted by dwelling units.

The *median density* figures shown in Table II.3 and II.4 below are a much more accurate representation of overall development density in La Grande than the *average density* figures. This is because the average density figures can be unduly swayed by extremely large or small lots. For example, in Table II.3, the average density of the 121 developed lots zoned R-1 is distorted by 14 lots larger than 1 acre (2.66, 2.46, 2.49, 2.38, 2.73, 2.86, 1.23, 1.02, 1.17, 2.07, 4.25, 1.95, 2.36, and 1.70 acres). These existing large lots do not provide an accurate picture of what lot sizes current R-1 zoning provides for. The R-1 Zone (Low Density Residential) is intended to implement the Comprehensive Plan designation of a low density residential land use of a density between 4 and 6 dwelling units per acre. The median density of 5.7 units per acre for existing lots reflects this more accurately.

As another example, the R-2 Zone is intended to develop at densities of 5 to 10 dwelling units per acre. The average density of existing development is well below this (at 4.05 units per acre. This is again due to a number of existing large lots that would not be allowed under current zoning.

Table II.3 Existing Residential Development Density
City of La Grande Residential Zones

	Total Acreage	Developed Lots	Dwelling Units (DU)	Average Density (DU/acre)	Median Density (DU/acre)
Single-Family Detached (SFD)					
R-1 Zone	67.7	121	121	1.79	3.7
R-2 Zone	579.0	2,501	2,501	4.32	5.6
R-3 Zone	89.6	430	430	4.80	6.6
R-P Zone	16.7	94	94	5.61	6.7
RR-1 Zone	5.1	6	6	1.18	1.1
HD Zone	32.0	52	52	1.62	2.9
Total single-family detached	**790.2**	**3,204**	**3,204**	**4.05**	**5.7**
Single-Family Attached (SFA-1)					
R-2 Zone	27.5	126	252	9.16	11.0
R-3 Zone	2.9	19	38	12.90	13.9
R-P Zone	0.8	6	12	14.23	18.2
Total single-family attached	**31.3**	**151**	**302**	**9.65**	**11.7**
Multi-Family (MFA)					
R-2, R-3 and R-P zones	26.3	27	385	14.64	12.9
Manufactured Home Park (MHP)					
R-2 and R-3 zones	43.8	8	385	8.79	9.0
TOTAL	**891.6**	**3,390**	**4,276**	**4.80**	**6.0**

Source: The Benkendorf Associates Corp., 2001 from Assessor's parcel database provided by the City of La Grande.

As shown in Table II.3 above, the median density of existing single-family detached units in La Grande is 5.7 dwelling units per acre. Single-family attached units have a median density of 11.7 dwelling units per acre. Multi-family units have a median density of 12.9 dwelling units per acre and manufactured homes in parks have a median density of 9.0 dwelling units per acre. The overall median density in La Grande for all dwelling units in residential zones is 6.0 dwelling units per acre (weighted average of the median densities of single-family, multi-family, and manufactured home park units).

Table II.4 below shows residential development densities for recent development (1990-2000). This data was compiled for all single-family residential (detached or attached) parcels for which the "building year" field in the Assessor's parcel database was listed as 1990 or later. There were not sufficient multi-family units or manufactured home parks listed in the Assessor's parcel database as built in 1990 or later in residential zones to provide recent density figures for these units.

Table II.4 Residential Development Density for Recent (1990-2000) Development City of La Grande Residential Zones

	Total Acreage	Developed Lots	Dwelling Units (DU)	Average Density (DU/acre)	Median Density (DU/acre)
Single-family (SFD)					
R-1 Zone	9.8	25	25	2.56	4.6
R-2 Zone	50.1	195	195	3.90	5.1
R-3 Zone	1.3	6	6	4.70	4.5
R-P Zone	0.6	2	2	3.47	3.9
RR-1 Zone	1.0	1	1	1.04	1.0
HD Zone	4.1	6	6	1.45	1.8
Total	**66.8**	**235**	**235**	**3.52**	**4.9**
Single-family attached (SFA-1)					
R-2 Zone	1.3	6	12	9.58	10.0

Source: The Benkendorf Associates Corp., 2001 from Assessor's parcel database provided by the City of La Grande.

As shown in Table II.4 above, densities for single family detached and attached development for the last ten years are slightly below the densities for all existing development shown in Table II.3.

The objective of this section is to determine the amount of residential land needed in the City of La Grande for each needed housing type for the next 20 years.

The following analysis uses a methodology suggested by *Planning for Residential Growth: A Workbook for Oregon's Urban Areas* produced by the Transportation and Growth Management Program (TGM). The steps used in this methodology have been followed to the greatest extent possible, given the data available for the City of La Grande. Since the City of La Grande is a small City, much of the data which is available for larger urban areas, such as Public Use Microdata Samples (PUMS) from the 1990 U.S. Census and detailed historical data from 1970 and 1980 U.S. Census is not available. Consequently, not all of the suggested analysis steps in the Workbook have been conducted.

A. New housing units needed in the next 20 years.

1. Existing population and historical growth

The Center for Population Research and Census is located in the School of Urban and Public Affairs at Portland State University. Its primary responsibility is to produce the official population estimates for Oregon's counties and incorporated cities. The most recent population estimates were released on December 13, 2000, for counties and cities in Oregon as of July 1, 2000, (these figures have been subsequently revised upwards for the City of La Grande and Union County by 460 people). As shown in Table III.1, PSU estimated the City of La Grande's population at 13,015, or 52.1 percent of the total Union County population of 24,960. As shown in Table III.1

below, the City estimates the population of the La Grande UGB at 14,015, or 56.1 percent of the total Union County population (based on an Urban Area population outside of City limits of 1,000).

U.S. Census figures for 2000 were released near the end of this study. They are not being used in this study because the City has evidence of an undercount and will be working through the Census Count Question Resolution (CQR) process to correct the problem. Block-level data will not be available until some time between June and September of 2001 for the City to review and find undercounts. The process could take several months to resolve after that.

The 2000 Census showed a population of 12,327 in La Grande and 24,530 in Union County as of April, 2000, (compared to 13,015 and 24,960, respectively, shown in Table III.1 below).

2. Population projections

The following section summarizes population projections that have been made for La Grande and Union County. The Office of Economic Analysis (OEA) of the Oregon Department of Administrative Services is the main forecasting body for the State of Oregon. The latest Long Term Employment and Population Forecasts were released in January 1997. The forecast shows a Union County population projection of 26,971 in 2020.

Population estimates and projections for 1990, 2000, and 2020 are shown in Table III.1 below.

Table III.1 Population Estimates and Projections 1990-2020

	1990[(1)]	**2000[(2)]**	**2020[(3)]**
Union County	23,598	24,960	26,971
La Grande UGB	-	14,015	-
City of La Grande	11,763	13,015	-

Notes: [(1)] 1990 U.S. Census for City and County
[(2)] State-certified population estimate - PSU (for July, 2000); and City of La Grande estimate for UGB
[(3)] 1997 Oregon Office of Economic Analysis (OEA) projection

Sources: 1990 U.S. Census
Center for Population Research and Census, Portland State University
Oregon Office of Economic Analysis (OEA)
City of La Grande

The growth rates implied by these estimates and projections are shown below. Table III.2 below shows the annual average growth rate (AAGR) for the population estimates and projections for Union County and the City of La Grande.

**Table III.2 Annual Average Growth Rate (AAGR)
for Population Estimates and Projections 1990-2020**

	1990 Census – 2000 PSU Estimate	2000 PSU Estimate – 2020 OEA Projection
Union County	0.56%	0.39%
La Grande UGB	-	-
City of La Grande	1.02%	-

As shown in Table III.2, the annual average growth rate (AAGR) implied by the PSU population estimate for Union County in 2000 and the OEA forecast for 2020 is 0.39 percent. PSU estimates show an AAGR of 0.56 percent for Union County and 1.02 percent for the incorporated area of La Grande from 1990 to 2000.

3. Scenarios

The projection information from the above analysis is integrated into Table III.3 below. Two population projections are presented.

Scenario A is based on the official population estimates and projections from PSU and OEA. The population projection for the La Grande Urban Area is based on maintaining the same percentage of the total County population within the UGB as is estimated for 2000. Because of the findings of the 2000 U.S. Census, which showed that La Grande grew at an annual rate of only 0.49 percent during the 1990s, it appears that Scenario A is a closer indication of recent growth. While the City intends to plan for growth in accordance with the findings of Scenario A, the City intends to implement Scenario B in the future upon completion of further research, analysis and coordination with DLCD and OEA.

Scenario B is based on a higher growth rate for Union County and La Grande that will be proposed to the State of Oregon by Union County and the City of La Grande. This scenario assumes a 1 percent AAGR for Union County for the next 20 years and maintaining the same percentage of the total county population within the UGB as is estimated for 2000.

Scenario B is further justified by planned growth at Eastern Oregon University. Enrollment is projected to increase to 4,250 in twenty (20) years from the current enrollment of 2,000. While 83 percent of students currently reside on campus, this percentage is expected to decline as enrollment increases, since sufficient housing facilities will not be available. A total of fifty (50) faculty members, administrative and operational support staff are expected to be added in Phase I of the expansion, with another fifty (50) faculty members and administrative staff in Phase II.

This planned growth at Eastern Oregon University would have not only direct impacts to La Grande, but also would potentially generate indirect impacts because of spin-off ventures in the private sector that would be supported. These include research and development and bio-technology ventures that could take advantage of the trained workforce and university research efforts. Because of the private sector

growth that it supports, growth at Eastern Oregon University can be assumed to generate additional employment and household growth beyond its direct impacts.

As shown in Figures III.3a and III.3b below, the growth rate for the La Grande urban area for 2000-2020 is 0.39 percent in Scenario A and 1.00 percent in Scenario B. Scenario A projects a population growth of 1,129 for the La Grande Urban Area, while Scenario B projects a population growth of 3,086 for the 2000-2020 period.

Table III.3a Scenario A - Population Projection 2000-2020

	Current Population (July, 2000)[1]	Projected Population (2020) - OEA[2]	Projected Growth 2000-2020	% Increase	Annual Average Growth Rate (AAGR)
Union County	24,960	26,971	2,011	8.1%	0.39%
La Grande UGB	14,015	15,144	1,129	8.1%	0.39%

Notes:
[1] 2000 La Grande UGB population based on PSU estimated for the incorporated area + a population of 1,000 estimated by the City of La Grande as within the Urban Area and outside of City limits.
[2] 2020 Projected UGB population based on 56.15% share of total County population.

Table III.3b Scenario B - Population Projection 2000-2020

	Current Population (July, 2000)[1]	Projected Population (2020) - OEA[2]	Projected Growth 2000-2020	% Increase	Annual Average Growth Rate (AAGR)
Union County	24,960	30,456	5,496	22.0%	1.00%
La Grande UGB	14,015	17,101	3,086	22.0%	1.00%

Notes:
[1] 2000 La Grande UGB population based on PSU estimated for the incorporated area + a population of 1,000 estimated by the City of La Grande as within the Urban Area and outside of City limits.
[2] 2020 Projected UGB population based on 56.15% share of total County population.

4. Household Projection

The average household size for new households in La Grande in the next 20 years has been estimated at 2.20 persons/household, based on an existing Citywide figure of 2.25 used by PSU. In general, average household size across the state is decreasing gradually and is projected to continue. In 1990, the persons per household figure in La Grande was 2.41 (based on 11,763 total population minus 582 people in group quarters, and then divided by 4,640 households).

The total number of new households in 2020 was projected by dividing the new projected population in 2020 by the projected average household size for new households. Table III.4 shows the results of this analysis for Scenarios A and B.

Table III.4 Scenarios A and B - New Household Projection 2000-2020

	Projected New Population (2020)	Projected Household Size for New Population	Projected New Households (2020)
La Grande UGB - Scenario A	1,129	2.20	513
La Grande UGB - Scenario B	3,086	2.20	1,403

Notes: Non-household population (person in group quarters) factored in by household size figure. There were an estimated 582 persons in group quarters in the City of La Grande in 1990 (U.S. Census)

As shown in Table III-4, there are 513 new households projected in Scenario A and 1,403 new households projected in Scenario B in the La Grande Urban Area in 2020. The projected total number of new housing units needed in the community in the next 20 years is equivalent to the projected number of new households.

B. National, state, and local demographic and economic trends and factors that may affect the 20-year projection of structure type and mix.

This section is intended to determine how the projected number of new households will be distributed among different housing structure types in 20 years. In order to make this determination, it is necessary to analyze factors that will likely influence housing choice in the future (e.g., the decision to buy a single-family home as opposed to renting an apartment, the need for housing a seasonal labor force, second homes in recreation areas).

Major state and national housing and demographic trends, which may influence the housing types that will be needed in the next 20 years, are summarized below. This information about national and state housing trends is a summary of information in *Planning for Residential Growth: A Workbook for Oregon's Urban Areas.*

- Households are becoming smaller. More households are being formed by "empty nesters," young singles, and couples than by the "traditional family".

- Declining household sizes suggest (with other things, especially income, being equal) a shift toward smaller-sized housing.

- Age of the head of the household is increasing. Aging of the baby boomers is the primary cause of this factor.

- Greater household age generally indicates a greater propensity toward home ownership. However, home ownership rates decline in the 65 and older age group. Older households also have a tendency to "trade down" to smaller housing types as their children leave the household.

- Household incomes are generally increasing though they have not kept pace with housing prices or rents. Demand for more affordable housing types (e.g.,

manufactured homes, apartments, townhouses, and small-lot single-family houses) will increase as housing costs continue to outstrip income growth.

In conclusion, smaller households, older households and higher housing costs are expanding markets for "alternative housing". Housing types which will see greater demand include smaller-lot single-family developments, manufactured housing, and duplexes.

At the same time, local trends in La Grande and Union County contradict some of the national trends. There is a strong demand for traditional large lots with aesthetic amenities. La Grande's quality of life and surrounding scenic beauty contributes to this need. Household size in La Grande is slightly lower than the Statewide average and has been decreasing gradually.

C. Local demographic characteristics of the population and, if possible, household trends that relate to demand for different types of housing.

Some of the best indicators of housing needs are household incomes by household size and age of head of household. Ideally, an analysis would examine these statistics cross-tabulated against each other. However, cross-tabulation of this data can only be obtained from Public Use Microdata Samples (PUMS) from the 1990 Census for larger metropolitan areas. The smallest geographic level for which PUMS data is available is 100,000 people. The PUMS area that includes the City of La Grande contains all of the following counties: Gilliam, Wheeler, Morrow, Umatilla, Union, Wallowa, and Baker. This information is not useful for conducting a housing analysis for the City of La Grande. Therefore, non-cross-tabulated data is examined separately in order to determine the connection of this demographic information to housing need.

Unfortunately, 2000 Census numbers are not yet available and tabulations in the 1970 Census and 1980 Census for household income, household size, and age of householder are unavailable or unavailable in the same format as the 1990 Census. For example, household size and household income breakdowns are unavailable for places with less than 50,000 in population. Therefore, a trend analysis of these variables is impossible. The general trend analysis presented in Part B is a substitute for a more detailed trend analysis.

Table III.5 below provides a summary of household income, age of the head of household, household size, and tenure for the City of La Grande in 1990. This information is examined in more detail in subsequent tables.

Table III.5 City of La Grande
Household Income, Size, Age of Head of Household, and Tenure, 1990

	Number	% Share
Household Income		
<$10,000 (Very Low)	1,148	24.7%
$10-14,999 (Low)	548	11.8%
$15-24,999 (Mid)	913	19.7%
$25-34,999 (High-Mid)	742	16.0%
$35-49,999 (High)	739	15.9%
>$50,000 (Very High)	550	11.9%
Total	**4,640**	**100.0%**
Median Income	$21,318	-
Household Size		
1	1,332	28.7%
2	1,674	36.1%
3	610	13.1%
4	595	12.8%
5+	429	9.2%
Total	**4,640**	**100.0%**
Age of Head of Household		
15-24	580	12.5%
25-34	855	18.4%
35-44	1,072	23.1%
45-54	520	11.2%
55-64	505	10.9%
65+	1,108	23.9%
Total	**4,640**	**100.0%**
Renter Households	2,141	46.1%
Owner Households	2,492	53.7%

Source: 1990 U.S. Census, STF3A Database.
Note: Small discrepancies in the number of households are due to sampling in the Census tabulation.

Table III.6 below illustrates housing types broken down by tenure (whether the housing is renter- or owner-occupied).

Table III.6 City of La Grande Structure Type by Tenure, 1990

Structure Type	Renter-Occupied	% Renter-Occupied	Owner-Occupied	% Owner-Occupied	Vacant	% Vacant	Total
Single-family detached	689	22.9%	2,218	73.8%	98	3.3%	3,005
Single-family attached	131	81.9%	21	13.1%	8	5.0%	160
Multi-family (2+ units)	1,190	85.8%	42	3.0%	155	11.2%	1,387
Manufactured homes	111	36.3%	182	59.5%	13	4.2%	306
Other	20	37.0%	29	53.7%	5	9.3%	54
Total	**2,141**	**43.6%**	**2,492**	**50.7%**	**279**	**5.7%**	**4,912**

Source: 1990 U.S. Census, STF3A Database.

As shown in Table 3-6, in 1990 there were 4,912 housing units in the City of La Grande. Of these, 4,633 were occupied and 279 were vacant - a vacancy rate of 5.7 percent. Of the occupied housing units, 2,141 were renter-occupied (46.2 percent of occupied units and 43.6 percent of all units) and 2,492 were owner-occupied (53.8 percent of occupied units and 50.7 percent of all units).

Single-family detached housing units had the highest percentage of owner-occupancy. Single-family attached units were overwhelmingly occupied by renters. Apartments units had a large vacancy rate - 11.2 percent - with almost all of the occupied units naturally occupied by renters. Manufactured homes were owner-occupied at almost a 60 percent rate, suggesting that these units are a popular alternative to ownership of single-family homes.

Table III.7 below examines housing tenure by the age classification of the head of the household.

Table III.7 City of La Grande Age of Household Head by Tenure, 1990

Age of Head of Household	Renter-Occupied	% Renter-Occupied	Owner-Occupied	% Owner-Occupied	Total
Under 25	602	97.3%	17	2.7%	619
25-34	592	71.1%	241	28.9%	833
35-44	388	38.5%	620	61.5%	1,008
45-54	164	33.7%	323	66.3%	487
55-64	115	23.1%	383	76.9%	498
65+	280	23.6%	908	76.4%	1,188
Total	**2,141**	**46.2%**	**2,492**	**53.8%**	**4,633**

Source: 1990 U.S. Census, STF3A Database.

As shown in Table III.7, propensity for home ownership in La Grande is the least among younger households and increases steadily with age.

Among the youngest householder age group (15-24 years), over 97 percent of households were renters in 1990, as compared to 46 percent of all households in La Grande. Householders aged 25-34 also had large rental rates, with over 71% such households renting their housing. Householders aged 35-44 and 45-54 were more representative of the population as a whole. For older householders aged 55-64, however, almost 77 percent owned their own home. This rate was almost identical for households with the head above the age of 65. Table III.8 below shows how income correlates with the age of the householder.

Table III.8 City of La Grande Age of Household Head by Income, 1990

Age of Head of Household	<$10,000 (Very Low)	$10,000-14,999 (Low)	$15,000-24,999 (Mid)	$25,000-34,999 (High-Mid)	$35,000-49,000 (High)	$50,000+ (Very High)	Total
Under 25	64.3%	11.0%	18.1%	4.1%	0.3%	2.1%	100.0%
25-34	20.8%	15.6%	20.6%	19.2%	16.8%	7.0%	100.0%
35-44	9.1%	9.1%	17.0%	20.5%	25.0%	19.2%	100.0%
45-54	14.8%	5.0%	11.9%	15.8%	24.0%	28.5%	100.0%
55-64	16.4%	4.2%	14.3%	24.0%	23.8%	17.4%	100.0%
65+	30.6%	18.6%	28.5%	11.8%	7.2%	3.2%	100.0%
Total	**24.7%**	**11.8%**	**19.7%**	**16.0%**	**15.9%**	**11.9%**	**100.0 %**

Source: 1990 U.S. Census, STF3A Database.

The median household income in 1990 for La Grande was $21,318 (see Table III.5). Income ranges have therefore been divided into the categories shown in Table III.8.

As shown in Table III.8, 36.5 percent of all households were in the Very Low and Low income groups, 35.7 percent were in the Mid and High-Mid income groups, and 27.8 percent were in the High and Very High income groups.

Younger households where the age of the head of the household (householder) was in the under 25 age group had lower incomes than the population as a whole and many more households in the Very Low income group. Households where the householder was in the 35 to 44 and 45 to 54 age group had much lower percentages in the Very Low income group and had 44.2 percent and 52.5 percent rates, respectively, of households in the High and Very High income groups.

Households with the householder beyond retirement age (65+ years) had low income levels, with almost half of these households in the Very Low and Low income categories. However, it should be remembered that, relative to housing need, these households tend to be "cash poor and equity rich," meaning that they have high home-ownership rates (76 percent, see Table III.7) and have frequently paid off their mortgages. Therefore, the reduced income that these post-retirement households have does not necessarily translate into housing affordability problems.

Table III.9 below illustrates housing affordability among income groups. Note that due to the way the Census tabulates these figures, the income groups shown do not exactly correspond to the income groups in Table III.6.

Table III.9 City of La Grande Housing Affordability by Income Group, 1990

Income Group	Renter with Housing Cost Burden	Owner with Housing Cost Burden
<$10,000 (very low)	84.80%	67.84%
$10-19,999 (low)	34.64%	18.08%
$20-34,999 (mid)	3.23%	6.42%
$35-49,999 (high)	0.00%	1.44%
>$50,000 (very high)	0.00%	0.00%
Total	**44.26%**	**13.87%**

Source: 1990 U.S. Census, STF3A Database.

A 'housing cost burden' is defined by the U.S. Department of Housing and Urban Development (HUD) as a household which pays more than 30 percent of its gross income for housing, including utilities. As shown in Table III.9, 44 percent of all renter households and 14 percent of all owner households had a housing cost burden in 1990. However, housing cost burdens were concentrated almost exclusively among the lower income groups in La Grande. Of households with an income at less than $10,000 per year, 85 percent of those renting and 68 percent of those owning their home had a housing cost burden. Among the households with an income of between $10,000 and $19,999, 35 percent of renters and 18 percent of owners had a housing cost burden. Of the households with incomes greater than $20,000 there are no significant cost burdens experienced - except for 3 percent of renter-occupied households and 6 percent of owner-occupied households with incomes of $20,000 to $34,999 and 1 percent of owner-occupied households with incomes of $35,000 to $49,999.

D. Housing types that are likely to be affordable to the projected population based on household income.

The following types of housing are addressed by this study:

- Detached single-family houses
- Attached single-family houses
- Multi-family apartments
- Multi-family apartments for low-income households (government-assisted)
- Manufactured housing on single-family lots
- Manufactured housing in parks

Table III.10 below illustrates the income groups in the City of La Grande in 1990, the percentage of total households that each income group represents, and the type of housing which is financially attainable by each group. This information is derived from the analysis in *Planning for Residential Growth: A Workbook for Oregon's Urban Areas.*

Table III.10 City of La Grande
Households by Income Group and Type of Financially Attainable Housing

Income Group	Household Income Range	% of Total Households in 1990	Financially Attainable Housing
Very low	<$10,000	24.7%	Multi-family, manufactured homes in parks, subsidized housing
Low	$10-14,999	11.8%	Attached single- and multi-family, manufactured homes in parks
Mid	$15-24,999	19.7%	Single-family manufactured homes, attached single- and multi-family, manufactured homes in parks
High-Mid	$25-34,999	16.0%	Single-family detached on smaller lots, attached single- and multi-family, manufactured homes in parks
High	$35-49,999	15.9%	All housing types
Very high	>$50,000	11.9%	All housing types

Source: 1990 U.S. Census, STF3A Database. Financially attainable housing list derived from *Planning for Residential Growth: A Workbook for Oregon's Urban Areas*, TGM program, ODOT and DLCD, p. 19.

E. Additional units needed by structure type.

Tables III.12a and III.12b below present a numerical distribution of the new projected needed housing types for each income group in the La Grande Urban Area in 2020 for Scenarios A and B. These distributions are based on Table III-10 above, estimates of current tenure by income, and projections of housing need by income group. Based on the analysis in parts B and C of this section, emphasis has been placed on a greater projected need for alternative housing types versus large-lot single-family residences in the next 20 years.

The relative distribution of income groups has been kept the same as in 1990, as shown in Tables III.8 and III.10. Homeownership/renter rates were distributed as follows:

Income Group	Owners/Renters
Very Low:	25/75%
Low:	35/65%
Mid:	55/45%
Mid-High:	65/35%
High:	75/25%
Very High:	85/15%

These percentages were allocated to the different housing types using the following formula:

Table III.11 City of La Grande Income Category by Housing Type

	Very low	Low	Mid	Mid-High	High	Very high
Owner-occupied						
Single-family detached	2%	7%	35%	61%	75%	85%
Single-family attached	3%	4%	1%	0%	0%	0%
Apartments	0%	0%	0%	0%	0%	0%
Manufactured homes	20%	24%	19%	4%	0%	0%
Subtotal	**25%**	**35%**	**55%**	**65%**	**75%**	**85%**
Renter-occupied						
Single-family detached	7%	10%	11%	13%	13%	9%
Single-family attached	4%	3%	2%	2%	1%	1%
Apartments	44%	33%	19%	12%	11%	5%
Manufactured homes	20%	19%	13%	8%	0%	0%
Subtotal	**75%**	**65%**	**45%**	**35%**	**25%**	**15%**
Total	**100%**	**100%**	**100%**	**100%**	**100%**	**100%**

Table III.12a Scenario A
Projection of New Households by Income Group and Housing Need

	Very Low		Low		Mid		Mid-High		High		Very High		TOTAL	
Owner-occupied	**%**	**units**	**%**	**units**	**%**	**units**	**%**	**units**	**%**	**units**	**%**	**units**	**%**	**units**
Single-family detached	2%	3	7%	4	35%	35	61%	50	75%	61	85%	52	**74.7%**	**205**
Single-family attached	3%	4	4%	2	1%	1	0%	0	0%	0	0%	0	**2.6%**	**7**
Apartments	0%	0	0%	0	0%	0	0%	0	0%	0	0%	0	**0.0%**	**0**
Manufactured homes	20%	25	24%	15	19%	19	4%	3	0%	0	0%	0	**22.7%**	**62**
Total	**25%**	**32**	**35%**	**21**	**55%**	**56**	**65%**	**53**	**75%**	**61**	**85%**	**52**	**100%**	**275**
Renter-occupied														
Single-family detached	7%	9	10%	6	11%	11	13%	11	13%	11	9%	5	**22.2%**	**53**
Single-family attached	4%	5	3%	2	2%	2	2%	2	1%	1	1%	1	**5.0%**	**12**
Apartments	44%	56	33%	20	19%	19	12%	10	11%	9	5%	3	**49.1%**	**117**
Manufactured homes	20%	25	19%	12	13%	13	8%	7	0%	0	0%	0	**23.7%**	**57**
Total	**75%**	**95**	**65%**	**39**	**45%**	**45**	**35%**	**29**	**25%**	**20**	**15%**	**9**	**100%**	**238**
Total	**100%**	**127**	**100%**	**61**	**100%**	**101**	**100%**	**82**	**100%**	**82**	**100%**	**61**	**100%**	**513**
Percentage out of Total Units	**24.7%**		**11.8%**		**19.7%**		**16.0%**		**15.9%**		**11.9%**		**100%**	

Table III.12b Scenario B
Projection of New Households by Income Group and Housing Need

	Very Low		Low		Mid		Mid-High		High		Very High		TOTAL	
Owner-occupied	**%**	**units**	**%**	**units**	**%**	**units**	**%**	**units**	**%**	**units**	**%**	**units**	**%**	**units**
Single-family detached	2%	7	7%	12	35%	97	61%	137	75%	168	85%	141	**74.7%**	**561**
Single-family attached	3%	10	4%	7	1%	3	0%	0	0%	0	0%	0	**2.6%**	**20**
Apartments	0%	0	0%	0	0%	0	0%	0	0%	0	0%	0	**0.0%**	**0**
Manufactured homes	20%	69	24%	40	19%	52	4%	9	0%	0	0%	0	**22.7%**	**171**
Total	**25%**	**87**	**35%**	**58**	**55%**	**152**	**65%**	**146**	**75%**	**168**	**85%**	**141**	**100%**	**751**
Renter-occupied														
Single-family detached	7%	24	10%	17	11%	30	13%	29	13%	29	9%	15	**22.2%**	**144**
Single-family attached	4%	14	3%	5	2%	6	2%	4	1%	2	1%	2	**5.0%**	**33**
Apartments	44%	153	33%	55	19%	52	12%	27	11%	25	5%	8	**49.1%**	**320**
Manufactured homes	20%	69	19%	31	13%	36	8%	18	0%	0	0%	0	**23.7%**	**155**
Total	**75%**	**260**	**65%**	**108**	**45%**	**124**	**35%**	**79**	**25%**	**56**	**15%**	**25**	**100%**	**651**
Total	**100%**	**347**	**100%**	**166**	**100%**	**276**	**100%**	**224**	**100%**	**223**	**100%**	**166**	**100%**	**1,403**
Percentage out of Total Units	**24.7%**		**11.8%**		**19.7%**		**16.0%**		**15.9%**		**11.9%**		**100%**	

As shown in Table III.12a, in Scenario A, a total of 275 new owner-occupied units and 238 new renter-occupied units are projected to be needed by 2020 in the La Grande UGB, for a total of 513 housing units. As shown in Table III.12b, in Scenario B, a total of 751 new owner-occupied units and 651 new renter-occupied units are projected to be needed by 2020 in the La Grande UGB, for a total of 1,403 housing units. These figures, however, do not account for a structural vacancy rate for housing.

Tables III.13a and III.13b show the projected housing needs and allow for a structural vacancy rate for new units for Scenarios A and B, respectively. Vacancy rates are estimated at 3 percent for all new owner-occupied units and 6 percent for all new renter-occupied units. The projected needed housing mix is also compared to the housing mix within the City limits of La Grande as tabulated in the 1990 U.S. Census.

Table III.13a Scenario A
Projected Housing Needs by Housing Type and Tenure

	1990 Housing Mix %[1]	Projected Need %	Projected Needed Units	Structural Vacancy Rate	Total Projected Needed Units
Owner-occupied					
Single-family detached	89.0%	74.7%	205	3.0%	211
Single-family attached	0.8%	2.6%	7	3.0%	7
Multi-family	1.7%	0.0%	0	3.0%	0
Manufactured homes	7.3%	22.7%	62	3.0%	64
Total	**98.8%**	**100.0%**	**275**	**3.0%**	**283**
% of housing mix	**53.8%**	**-**	**53.6%**	**-**	**52.8%**
Renter-occupied					
Single-family detached	32.2%	22.2%	53	6.0%	56
Single-family attached	6.1%	5.0%	12	6.0%	13
Multi-family	55.6%	49.1%	117	6.0%	124
Manufactured homes	5.2%	23.7%	57	6.0%	60
Total	**99.1%**	**100.0%**	**238**	**6.0%**	**253**
% of housing mix	**46.2%**	**-**	**46.4%**	**-**	**47.2%**
Total					
Single-family detached	61.2%	50.3%	258	3.6%	267
Single-family attached	3.3%	3.7%	19	4.9%	20
Multi-family	28.2%	22.8%	117	6.0%	124
Manufactured homes	6.2%	23.2%	119	4.4%	124
Total	**98.9%**	**100.0%**	**513**	**4.4%**	**536**

Notes:
[1] Totals do not add to 100% because the table does not include the "other" category in U.S. Census.

Table III.13b Scenario B
Projected Housing Needs by Housing Type and Tenure

	1990 Housing Mix %[1]	Projected Need %	Projected Needed Units	Structural Vacancy Rate	Total Projected Needed Units
Owner-occupied					
Single-family detached	89.0%	74.7%	561	3.0%	578
Single-family attached	0.8%	2.6%	20	3.0%	20
Multi-family	1.7%	0.0%	0	3.0%	0
Manufactured homes	7.3%	22.7%	171	3.0%	176
Total	**98.8%**	**100.0%**	**751**	**3.0%**	**774**
% of housing mix	**46.6%**	**-**	**53.6%**	**-**	**52.8%**
Renter-occupied					
Single-family detached	32.2%	22.2%	144	6.0%	153
Single-family attached	0.0%	5.0%	33	6.0%	35
Multi-family	0.0%	49.1%	320	6.0%	339
Manufactured homes	0.0%	23.7%	155	6.0%	164
Total	**32.2%**	**100.0%**	**651**	**6.0%**	**691**
% of housing mix	**53.4%**	**-**	**46.4%**	**-**	**47.2%**
Total					
Single-family detached	62.7%	50.3%	705	3.6%	731
Single-family attached	3.3%	3.7%	53	4.9%	55
Multi-family	26.6%	22.8%	320	6.0%	339
Manufactured homes	6.3%	23.2%	325	4.4%	340
Total	**98.9%**	**100.0%**	**1,403**	**4.4%**	**1,464**

Notes:
[1] Totals do not add to 100% because the table does not include the "other" category in U.S. Census.

As shown in Table III.13a, taking into account structural vacancy rates, a total of 283 owner-occupied units and 253 renter-occupied units, for a total of 536 units, are projected to be needed over the next 20-year time period in Scenario A. This breaks down to 52.8 percent owner-occupied units and 47.2 percent renter-occupied units.

As shown in Table III.13b, taking into account structural vacancy rates, a total of 774 owner-occupied units and 691 renter-occupied units, for a total of 1,464 units (total is not sum of components due to rounding), are projected to be needed over the next 20-year time period in Scenario B. The projected tenure is the same as in Scenario A - 52.8 percent owner-occupied units and 47.2 percent renter-occupied units.

F. Density range projected for each plan designation and the average projected density for all residential types.

Table III.14 shows the plan designations for residential zoning districts in the City of La Grande, the permitted and conditional residential uses for each zone, and the minimum lot sizes and maximum densities permitted. Note that the maximum allowed development densities are based on minimum lot sizes and therefore do not include the additional land required for streets and other infrastructure. Based on the maximum allowed densities in each residential zone, the density range to accommodate a wide variety of housing types is available.

Table III.14 Allowed Housing Types and Densities -City of La Grande Zoning Districts

Residential Zone		Permitted Residential Uses	Conditional Residential Uses	Minimum Lot Size	Maximum Allowed Density (Dwelling Units) (DUs) Per Acre
Hillside Development Residential	HD	Single family dwellings	none	1 acre	1
Rural Residential	RR-1	Single family dwellings	none	15,000 sq. ft. - individual lots 17,000 sq. ft. - when creating 2 or more lots(1)	2.90
Low Density Residential	R-1	Single family dwellings	PUDs	6,000 sq. ft. - individual lots 8,700 sq. ft. - when creating 2 or more lots(1)	7.26
Medium Density Residential	R-2	Single family dwellings; duplexes	PUDs; accessory residential unit; manufactured home park	4,800 sq. ft. - individual lots 7,000 sq. ft. - when creating 2 or more lots(1) 1 duplex per 6,000 sq. ft.	9.08 for SF DU 14.52 for duplex
High Density Residential	R-3	Single family dwellings; duplexes; apartments	PUDs; accessory residential unit; manufactured home park	5,000 sq. ft. for first DU + 1,000 sq. ft. for each additional DU	8.71 for SF DU 14.52 for duplex 18.67 for triplex 31.11 for ten-plex
Residential-Professional	R-P	Single family dwellings; duplexes	Accessory residential unit; Multi-family - 5,000 1st unit: 1,000 each unit after; Attached single family.	5,000 sq. ft. 1 duplex per 6,000 sq. ft.	8.71 for SF DU 14.52 for duplex

Source: City of La Grande Development Code (Chapter 2 - Land Use Zones)
Note: 3,000 square feet per unit for attached single family for zones R-1 through R-P.
(1) Refers to average lot size not to be exceeded.

The projected density range for each housing type is estimated below. This estimation is based on the types of structures that would be allowed in each designation and on an estimate of the density at which each structure type is likely to develop in the community.

Tables III.15a and III.15b below show net residential acreage needed by housing type in the La Grande Urban Area in 2020 for Scenarios A and B. Net land needs are calculated by dividing the number of needed units of each structure type by the density at which it is

most likely to be developed for each type of housing. Since this figure does not take into account the land needed for public facilities (including streets and utilities) it is directly comparable to the "net buildable acreage" figure in Table I.6.

Projected development densities were developed by City of La Grande Staff based on current development activity.

Table III.15a Scenario A Acreage Needed by Housing Type

Type of unit	Allocated Housing Units	Housing Units %	Projected Development Density (units/acre)	Net Acreage Needed
Single-family detached	267	49.9%	4.00	66.8
Single-family attached	20	3.8%	8.00	2.5
Multi-family	124	23.1%	11.00	11.3
Manufactured homes in parks	124	23.2%	5.00	24.9
Total	**536**	**100.0%**	**5.08**	**105.5**

Note: Numbers may not add due to rounding.

Table III.15b Scenario B Acreage Needed by Housing Type

Type of unit	Allocated Housing Units	Housing Units %	Projected Development Density (units/acre)	Net Acreage Needed
Single-family detached	731	49.9%	4.00	182.7
Single-family attached	55	3.8%	8.00	6.9
Multi-family	339	23.1%	11.00	30.8
Manufactured homes in parks	340	23.2%	5.00	67.9
Total	**1,464**	**100.0%**	**5.08**	**288.3**

Note: Numbers may not add due to rounding.

In Scenario A, a total of 105.5 net acres of residential land are projected to be required over the next 20 years to meet the projected housing demand of 536 units, assuming that projected development densities are met.

In Scenario B, a total of 288.3 net acres of residential land are projected to be required over the next 20 years to meet the projected housing demand of 1,464 units, assuming that projected development densities are met.

IV. Future Land Needs for Commercial and Industrial Land Uses

The objective of this section is to determine the amount of commercial and industrial land that will be needed in the UGB of the City of La Grande for the next 20 years. To do this, regional economic forecasts are examined in order to determine the land needed by industry sector and land use type.

The employment data that is presented in this section is only available at the county and, in some cases, the regional level. Specific employment data is not available for the City of La Grande or its UGB. For this reason, the analysis treats larger regional trends as applying to the City of La Grande. While this is necessarily a generalization, it does provide a reasonable estimate of land use needs.

A. Existing employment patterns by sector.

Table IV.1 provides a summary of recent population and employment data for Union County for the 1990 through 1999 time period.

Table IV.1 Union County Recent Employment Data

Year	Population	Per Capita Income	Annual Average Covered Wage	Annual Average Unemployment %	Total Employment	Nonfarm Payroll Employment
1990	23,600	$14,980	$17,776	7.0%	10,950	9,020
1991	24,000	$15,353	$18,790	6.9%	10,880	8,820
1992	24,000	$16,101	$19,925	8.3%	10,970	8,930
1993	24,300	$16,828	$20,016	7.8%	11,350	9,240
1994	24,500	$17,472	$20,327	6.4%	11,750	9,400
1995	24,400	$18,252	$20,331	6.3%	11,560	9,470
1996	24,500	$18,460	$20,849	7.8%	11,650	9,550
1997	24,500	$19,606	$21,864	7.9%	11,460	9,630
1998	24,400	$20,272	$22,877	6.9%	11,690	9,680
1999	24,500	n/a	n/a	6.0%	11,530	9,760

Source: *Oregon Data Sheets: Union County*, Oregon Employment Department, April 1999.

As shown in Table IV.1, nonfarm payroll employment in Union County increased by 740 (from 9,020 to 9,760), or 8.2 percent, over the 1990 to 1999 time period. The population in Union County increased by 900, or 3.8 percent, over the same time period.

The following is a summary of recent economic trends in Union County provided by the Oregon Employment Department:

> *Slow but steady job growth best characterizes Union County's employment trends. Over the years, the county seems to have had fewer instances of boom-and- bust-type experiences than its neighbors. That means fewer really bad years but, also, fewer really good years. As an example, consider data from the late 1990s. Union County's nonfarm employers put together a net gain of 70 jobs in 1995, 80 jobs in 1996, 80 jobs in 1997, and another 80 jobs in 1998. You can't get much more consistent than that!*
>
> *Before you start thinking that labor market conditions in Union County are completely predictable, you need to look at industrial differences, too. There's quite a lot of variation between the eight major industrial divisions.*

Like the other counties of Northeast Oregon, wood products manufacturing is on a downward path here, too. The timber industry of Union County employed an estimated 870 workers in 1998, the fewest since 1964.

However, the loss of 370 wood products manufacturing jobs was almost entirely balanced by a gain of 340 jobs among other manufacturing companies in Union County. The number of jobs with these other manufacturers has more than doubled between 1990 and 1998.

The plight of the wood products industry is pretty well known by now. Far less attention has been given to job losses in Union County's transportation/communications/ utilities industry. On a percentage basis, transportation/ communications/utilities has suffered even more than wood products during the 1990s in Union County. Each of the three components - transportation and communications and utilities - shed jobs between 1990 and 1998. This industrial division has decreased in size for nine consecutive years now.

A leading contributor to Union County's net job growth in the 1990s has been the wholesale and retail trade division (+390). This portion of the economy has seen widespread job increases among many types of stores, the largest of which have been at eating and drinking places, general merchandise stores, and auto dealers and service stations.

Mirroring the pattern of Baker County, Union County's fastest growing industry of the 1990s (when measured by percent increase in jobs) has been construction and mining. In just eight years, employment in construction and mining is up by an amazing 113.3 percent in Union County. This isn't the result of some large, one-time project. It comes from general growth in the industry as well as reflecting just how low construction employment was in 1990.

Table IV.2 provides a summary of the most recently available figures for employment by industry in Union County.

Table IV.2 Union County Nonfarm Payroll Employment By Industry

	February 2001[1]	% of Total
Total Employment	**11,400**	**-**
Total Nonfarm Payroll Employment[2]	**9,920**	**100.0%**
Goods Producing[3]	1,820	18.3%
Service Producing[4]	8,100	81.7%
Manufacturing, Total	**1,530**	**15.4%**
Lumber and Wood Products	820	8.3%
Other Manufacturing	710	7.2%
Nonmanufacturing, Total	**8,390**	**84.6%**
Construction and Mining	290	2.9%
Transportation and Public Utilities	480	4.8%
Wholesale and Retail Trade	2,460	24.8%
Finance, Insurance, and Real Estate	370	3.7%
Services	2,060	20.8%
Government	2,730	27.5%
Federal	180	1.8%
State	1,200	12.1%
Local	1,350	13.6%

Source: *Eastern Oregon Labor Trends*, Oregon Employment Department, April 2001.
Note: Estimates are subject to revision.
(1) Preliminary estimate.
(2) Nonfarm payroll data are based on 1987 Standard Industrial Classification (SIC) manual. The data are by place of work. Persons working multiple jobs are counted more than once. The data exclude the self-employed, volunteers, unpaid family workers, domestics, and persons involved in labor disputes. Persons on sick leave, vacations, or holidays, and being paid for that period by the employer, are considered employed.
(3) Goods producing agencies include manufacturing, mining, and construction.
(4) Service-producing industries include transportation, communications & utilities, real estate; services; and government.

As shown above, manufacturing accounts for 15.4 percent of the payroll employment in Union County (with Lumber and Wood Products accounting for 53.6 percent of manufacturing employment), with nonmanufacturing-related employment accounting for the remaining 84.6 percent. Of the major nonmanufacturing employment sectors, Trade accounts for 24.8 percent of total employment, Services accounts for 20.8 percent, and Government accounts for 27.5 percent.

B. Sector-level employment forecasts.

The following section summarizes regional employment projections and estimates the impact on the City of La Grande.

The following long-term employment forecast for Union County was prepared by the Oregon Office of Economic Analysis (OEA) in 1997. As shown in Table IV.3 below, employment is projected to increase by 430 over the 10-year period from 2000 to 2010.

It is projected to increase by another 61 over the next 10 years to the year 2020, for a total increase of 491 from 2000 to 2020.

The projected increase of 491 in employment from 2000 to 2020 represents a total increase of 5.1 percent, or an annual average growth rate (AAGR) of 0.25 percent for the twenty-year period (0.44 percent AAGR for 2000-2010 and 0.06 percent AAGR for 2010-2020) compared to the 1.30 percent AAGR for the 1990 to 2000 time period.

As these figures demonstrate, long-term economic forecasts call for a gradual slowing down of economic growth towards the second half of a 20-year time frame. This is consistent with Statewide and national forecasts.

Table IV.3 Union County Employment Forecast

	1990	1995	2000	2005	2010	2015	2020
Union County	8,469	9,066	9,639	9,916	10,069	10,111	10,130

Source: Oregon Office of Economic Analysis, Long Term Population and Employment Forecasts, County Employment Forecasts, January 1997.

Table IV.4 shows employment projections made by the Oregon Employment Department for the 1998-2008 time frame. These projections were only made on a regional basis. Union County is part of Region 13, which included Union, Baker, Grant and Wallowa Counties when the forecast was made.

Table IV.4 Employment Projections by Industry, 1998 - 2008
Region 13: Union, Baker, Grant and Wallowa Counties

	1998	2008	Change	% of Change	Annual Average Growth Rate (AAGR)
Total Nonfarm Payroll Employment	**19,990**	**22,220**	**2,230**	**11.2%**	**1.06%**
Goods Producing	3,730	3,960	230	6.2%	0.60%
Service Producing	16,260	18,260	2,000	12.3%	1.17%
Manufacturing, Total	**2,930**	**3,060**	**130**	**4.4%**	**0.44%**
Durable Goods	2,740	2,870	130	4.7%	0.46%
Lumber and Wood Products	1,820	1,700	-120	-6.6%	-0.68%
Other Durable Goods	920	1,170	250	27.2%	2.43%
Nondurable Goods	190	190	0	0.0%	0.00%
Nonmanufacturing, Total	**17,060**	**19,160**	**2,100**	**12.3%**	**1.17%**
Construction and Mining	800	900	100	12.5%	1.18%
Transportation, Communications and Utilities	1,050	1,120	70	6.7%	0.65%
Trade	4,690	5,270	580	12.4%	1.17%
Wholesale Trade	730	820	90	12.3%	1.17%
Retail Trade	3,960	4,450	490	12.4%	1.17%
Finance, Insurance, and Real Estate	780	970	190	24.4%	2.20%
Services	3,890	4,620	730	18.8%	1.73%
Health Services	1,260	1,370	110	8.7%	0.84%
Other Services	2,630	3,250	620	23.6%	2.14%

Table IV.4 Employment Projections by Industry, 1998 - 2008
Region 13: Union, Baker, Grant and Wallowa Counties (Continued)

	1998	2008	Change	% of Change	Annual Average Growth Rate (AAGR)
Government	5,850	6,280	430	7.4%	0.71%
Federal	1,010	1,000	-10	-1.0%	-0.10%
State	1,480	1,740	260	17.6%	1.63%
Local	3,360	3,540	180	5.4%	0.52%

Source: The Benkendorf Associates Corp. based on Oregon Employment Department, *Industry Projections, 2008, Workforce Region 13, July 1, 1999*

As shown in Table IV.4, nonfarm payroll employment is expected to increase by 2,230 jobs in Region 13 over the 1998-2008 period - an AAGR of 1.06 percent. This is much greater than the 0.44 percent AAGR for employment for 2000-2010 for Union County made by the Oregon Office of Economic Analysis (OEA) discussed above.

The employment projection made by the Oregon Employment Department (OED) in Table IV.4 shall be used as the basis for projections for the La Grande rather than the OEA projections. This is because the OED projection: 1) has a short-term (10 year) growth rate projection similar to recent population growth rates in Union County (1.02 percent for 1990 to 2000); 2) is more recent than the OEA projection; and 3) breaks down employment projections by industry.

As shown in Table IV.4, manufacturing employment in Region 13 is expected to grow at a much lower rate than overall employment, with only a 4.4 percent total projected growth. The industry sectors with the greatest projected relative increases in employment are: Other Durable Goods (27.2%), Finance, Insurance, and Real Estate (24.4%), Other Services (23.6%) and State Government (17.6%). The industry sectors with the largest projected employment gains are: Retail Trade (490 jobs), Other Services (620 jobs) and State Government (260 jobs)

Table IV.5 below shows the 1998-2008 OED employment projection for Region 13. It also shows a projected 2020 employment projection extrapolated from the growth rate for the 1998-2008 period and the existing 2000 employment.

Table IV.5 Employment Projection Summary, 1998 - 2018
Region 13: Union, Baker, Grant and Wallowa Counties

	2000 employment	2008 employment	change 1998-2008	AAGR 1998-2008	estimated 2020 employment	estimated employment growth 2000-2020
Region 13	19,450	22,220	2,770	1.34%	26,070	6,620

Source: Oregon Employment Department (OED); The Benkendorf Associates Corp.

In order to apply these regional projections to the City of La Grande, several assumptions are made. These are listed as follows:

- The La Grande Urban Area will capture employment growth as a percentage of regional employment growth equivalent to the ratio of its projected population growth to the projected population growth of the region.

- The La Grande Urban Area will capture employment growth by industrial sector at the same rate as these industrial sectors make up total employment growth for the region. This assumption provides a useful assessment of the land necessary for employment growth if the City of La Grande is able to capture its 'fair share' of regional employment growth by industry.

The methodology used here is a basic "gravity model", commonly used in economic development analysis. The basic assumption behind this is that a locality will attract investment relative to a given region based on its relative size. In this case, population growth is used as a proxy for employment growth. This is done because there are no direct economic projections for La Grande (or indeed for any other sub-county area) broken down by industry.

Table IV.6 shows the projected 2020 population levels in Region 13 (1997 OEA projections) and the La Grande Urban Area in order to determine the share that the La Grande Urban Area represents of the Region 13 population.

Table IV.6 Union County and La Grande Population - 2000 & 2020

	2000 Population	2020 Projected Population	2000-2020 Growth
Scenario A			
Region 13 Total	**56,860**	**64,357**	**7,497**
Union County	24,960	26,971	2,011
Baker County	16,700	19,893	3,193
Grant County	8,000	9,245	1,245
Wallowa County	7,200	8,248	1,048
La Grande UGB	14,015	15,144	1,129
La Grande UGB as % of Union County	56.15%	56.15%	56.15%
La Grande UGB as % of Region 13	24.65%	23.53%	15.06%
Scenario B			
Region 13 Total	**56,860**	**67,842**	**10,982**
Union County	24,960	30,456	5,496
Baker County	16,700	19,893	3,193
Grant County	8,000	9,245	1,245
Wallowa County	7,200	8,248	1,048
La Grande UGB	14,015	17,101	3,086
La Grande UGB as % of Union County	56.15%	56.15%	56.15%
La Grande UGB as % of Region 13	24.65%	25.21%	28.10%

Sources: Center for Population Research and Census, Portland State University; Oregon Office of Economic Analysis (OEA); TBAC.

As shown in Table IV.6, the population in the La Grande Urban Area was estimated at 24.65 percent of the total Region 13 population for 2000 and projected to decline to 23.53 percent of the total Region 13 population for 2020 under Scenario A. The projected population growth from 2000 to 2020 for the La Grande Urban Area represents 15.06 percent of total Region 13 population growth under Scenario A.

Under Scenario B. the population in the La Grande Urban Area is projected to increase to 25.21 percent of the Region 13 total in 2020. The projected population growth from 2000 to 2020 for the La Grande Urban Area represents 28.1 percent of total Region 13 population growth under Scenario B.

Table IV.7 below shows the employment projections for Region 13 converted to the La Grande Urban Area. The 2000 employment figure for the La Grande Urban Area was estimated by taking the current Union County nonfarm employment of 9,920 (see Table IV.2) and multiplying by the Urban Area share of the county population of 56.15 percent (see Table IV.6). The employment growth from 2000 to 2020 was estimated by multiplying the 2000-2020 Region 13 job growth of 6,620 (see Table IV.5) by the Urban Area share of the Region 13 population growth for 2000 to 2020 of 15.06 percent under Scenario A and 28.1 percent under Scenario B (see Table IV.6).

Table IV.7 Employment Projections, 2000-2020 La Grande Urban Area

	2000	Job growth 2000-2020	2020 employment	% growth 2000-2020	2000-2020 AAGR
La Grande UGB - Scenario A	5,570	997	6,567	17.9%	0.83%
La Grande UGB - Scenario B	5,570	1,860	7,430	33.4%	1.45%

Sources: TBAC, based on :Oregon Office of Economic Analysis, *Long Term Population and Employment Forecasts, County Employment Forecasts, January 1997*; and Oregon Employment Department, *Nonfarm Payroll Employment for Union County, July 2000*.

As shown in Table IV.7, under Scenario A, a total of 997 new jobs are projected for the La Grande Urban Area for 2020 for a total employment of 6,567. This is equivalent to a 0.83 percent annual average growth rate (AAGR). Under Scenario B, a total of 1,860 new jobs are projected for the La Grande Urban Area for 2020 for a total employment of 7,430. This is equivalent to a 1.45 percent annual average growth rate (AAGR).

Table IV.8 below shows the projected new employment by industry for the La Grande Urban Area for 2020. The relative percentages of the industry employment sectors are identical to those of the new employment shown in Table IV.4.

Table IV.8 Employment Projections by Industry, 2000-2020 La Grande Urban Area

	% of Total	Employment Growth Scenario A	Employment Growth Scenario B
Total Nonfarm Payroll Employment	**100.00%**	**997**	**1,860**
Goods Producing	10.31%	103	192
Service Producing	89.69%	894	1,668
Manufacturing, Total	**5.83%**	**58**	**108**
Durable Goods	5.83%	58	108
Lumber and Wood	-5.38%	-54	-100
Other Durable Goods	11.21%	112	209
Nondurable Goods	0.00%	0	0
Nonmanufacturing, Total	**94.17%**	**939**	**1,752**
Construction and Mining	4.48%	45	83
Transportation, Communications and Utilities	3.14%	31	58
Trade	26.01%	259	484
Wholesale Trade	4.04%	40	75
Retail Trade	21.97%	219	409
Finance, Insurance and Real Estate	8.52%	85	158
Services	32.74%	326	609
Health Services	4.93%	49	92
Other Services	27.80%	277	517
Government	19.28%	192	359
Federal	-0.45%	-4	-8
State	11.66%	116	217
Local	8.07%	80	150

Source: The Benkendorf Associates Corp.

C. Employee per acre ratios

The following table presents typical square foot per employee and land coverage ratios by land use and industry classification. These numbers are based on typical nationwide figures and modified slightly downward for the La Grande area. There is no data available at the local level for employee per acre ratios.

The coverage ratios listed in Table IV.9 refer to the typical land area which is taken up by a structure on its site. In other words, the 20 percent coverage ratio for industrial uses means that an industrial building will typically take up 20 percent of the land area on an industrial site. The employees per acre figure is calculated by dividing the square foot floor area per employee figure by the coverage ratio in order to determine the total land area per employee figure. This figure is then converted to employees per acre.

In Table IV.9 industry types are repeated for each land use type-e.g., new retail trade is listed under industrial, office, and retail land uses. This is because employees of a certain industry work at jobs located on multiple land use types. For example, as shown in Tables IV.10a and IV.10b below, retail trade has a capture factor of 10 percent in

industrial space, 2 percent in office space, and 88 percent in retail space. This means that, on average, 10 percent, 2 percent, and 88 percent of retail trade employment is in industrial, office, and retail space, respectively.

More compact, pedestrian-oriented development patterns might affect certain sector employee/acre ratios. Some of the office and retail land uses; particularly services and retail trade would be able to increase employee per acre ratios primarily by reducing parking lot size requirements. In this analysis for La Grande, standard ratios shall be used in order to avoid underestimating land needs. If land use regulations which encourage compact, pedestrian-oriented development patterns are put into place, land use needs will be less than the estimates presented in this section.

Table IV.9 Allocated Employees Per Acre by Land Use Type and Industry

Land Use and Industry Type	Floor Area Per Job (sq. ft.)	Coverage Ratio	Employees per Acre
Industrial		**20%**	
Manufacturing	750		11.62
Construction and Mining	750		11.62
Transportation, Communication and Public Utilities	1,400		6.22
Wholesale Trade	1,100		7.92
Retail Trade	2,500		3.48
Financial, Insurance and Real Estate	350		24.89
Services	350		24.89
Government	300		29.04
Office	**-**	**25%**	
Manufacturing	225		48.40
Construction and Mining	225		48.40
Transportation, Communication and Public Utilities	250		43.56
Wholesale Trade	225		48.40
Retail Trade	225		48.40
Financial, Insurance and Real Estate	225		48.40
Services	250		43.56
Government	200		54.45
Retail	**-**	**20%**	
Transportation, Communication and Public Utilities	300		29.04
Retail Trade	500		17.42
Financial, Insurance and Real Estate	300		29.04
Services	300		29.04

Source: Hobson Johnson & Associates and The Benkendorf Associates Corp.

D. Employee/acre ratios compared to employment forecasts by sector

Tables IV.10a and IV.10b applies the employee/acre ratios presented in Table IV.9 to the employment projections by sector for La Grande presented in Table IV.8. New jobs by sector are listed in the first column. Note that these figures are repeated for each land use type; i.e., new retail trade jobs are listed under industrial, office, and retail land uses. The

capture factor refers to the rate at which the employees of a certain industry type work on a certain land use type. For example, as stated previously, retail trade has a capture factor of 10 percent in industrial space, 2 percent in office space, and 88 percent in retail space. This means that, on average, 10 percent, 2 percent, and 88 percent of retail trade employment is in industrial, office, and retail space, respectively. The capture factors are based on typical nationwide industry averages.

The adjusted new jobs figure refers to the employment in a specific land use type and industry sector after capture factors are taken into account. Floor area requirements are calculated based on the floor area requirements per job shown in Table IV.9. Land requirements are calculated by dividing the required floor area by the coverage ratio listed in Table IV.9.

Table IV.10a Projection of Land Required by Employment Sector
La Grande Urban Area, 2000-2020
Scenario A

Land Use and Industry Type	New Jobs - 2000-2020	Capture Factor	New Jobs - 2000-2020 (adjusted)	Floor Area Required (sq. ft.)	Land Required (net acres)
Industrial	**-**	**-**	**245**	**208,534**	**23.9**
Manufacturing	58	85%	49	37,052	4.3
Construction and Mining	45	60%	27	20,119	2.3
Transportation, Communication and Public Utilities	31	60%	19	26,289	3.0
Wholesale Trade	40	85%	34	37,622	4.3
Retail Trade	219	10%	22	54,768	6.3
Financial, Insurance and Real Estate	85	10%	8	2,973	0.3
Services	326	25%	82	28,558	3.3
Government	192	2%	4	1,153	0.1
Office	**-**	**-**	**263**	**59,822**	**5.5**
Manufacturing	58	15%	9	1,962	0.2
Construction and Mining	45	40%	18	4,024	0.4
Transportation, Communication and Public Utilities	31	30%	9	2,347	0.2
Wholesale Trade	40	15%	6	1,358	0.1
Retail Trade	219	2%	4	986	0.1
Financial, Insurance and Real Estate	85	80%	68	15,290	1.4
Services	326	25%	82	20,398	1.9
Government	192	35%	67	13,457	1.2

**Table IV.10a Projection of Land Required by Employment Sector
La Grande Urban Area, 2000-2020
Scenario A (Continued)**

Land Use and Industry Type	New Jobs - 2000-2020	Capture Factor	New Jobs - 2000-2020 (adjusted)	Floor Area Required (sq. ft.)	Land Required (net acres)
Retail	**-**	**-**	**368**	**148,835**	**17.1**
Transportation, Communication and Public Utilities	31	10%	3	939	0.1
Retail Trade	219	88%	193	96,392	11.1
Financial, Insurance and Real Estate	85	10%	8	2,548	0.3
Services	326	50%	163	48,956	5.6
Total	**-**	**-**	**876**	**417,191**	**46.5**

Source: The Benkendorf Associates Corp. and Hobson Johnson & Associates

Note: Only 37% of all government jobs are captured in the land use categories in the table; the remainder are assumed to locate on public land

**Table IV.10b Projection of Land Required by Employment Sector
La Grande Urban Area, 2000-2020
Scenario B**

Land Use and Industry Type	New Jobs 2000-2020	Capture Factor	New Jobs 2000-2020 (adjusted)	Floor Area Required (sq. ft.)	Land Required (net acres)
Industrial	**-**	**-**	**457**	**389,040**	**44.7**
Manufacturing	108	85%	92	69,124	7.9
Construction and Mining	83	60%	50	37,534	4.3
Transportation, Communication and Public Utilities	58	60%	35	49,044	5.6
Wholesale Trade	75	85%	64	70,188	8.1
Retail Trade	409	10%	41	102,175	11.7
Financial, Insurance and Real Estate	158	10%	16	5,547	0.6
Services	609	25%	152	53,277	6.1
Government	359	2%	7	2,152	0.2
Office	**-**	**-**	**491**	**111,604**	**10.2**
Manufacturing	108	15%	16	3,660	0.3
Construction and Mining	83	40%	33	7,507	0.7
Transportation, Communication and Public Utilities	58	30%	18	4,379	0.4
Wholesale Trade	75	15%	11	2,534	0.2
Retail Trade	409	2%	8	1,839	0.2
Financial, Insurance and Real Estate	158	80%	127	28,526	2.6
Services	609	25%	152	38,055	3.5
Government	359	35%	126	25,106	2.3

**Table IV.10b Projection of Land Required by Employment Sector
La Grande Urban Area, 2000-2020
Scenario B (Continued)**

Land Use and Industry Type	New Jobs 2000-2020	Capture Factor	New Jobs 2000-2020 (adjusted)	Floor Area Required (sq. ft.)	Land Required (net acres)
Retail	**-**	**-**	**686**	**277,665**	**31.9**
Transportation, Communication and Public Utilities	58	10%	6	1,752	0.2
Retail Trade	409	88%	360	179,828	20.6
Financial, Insurance and Real Estate	158	10%	16	4,754	0.5
Services	609	50%	304	91,332	10.5
Total	**-**	**-**	**1,634**	**778,310**	**86.8**

Source: The Benkendorf Associates Corp. and Hobson Johnson & Associates

Note: Only 37% of all government jobs are captured in the land use categories in the table; the remainder are assumed to locate on public land

As shown in Table IV-10a, a total of 23.9 net acres of industrial land, 5.5 net acres of office land and 17.1 net acres of retail land, for a total of 46.5 net acres of non-residential land is estimated to be needed over the next 20 years in the La Grande Urban Area in Scenario A. This table only takes into account land needs for 37 percent (2 percent in industrial space and 35 percent in office space) of government employment. The remainder is assumed to be located on the land zoned for public facilities and community services (PF Zone).

A total of 44.7 net acres of industrial land, 10.2 net acres of office land and 31.9 net acres of retail land, for a total of 86.8 net acres of non-residential land is estimated to be needed over the next 20 years in the La Grande Urban Area in Scenario B. Again, this table only takes into account land needs for 37 percent (2 percent in industrial space and 35 percent in office space) of government employment.

Tables IV.11a and IV.11b provides a summary of land needs for industrial, office, and retail land. The job growth and the net acreage figures are from Tables IV.10a and IV.10b. The jobs/net acre figure is calculated based on these figures. A standard vacancy rate of 10 percent has been applied to all new employment land needs.

**Table IV.11a Employment Land Needs-2020, La Grande Urban Area
Scenario A**

	Industrial	Office	Retail	Total
Job growth	245	263	368	876
Jobs/net acre	10.2	47.9	21.5	18.8
Preliminary buildable acres (net) needed by 2020	23.9	5.5	17.1	46.5
Vacancy rate	10%	10%	10%	10%
Total net buildable acres needed by 2020	**26.3**	**6.0**	**18.8**	**51.2**

Note: figures may not add due to rounding. Source: The Benkendorf Associates Corp.

Table IV.11b Employment Land Needs-2020, La Grande Urban Area
Scenario B

	Industrial	Office	Retail	Total
Job growth	457	491	686	1,634
Jobs/net acre	10.2	47.9	21.5	18.8
Preliminary buildable acres (net) needed by 2020	44.7	10.2	31.9	86.8
Vacancy rate	10%	10%	10%	10%
Total net buildable acres needed by 2020	**49.1**	**11.3**	**35.1**	**95.5**

Note: Figures may not add due to rounding.
Source: The Benkendorf Associates Corp.

As shown in Table IV-11a, a total of 26.3 net buildable acres of industrial land, 6.0 net buildable acres of office land and 18.8 net buildable acres of retail land (for a total of 24.8 net acres of commercial land) are projected to be needed for new employment needs in La Grande in 2020 in Scenario A, taking into account structural vacancy.

As shown in Table IV-11b, a total of 49.1 net buildable acres of industrial land, 11.3 net buildable acres of office land and 35.1 net buildable acres of retail land (for a total of 46.4 net acres of commercial land) are projected to be needed for new employment needs in La Grande in 2020 in Scenario B, taking into account structural vacancy.

V. 20 year land need compared to vacant buildable land

This section compares the mix of projected housing types to the mix of existing development; compares projected residential density to existing residential density; compares 20-year land need to land availability; and discusses whether any measures are required to meet housing mix or density projections, or to provide for additional land to address the residential, commercial, and industrial land needs for the next 20 years for the La Grande Urban Area.

A. Comparison of the existing housing mix with the projected housing mix.

Table V.1 below compares the current housing mix to the projected needed housing mix.

Table V.1 Existing and Projected Residential Mix

	1990 Housing (1)	Existing Housing (2000) (2)	Recent Housing Construction Only (1990-2000) (3)	Projected New Needed Housing Scenario A (2000-2020) (4)	Projected New Needed Housing Scenario B (2000-2020) (5)					
Housing type	**Units**	**Mix**	**Units**	**Mix**	**Units**	**Mix**	**Units**	**Mix**	**Units**	**Mix**
Single-family detached and attached	3,165	64.4%	3,565	65.7%	400	77.7%	288	53.7%	786	53.7%
Single-family detached	3,005	61.2%	n/a	n/a	n/a	n/a	267	49.9%	731	49.9%
Single-family attached	160	3.3%	n/a	n/a	n/a	n/a	20	3.8%	55	3.8%

Table V.1 Existing and Projected Residential Mix (Continued)

Multi-family units	1,387	28.2%	1,468	27.0%	81	15.7%	124	23.1%	339	23.1%
Manufactured homes in parks	306	6.2%	340	6.3%	34	6.6%	124	23.2%	340	23.2%
Other	54	1.1%	54	1.0%	0	0.0%	n/a	n/a	n/a	n/a
Total	**4,912**	**100.0%**	**5,427**	**100.0%**	**515**	**100.0 %**	**536**	**100.0 %**	**1,464**	**100.0 %**

(1) From Table III.6
(2) From Table II.2
(3) From Table II.2
(4) From Table III.13a
(4) From Table III.13b

As shown in Table V.1 above, the projected new housing mix is roughly equivalent to the existing (2000) housing mix. A higher percentage of manufactured homes are projected to be needed to meet housing demand. Single-family detached homes and multi-family units are projected to be needed at lower rates.

B. Comparison of the existing net density for specific housing types with the needed net density ranges.

Table V.2 below compares the current housing density to the projected density for new housing. The existing housing density and recent housing development density (1990-2000) in the City of La Grande was obtained from Tables II.3 and II.4. Projected density figures were obtained from Tables III.15a and III.15b.

Table V.2 Existing and Projected Residential Mix

Housing Type	Existing Density (2000)	Recent Density (1990-2000)	Maximum Allowed Density (Current Zoning Districts)	Projected Density for New Housing (2000-2020)
Single-family detached	5.7	4.9	HD Zone: 1.00; RR-1 Zone: 2.16; R-1 Zone: 5.00; R-2 Zone: 6.20; R-3 Zone: 8.71; R-P Zone: 8.71	4.0
Single-family attached	11.7	10.0	R-2, R-3 and R-P Zones: 14.52	8.0
Multi-family units	12.9	n/a	R-3 Zone: 18.67 for triplex, 31.11 for ten-plex	11.0
Manufactured homes in parks	9.0	n/a	R-2 Zone: 5.00; R-3 Zone: 8.71	5.0
Total	**6.0**	**n/a**		**5.1**

Source: The Benkendorf Associates Corp.

As shown in Table V.2 above, the projected housing densities for new housing are less than existing housing densities and recent housing densities. As discussed previously, the projected housing densities were provided by City of La Grande Staff, based on current development activity.

C. Comparison of net buildable acreage needed to net buildable acreage available

Table V.3 below shows the assumptions used to calculate the number of potential residential units on the net buildable acreage figures by zoning district shown in Table I.6. The density ranges are from Table V.2 above. The calculations make the following assumptions regarding housing types for each zone:

1. 100 percent of the parcels in the HD, RR-1, and R-1 zones will develop as single-family detached units;

2. 60 percent of the land in the R-2 zone will develop as single-family detached units, 5 percent will develop as single-family attached units, 5 percent will develop as multi-family units (duplexes), and 30 percent will develop as manufactured home park units;

3. 80 percent of the land in the R-3 zone will develop as multi-family units and 20 percent will develop as manufactured home park units; and

4. 10 percent of the land in the R-P zone will develop as single-family detached units, 10 percent will develop as single-family attached units, and 80 percent will develop as multi-family units (30% as duplexes and 50% as other multi-family units).

Table V.3 Projected Residential Units on Net Buildable Land

Residential Zone		Net build-able acreage	Density (DU/acre) and residential type (percentage)	Potential Residential Units Single-family detached	Single-family attached	Multi-family	Manu-factured homes	Total units
Hillside Development Residential	HD	8.5	1.0 - single-family detached	8	n/a	n/a	n/a	8
Rural Residential	RR-1	26.4	2.0 - single-family detached	53	n/a	n/a	n/a	53
Low Density Residential	R-1	120.4	4.0 - single-family detached	481	n/a	n/a	n/a	481
Medium Density Residential	R-2	150.3	4.0 - single-family detached (60%); 8.0 - single-family attached (5%); 11.0 - multi-family (duplex) (5%); 5.0 - manufactured home parks (30%)	361	60	83	226	730
High Density Residential	R-3	25.8	11.0 - multi-family (80%), 5.0 - manufactured home parks (20%)	n/a	n/a	227	26	253
Residential-Professional	R-P	0.6	4.0 - single-family detached (10%); 8.0 - single-family attached (10%); 11.0 - multi-family (duplex) (80% - 30% duplex, 50% other)	0	1	6	n/a	7
Total		**332.0**		**903**	**61**	**316**	**252**	**1,532**

Source: The Benkendorf Associates Corp.

As shown in Table V.3 above, a total of 1,532 units are estimated to be able to be built on the 332.0 net acres of buildable residential land, for an overall density of 4.61 units per net acre.

Tables V.4a and V.4b below show needed residential units and acreage compared to available land and potential units for the 2000-2020 time period.

Table V.4a Projected Additional Needed Residential Acreage
Scenario A

Type of unit	Net Acreage Needed (1)	Allocated Units (1)	Net Buildable Acreage Available (2)	Potential Units on Net Buildable Acreage (3)	Deficit (Surplus) of Units	Additional Acreage Needed
Single-family detached	66.8	267	298.4	903	(636)	-
Single-family attached	2.5	20	7.8	61	(41)	-
Multi-family	11.3	124	7.7	316	(192)	-
Manufactured homes in parks	24.9	124	18.0	252	(128)	-
Total	**105.5**	**536**	**332.0**	**1,532**	**(996)**	-

(1) From Table III.15a
(2) From Table I.6
(3) From Table V.3

Table V.4b Projected Additional Needed Residential Acreage
Scenario B

Type of unit	Net Acreage Needed (1)	Allocated Units (1)	Net Buildable Acreage Available (2)	Potential Units on Net Buildable Acreage (3)	Deficit (Surplus) of Units	Additional Needed Acreage
Single-family detached	182.7	731	298.4	903	(172)	-
Single-family attached	6.9	55	7.8	61	(6)	-
Multi-family	30.8	339	7.7	316	23	2.1
Manufactured homes in parks	67.9	340	18.0	252	88	17.5
Total	**288.3**	**1,464**	**332.0**	**1,532**	**(68)**	-

(1) From Table III.15b
(2) From Table I.6
(3) From Table V.3

As shown in Table V.4a above, under Scenario A, there are 105.5 acres of net buildable residential land projected to be needed for 536 units. There are 332.0 acres of net

buildable residential land available with a total potential of 1,532 units based on current zoning and density projections. Overall, there is a surplus capacity of 996 units.

As discussed previously and shown in Table III.3a, Scenario A is based on a projected annual average growth rate (AAGR) of 0.39 percent for population for the twenty-year planning period from 2000 to 2020. The number of housing units in La Grande increased by 515 from 1990 to 2000 (see Tables II.2 and V.1), an AAGR of 1.0 percent, while population grew at a 1.02% AAGR from 1990 to 2000 (based on 1990 Census figures and 2000 PSU figures, see Table III.2). Scenario A, based on the official state population forecast for Union County, does not take these recent growth rates into account.

Scenario B is based on an AAGR of 1.0 percent that mirrors actual growth rates in La Grande from 1990 to 2000. Under Scenario B, there are 288.3 acres of net buildable residential land projected to be needed for 1,464 units. There are 332.0 acres of net buildable residential land available with a total potential of 1,532 units based on current zoning and density projections. Overall, there is a surplus capacity of 68 units. However, there is a projected deficit of 23 multi-family units and 88 manufactured home units based on current zoning. These units would require 2.1 acres and 17.5 acres of vacant buildable land, respectively, based on the density assumptions (11.0 and 5.0 units/acre), for a total of 19.6 acres.

The City has a desire to provide residential areas with 1-acre lot sizes to attract higher-end residential communities. The City feels that it is losing out on this market to other communities in the region that offer this housing type. The provision of 1-acre lots is not reflected in the analysis above and could require additional land beyond that shown in the analysis unless compensated for by increasing densities elsewhere.

Table V.5 below shows the comparison of net buildable acreage needed to net buildable acreage available in the La Grande Urban Area for commercial and industrial land for the next twenty years.

Table V.5 Projected Additional Needed Commercial and Industrial Acreage

Zone		Net Buildable Acreage Available (1)	Net Buildable Acreage Needed Scenario A (2)	Net Buildable Acreage Needed Scenario B (3)	Deficit (Surplus) of Net Buildable Acreage Scenario A	Deficit (Surplus) of Net Buildable Acreage Scenario B
Commercial						
General Commercial	GC	35.7	-	-	-	-
Central Business	CB	0.0	-	-	-	-
Interchange Commercial	IC	0.7	-	-	-	-
Total Commercial		**36.4**	**24.8**	**46.3**	**(11.6)**	**9.9**

Table V.5 Projected Additional Needed Commercial and Industrial Acreage (Continued)

Industrial		-	-	-		
Light Industrial	M-1	1.0	-	-	-	-
Heavy Industrial	M-2	59.2	-	-	-	-
Total Industrial		**60.2**	**26.3**	**49.1**	**(33.9)**	**(11.1)**
TOTAL		**96.7**	**51.2**	**95.5**	**(45.5)**	**(1.2)**

(1) From Table I.6
(2) From Table IV.11a
(3) From Table IV.11b

As shown in Table V.5, in Scenario A, there are surpluses of both commercial and industrial land (11.6 and 33.9 net buildable acres, respectively). Scenario B shows a deficit of 9.9 acres of commercial land and a surplus of 11.1 acres of industrial land.

The figures above are based on land demand that is strictly accounted for in employment projections. However, this does not account for the ability of La Grande to compete successfully against other communities in the region for large-scale commercial and industrial projects that require large sites. As shown in Table I.3, there is only one commercially-zoned site that has more than 10 acres of gross buildable area (Parcel #3S38.9CC/101 with 12.12 acres) and only one additional site with more than 5 acres of gross buildable area (Parcel #3S38.9CD/100 with 5.22 acres). As shown in Table I.3, there is only one industrially-zoned site that has more than 30 acres of gross buildable area (Parcel #3S38.16/500 with 36.72 acres of gross buildable area) and only four additional sites with more than 5 acres of gross buildable area (Parcel #3S38.16/600 (10.76 acres), Parcel #3S38.16/690 (11.64 acres), Parcel #3S38.16AD/101 (5.10 acres), and Parcel #3S38.16AD/100 (10.87 acres)).

In order to have the potential to attract large-scale commercial or industrial operations, La Grande requires additional commercial and industrial land beyond what is strictly indicated by the employment forecast. The additional land should allow for large-scale commercial development and industrial development. Under current conditions, potential large-scale commercial and industrial facilities will need to "assemble" a site, which is costly and time-consuming. If companies can find a suitable development site in another City in this region, they will likely chose it over a redevelopment site in La Grande. Unfortunately, a surplus land condition exists in at least two (2) cities in this region that received Urban Growth Boundary acknowledgement several years before La Grande. La Grande's relatively tight land supply makes it difficult to compete with these "land rich" communities.

Table V.6 below shows the total gross acreage needs for commercial and industrial land, with the addition of the potential for large-scale commercial and industrial development to the net land needs shown in Table V.5.

Table V.6 Gross Needed Commercial and Industrial Acreage, Including Large Sites

Zone	Scenario A Deficit (Surplus) of Net Buildable Acreage (1)	Scenario B Converted to Gross Acreage (2)	Additional Gross Acreage Needed for Large Sites	Total Gross Acreage Needed	Deficit (Surplus) of Net Buildable Acreage (1)	Converted to Gross Acreage (2)	Additional Gross Acreage Needed for Large Sites	Total Gross Acreage Needed
Total Commercial	(11.6)	(14.5)	80.0	65.5	9.9	12.4	80.0	92.4
Total Industrial	(33.9)	(42.4)	160.0	117.6	(11.1)	(13.9)	160.0	146.1
Total Non-Residential	**(45.5)**	**(56.9)**	**240.0**	**183.1**	**(1.2)**	**(1.5)**	**240.0**	**238.5**

(1) From Table V.5
(2) Net acreage plus 25%

As shown in Table V.6 above, if these large tracts of commercial and industrial land can be justified in the future Scenario A requires 65.5 additional gross acres of commercial land and 117.6 additional gross acres of industrial land within the UGB, for a total of 183.1 acres of non-residential land. Scenario B requires 92.4 additional gross acres of commercial land and 146.1 additional gross acres of industrial land within the UGB, for a total of 238.5 acres of non-residential land. Again, the City recognizes that further research, analysis and coordination with DLCD and OEA will need to occur before such large scale commercial or industrial lands could be added to the Urban Growth Boundary.

Policies –

1. The City recognizes that public interest requires that every citizen be given the opportunity to provide themselves with safe, sanitary and adequate housing.

2. That an adequate housing supply will be encouraged through development of new dwelling units, maintenance or rehabilitation of existing units, and removal of dwelling units unsuitable for rehabilitation.

3. That all types of residential units, including mobile home. modular and manufactured units, are acceptable resources of housing and that recognition will be reflected in zoning, building codes and other regulatory means without compromising quality standards.

4. That quality residential environments will be assured by considering safety, health, design, provision of services and overall ecology in the area.

5. The City will exercise primary governmental control in any housing activities which occur within the City limits, including those activities undertaken or assisted by other governmental organizations.

6. The City will assertively develop and use effective techniques to assure that its housing policies are implemented and administered.

7. A mix of low and moderate cost housing should be encouraged, but an undue concentration in nay area should be avoided.

8. That medium density residential be located away from activities which generate heavy traffic and are otherwise incompatible with living areas.

9. That medium density residential areas be located with reference to shopping and other public and private services and be provided with good access to centers of employment.

10. That planned developments and duplexes be included in medium density residential areas provided the density does not exceed 10 units per gross acre.

11. That high density residential areas be located in such a manner as to be provided with good access to arterial streets, shopping facilities, schools, and major employment centers.

12. That high density development be located so that traffic generated by the high density development will not be required to travel through areas of lesser density en route to principal community facilities.

13. That high density development be located in areas where municipal utility facilities economically can be provided at a level adequate to meet the demand for the concentrated service.

14. That the street pattern within the residential neighborhood permits convenient circulation and easy, safe access to neighborhood parks and schools.

15. That residential areas be developed in a manner that provides a healthful, aesthetically pleasing atmosphere, and in a manner that affords safe and convenient access to neighborhood commercial centers, schools, and other public facilities.

16. That certain non-residential uses be located within residential areas if careful control is exercised over their location and their relationship to abutting property.

Recommendations –

1. The City encourage development of residential units in an amount and variety sufficient to accommodate a wide range of taste and income levels.

2. The City work cooperatively with private developers and investors to solve the problem of development of suitable housing for low income levels.

3. The City protect residential property values from depreciating influences consistent with overall objectives of the Comprehensive Plan.

4. "Planned unit developments" and other innovative design and development techniques should be encouraged to provide freedom in land development and assist in achieving land use plan objectives.

5. The City should review and process applications promptly and expeditiously so as to not unnecessarily impede developmental processes.

6. Provision should be made for the satisfactory accommodation of off-site built housing within the City.

7. The Land Development Code should allow for the location of manufactured homes within the City on residential lots and manufactured homes in manufactured home parks, providing certain conditions are met as stipulated in the Land Development Code.

8. The Land Development Code should provide for the location of certain non-residential uses, subject to conditions that would serve to preserve the residential character of the neighborhood.

9. That high density residential areas be used as a transitional use between certain commercial areas and medium density residential uses.

10. High density areas be encouraged around existing and proposed major commercial areas and near the Eastern Oregon University campus.

11. The City's zoning ordinance should be revised to reflect the residential density established by the land use plan and more than 2 residential zones should be provided for.

12. Residential development in most of the City should be planned at a density of between 5 and 10 dwelling units per net acre.

13. Provisions for planned high density residential developments should be included in the zoning ordinance in the high density zone, to provide for greater freedom in development than that permitted by strict interpretation of the zoning ordinance requirements.

14. Ensure that residential development meets projected densities. Projected densities have been set low to correspond with recent development patterns, but the City should still examine measures to encourage residential densities to approach the maximum allowed in each zone.

15. Ensure that the R-3 zone does not develop with single-family units and that the R-2 zone does not develop with more than the assumed 60 percent of land devoted to single-family detached units. The assumptions of the number of multi-family and manufactured home units that could develop on vacant R-2 and R-3 zoned sites are dependent on the mix of land devoted to each housing type shown in Table V.3.

16. Rezone some R-2 land to R-3 to allow for additional multi-family units and manufactured home units, or take steps to encourage greater production of manufactured home parks and/or multi-family units on R-2-zoned land. Scenario B shows a shortfall of a total of 2.1 acres of land for multi-family development and 17.5 acres of land for manufactured home units.

17. Encourage the development of residential areas designed to attract higher-end residential uses as may be desired by “footloose” entrepreneurs, high-income retirees and others.

18. Conduct a study to determine feasibility of adding large sites to the Urban Growth Boundary for industrial and commercial uses under Scenario A. The first phase of this study should be a Target Industries Analysis.

19. If large-lot commercial or industrial lands can be justified after further study, said lands shall be protected by large-lot zoning to ensure that such lands are not subdivided down to sizes that preclude the type of land uses being sought.

20. Upon acceptance of the one percent (1%) growth rate by the Office of Economic Analysis, add land to the Urban Growth Boundary or convert other lands for commercial uses. The new land areas should allow for large-scale commercial development.

21. Upon acceptance of the one percent (1%) growth rate by the Office of Economic Analysis, add land to the Urban Growth Boundary or convert other lands for industrial uses. The new land areas should allow for large-scale industrial development.

Statewide Planning Goal 11 - Public Facilities and Services

I. Introduction

The City of La Grande's Public Facilities Plan presents and directs the management of existing public facilities, as well as the design and implementation of future public facilities for the 20 year planning period. This Public Facilities Plan constitutes the public facilities and services element of the City of La Grande's Comprehensive Plan, and satisfies the requirements of Statewide Planning Goal 11 Public Facilities and Services.

The City of La Grande is located in northeastern Oregon's Union County, near the Umatilla National Forest and at the western entrance to the Grande Ronde Valley. The La Grande area is known for its striking landscape and outdoor recreational opportunities. According to the year 2000 Portland State University (PSU) estimate, the City has a population of 13,015, 14,015 including the City's Urban Growth Boundary (UGB). The facilities outlined in the Master Plan have been designed to be consistent with the population forecasts in the City's Comprehensive Plan. While La Grande is a close knit community, the City also has close ties with nearby Island City, which abuts La Grande's UGB. Located on Interstate 84, approximately 55 miles southeast of Pendleton, Oregon and 44 miles northwest of Baker City, Oregon, the City provides a variety of shopping, residential, recreational and employment opportunities within its Urban Growth Boundary and for residents of the surrounding area. Eastern Oregon University, one of eight public, four year colleges and universities in Oregon, is located in La Grande. The majority of non-agricultural jobs are concentrated in the industrial/manufacturing sector, the wholesale and retail sector, and the service sector. The rate of unemployment in La Grande is relatively low, thereby contributing to the area's stable economy.

A. Sources of Information

The sources of information that were used in this Public Facilities Plan include: The City of La Grande, Oregon 1998 Water System Master Plan, Anderson Perry & Associates, Inc.; City of La Grande 1983 (1999 revised) Comprehensive Plan; The September 1999 La Grande/Island City Transportation System Plan by McKeever/Morris, Inc., and David Evans and Associates, Inc.; The City of La Grande, Oregon 1998 Surface Water Management Plan by Anderson Perry & Associates, Inc.; The City of La Grande, Oregon 1998 Wastewater Facilities Plan by Anderson Perry & Associates, Inc.; La Grande Storm Sewer System Development Charge, Ordinance Number 2974, Series 2001; La Grande Ordinance 2708, Series 1985; La Grande Resolution Number 4155, Series 1992; La Grande Resolution Number 4356, Series 2000; La Grande Resolution Number 4339, Series 2000; La Grande Resolution Number 4338, Series 2000; The Department of Land Conservation and Development's (DLCD) Oregon Administrative Rules Chapter 660 Compilation, 1998 Edition; and Oregon's Statewide Planning Goals & Guidelines, 1995 Edition.

B. Policy Statements

In the Statewide Planning Goals for the State of Oregon, the purpose of Goal 11 Public Facilities and Services is to "plan and develop a timely, orderly and efficient arrangement of public facilities and services to serve as a framework for urban and rural development." The Public Facilities Plan complies with Statewide Planning Goal 11.

In Division 11, Public Facilities Planning, of DLCD's Oregon Administrative Rules Chapter 600, 1998 Edition, a "Public Facilities Plan" is described as being a "support document or documents to a comprehensive plan. The public facility plan describes the water, sewer and transportation facilities which are to support the land uses designated in the appropriate acknowledged comprehensive plans within an urban growth boundary containing a population greater than 2,500. Certain elements of the Public Facility Plan shall be adopted as part of the comprehensive plan as specified in OAR 660-11-045." Please refer to Section 660-11-0005 of DLCD's Oregon Administrative Rules Chapter 600, 1998 Edition, for definitions (2) through (10) of the required systems and terms for a public facilities plan. Section 660-11-0010 of the same State of Oregon document lists the required items that must be included in a Public Facilities Plan.

The following are a list of policies to be incorporated into the City's Comprehensive Plan.

1. The City of La Grande will continue to provide and maintain urban services (water, sewer, storm drainage, services and transportation infrastructure) to residential, commercial and industrial lands within the City's Urban Growth Area prior to or concurrent with development and following annexation.

2. The City will require urban development to be served by urban services.

3. That the capacity for supplying sewer and water service not be so committed to development outside the City Limits that development within the City Limits is limited.

4. That municipal services will not be planned for nor provided outside of the Urban Growth Boundary (UGB) with the following exceptions: 1) The industrial park northeast of Island City; 2) Land designed for industrial uses near the La Grande Airport; and 3) Water or sewer services provided by agreement with the City of Island City or the Island City Area Sanitation District.

5. The City will prioritize development of land serviced by utilities and require the extension of water, sewer and storm drainage facilities for all urban level development within the UGB.

6. That underground installation of utilities be encouraged on all new development.

7. The City will coordinate the extension of public services with other service providers, including Union County, La Grande School District 1 and other utility service providers.

8. The City will ensure that no new wastewater facilities, included constructed wetlands, will be located within a 5,000 lineal foot radius of the Union County Airport or within 10,000 lineal feet unless the appropriate bird strike hazard study is completed and approved.

9. The City will adopt, periodically review and update long range master plans for its water, sewer, storm drainage and transportation systems.

10. The City will comply with state and federal regulations for utility systems.

11. That the cost for public services and street improvements for land being converted to urban uses be borne by the developer.

12. The City will monitor the condition of water, sewer, storm drainage and transportation infrastructure and finance regular maintenance of these facilities.

13. The City will establish and maintain utility rates and user fees that equitably allocate costs for operations and maintenance to users.

14. The City will maintain a 5 year supply of commercial and industrial land that is serviceable by water, sewer, storm drainage and transportation infrastructure.

15. The City will protect its water supply by: establishing wellhead protection measures; working with landowners and managers for protection of water sources; adhering to applicable permitting requirements when approving new residential, commercial and industrial development and when constructing new water, sewer, storm drainage and transportation infrastructure.

16. The City will establish standards for storm drainage detention and management facilities and encourage wherever feasible natural storm drainage management techniques, such as detention basins, landscaping, retention ponds and natural drainage ways.

17. The City will take steps to minimize adverse impacts from construction and other sources of erosion and sedimentation on natural drainage ways and storm drainage facilities.

18. The City shall continue to regulate solid waste removal in the La Grande area through franchise agreement.

19. The City shall cooperate and facilitate the operation of a landfill site for solid waste as necessary with Union County and the landfill operator.

20. The City will cooperate with the Oregon Department of Transportation in implementing its improvement program.

21. In order to comply with the 1999 Oregon Highway Plan, the City will apply the Access Management Standards as presented in Appendix C to its transportation system wherever necessary.

22. The City will comply with Policy 1F, Highway Mobility Standards, of the 1999 Oregon Highway Plan which states: "It is the policy of the State of Oregon to use highway mobility standards to maintain acceptable and reliable levels of mobility on the state highway system. These standards shall be used for: Identifying state highway mobility performance expectations for planning and plan implementation; Evaluating the impacts on the state highways of amendments to transportation plans, acknowledged comprehensive plans and land use regulations pursuant to the Transportation Planning Rule (OAR 660-12-060); and Guiding operations decisions such as managing access and traffic control systems to maintain acceptable highway performance.

23. The City of La Grande supports the operation and development of the La Grande – Union County Airport as set forth in the Airport Master Plan Update of July, 1998. Should the La Grande Urban Growth Boundary be expanded in the future to territory beneath the Airport's imaginary surfaces, the City will take steps to comply with OAR 660, Division 13 (Airport Planning).

C. Service Agreements

The City of La Grande provides cost efficient sewer and water service to its residents, and maintains several service agreements with neighboring areas and businesses. For disposal of the City's solid waste, La Grande has a franchise with City Garbage Collectors for both residential and commercial operations. Both the City and the franchise holders operate within Union County's Solid Waste Service District. The present sanitary sewer collection system serves the entire City and UGB, as well as the Island City Area Sanitation District (ICASD). Treatment of the ICASD sewage is provided at the City of La Grande's upgraded Wastewater Treatment Plant by way of agreement which establishes treatment rates and flows, or approximately 10 percent of the total operating costs. In addition, while the City provides water service for community members inside the City Limits and UGB, it also serves the Baum Industrial Park and the Airport Industrial Park. The City receives its electric service from the Oregon Trail Electric Cooperative. All Urban Service Agreements with the aforementioned municipalities were recently reviewed and it was therefore concluded that there is no need to revise or change the agreements at this time.

II Water System

A. Sources

The City's existing water supply system consists of five wells: two basalt wells and three alluvial wells. The water from the five wells is described as being of good quality, although taste and odor problems have been repeatedly reported as occurring in the distribution system. The problems with the taste and odor of the water may be caused by bacteriological growth within the distribution system; however, these

claims have not been scientifically substantiated. La Grande's water supply includes the following sources and areas to which the City holds the water rights.

Beaver Creek Watershed. In the Fall of 1992, the Beaver Creek Watershed water supply was placed into a reserved status after completion of the La Grande Twelfth Street Well pumping station. The reason for placing the Beaver Creek Watershed in reserve status was to bring it into compliance with the Safe Drinking Water Act, which requires this water supply source to have some type of filtration system prior to being incorporated into the jurisdiction's water system. The City of La Grande has entered into an agreement with the U.S. Forest Service concerning the Beaver Creek Watershed and its reserved status. Since 1992, the City has occasionally utilized the reserved watershed for the purpose of running a slow sand filter pilot study, as well as for other related demonstrations. According to the City's 1998 Water System Master Plan, the City has proceeded to maintain and protect its physical improvements in the watershed. Continued debate concerning the watershed has occurred as the U.S. Forest Service has developed its comprehensive plan for the watershed considering fire suppression and logging in the watershed. As a result, there will be ongoing discussions as protection and use of the watershed is further reviewed.

Wells. The City's present water supply consists of five (5) operational wells. Two (2) of these wells are comprised of deep basalt and are known as the Second Street and "H" Avenue Well, and the Twelfth Street Well. The other three (3) wells are alluvial wells and are known as the Gekeler Well, the Island City Well and the Highway 30 Well. Please refer to Figure U8-2 in the 1998 Master Plan Update for the location of these wells. As mentioned above, the water quality of the wells has typically been described as good.

- Second Street and "H" Avenue Well. This Well has been a primary water source for the City since 1984 when it was placed into operation. When the Well was placed into operation in 1984, it had a shut-in artesian pressure of 72 psi and an artesian flow of approximately 2,000 gallons per minute. As the water has gradually been withdrawn from the Well, the shut-in pressure of the Well has decreased, thereby reducing the flow from the Well. In 1997, the shut-in pressure from the Well dropped to 29 psi, and rose slightly to 31 psi in 2001. This is an indication that the static water level may be stabilizing. However, it is much too early to determine whether this trend will continue. It was concluded in the 1998 Water System Master Plan that continued reliance on this Well as a primary water source cannot proceed, as water is being removed from the aquifer at a greater rate than it is being replenished. Therefore, it has since been recommended that the City limit its use of this well and establish a withdrawal rate that can be sustained by natural recharge of the aquifer.

- Twelfth Street Well. Constructed in 1991, this Well is located to the west of Twelfth Street and north of Gekeler Lane. The Twelfth Street Well has a depth of 2,436 feet and is constructed in the deep basalt aquifer that lies underneath the City. At the time the Well was constructed it had an artesian flow of 2,600 gallons per minute and a shut-in pressure of 72½ psi. The overall quality of the water is very good; however, there have been instances when a hydrogen sulfide odor is detectable. The Well has been used as a primary water supply source

since it became operational in 1992. The Twelfth Street Well has experienced a moderate decline in the artesian shut-in pressure, similar to that observed in the Second Street and "H" Avenue Well. In 1997 the Well's shut-in pressure changed from 72½ psi to 53 psi; a year later the recorded shut-in pressure was 55 psi. It is too early to determine if the static water level will stabilize near 48 psi or continue to decline.

While the decline in the shut-in pressure of the Twelfth Street Well is not as dramatic as the one observed in the Second Street and "H" Avenue Well, it is clear that continued reliance on these two basalt wells as primary water supply sources for the City is not possible due to the fact that the water being removed from the aquifer is occurring at a faster rate than it is being replaced.

- Gekeler Well. This Well has a pumping capacity of approximately 1,350 gallons per minute with good water quality.

- Island City Well. The Island City Well is an alluvial well and has a pumping capacity of approximately 1,400 gallons per minute. Although this Well is reliable, it creates water quality problems when it is turned off for extended periods of time. When the Well is fully operational, water quality problems do not exist.

- Highway 30 Well. The Highway 30 Well and pump station was completed and brought on-line in the Fall of 2000. It is a 550 foot deep alluvial well, equipped with a 250 Hp pump and motor which produces 1,850 GPM. A 12" transmission line connects this Well to the 16" transmission line, which is located along Highway 30. The City reports that the water quality from this Well is good.

- Other Wells. "As outlined in the 1990 Master Plan (City of La Grande), there are two (2) other City-owned basalt wells located near the City Shops. The status of these wells is the same as existed in the 1990 Master Plan. These wells have not been utilized for a number of years. Additionally, Railroad Well Number 2, which was once used by the City, is currently not available to the City because the Union Pacific Railroad now has full jurisdiction over this well." (1998 City of La Grande Water System Master Plan, Anderson Perry & Associates)

B. Disinfection System

In 1995, the City installed hypochlorinators on each of the water sources and at the booster pump station which pumps up to the 8 MG reservoir, in order to maintain a chlorine residual within the distribution system. A process of chlorination has also been utilized in order to help reduce the periodic bacterial problems in the distribution system and to minimize water quality complaints among system users. Water quality tests from each of the wells have not revealed any water quality problems from the actual water sources.

C. Storage System

There are three reservoirs located in various parts of La Grande that provide storage for the City's water; two are currently operational, while the remaining reservoir is not in use at the present time. The two reservoirs that are currently being used are: the 8 MG high level reservoir, constructed in 1968, and the 3.5 MG low level reservoir, constructed in the 1930s. The third reservoir, which is presently not in use, is a 0.5 MG underground tank that is located in the City's Public Works shop facility.

High Level Reservoir. The high level reservoir has a capacity of 8 million gallons, thereby allowing it to serve as the City's major storage reservoir. In the 1990 City of La Grande Water System Master Plan, the City Staff reported this reservoir as being in excellent condition and requiring only periodic cleaning on the maintenance schedule. The high level 8 MG reservoir was ideally located when the City was using the Beaver Creek water supply system. However, since the watershed has been put in reserve status, the 8 MG reservoir piping has been reconfigured in order to receive all of its water from two 1,000 gpm booster pumps located at the 3.5 MG reservoir. The 8 MG reservoir is situated at a relatively high elevation, thereby requiring excessive electrical energy to operate the pumps in order to get the well water into the reservoir. When water flows out of the 8 MG reservoir a large amount of energy is wasted through the pressure reducing stations. This wasted energy certainly contributes to higher than desirable operating costs. Yet, the 8 MG reservoir is very important to the City's water system as it provides the majority of the emergency and fire storage for the system. In addition, the 8 MG reservoir supplies water to the system's high level distribution zones through pressure reducing valves.

3.5 MG Reservoir. According to the 1990 City of La Grande Water System Master Plan, the City Staff notes that this reservoir is in good condition and should not require major repairs/maintenance in the near future. The City Staff also reported several small cracks in the floor slab of the reservoir, although these repairs are easily managed and inexpensive. A 12" diameter outlet line from the 8 MG high level reservoir feeds into a high level distribution system. Water is supplied to the Low Level Distribution System piping from the 3.5 MG reservoir through an 18" transmission line and from the City Wells. The 3.5 MG reservoir can also be filled directly with water from the Second Street and "H" Street Well via a 14" transmission line. The Twelfth Street Well, Gekeler Well, Highway 30 Well and Island City Well pump into the distribution system and when demands are less than the supply, the excess water flows into the 3.5 MG reservoir.

0.5 MG Reservoir. This reservoir is an underground, covered, reinforced concrete storage facility located by the City Shops. The 0.5 MG reservoir is currently not in use, and reported to be in fair condition. The 1990 City Staff reported the reservoir as displaying cracks in the concrete, but not to the extent that they pose any major problem. In the past, water from City Well Number 2 and Railroad Well Number 2 supplied water to the 0.5 MG. The water from this reservoir was then "boosted" into the distribution system by booster pumps located at the City Shops. The 0.5 MG reservoir did not greatly enhance the storage system and primarily served as a wet well for the booster pumps.

D. Pumping System

The City's current pump system consists of a main booster pump station located at the 3.5 MG reservoir and several pumps located at the wells. There are two 1,000 gpm booster pumps located at the 3.5 MG reservoir. These booster pumps draw from the 3.5 MG low level reservoir and move the water up to the high level 8MG reservoir. The 8 MG reservoir provides gravity flow to two high level distribution systems. The water level in the 8 MG reservoir is maintained at 20 to 30 feet for summertime operation, and at 12 to 20 feet for wintertime operation. The elevation of the 8 MG reservoir is 3,400 ft. Consequently, water coming from the 8 MG reservoir must be reduced in pressure before it can be used in any of the City's three distribution pressure zones. This is accomplished when the water flows through a series of pressure reducing valves located at the 3.5 MG reservoir, the Highlands Hills pressure reducing station and at the Second Street pressure reducing station.

The water level in the 8 MG reservoir is maintained by booster pumps located at the 3.5 MG reservoir. If the water level in the 8 MG reservoir drops to a preset point, the booster pumps will start based upon preset start/stop points at the SCADA master control panel. The booster pumps move water from the 3.5 MG reservoir up to the 8 MG reservoir. The water level in the 3.5 MG reservoir is maintained by pump stations from the various wells. The well pumps operate based upon start/stop points at the SCADA master control panel.

E. Distribution System

La Grande's water distribution system consists of approximately 65 miles of distribution line and is generally in a state of good condition. At the present time, minor repairs are being made to the distribution system in terms of replacing deteriorated lines and looping dead end lines. In order to finance the necessary maintenance and repairs made to the distribution system, the City annually budgets for maintenance, replacement and upgrading the distribution system. The operation of each pressure zone is briefly discussed in the text below.

- The High Level System is located along the western edge of the City and contains approximately five miles of piping. Water for the High Level Distribution System flows by way of gravity through a 12" diameter pipe, from the 8 MG reservoir to the control building located beside the 3.5 MG reservoir. At the control building it flows through pressure reducing valves, then to the Second Street pressure reducing station and then into the High Level Distribution System. Approximately 10 to 12 percent of the total water volume is used in this distribution system. Under the present conditions, the current and projected future demands are able to be accommodated by this distribution system. The City recently constructed a high level booster pump system on Second Street that will increase available fire flows to all areas in the High Level System. Table II.1 lists additional improvements to the High Level System that will be needed to serve lands in the Urban Growth Boundary as development occurs. There are several dead-end pipelines in the system that should be cross-connected or looped as development occurs in order to provide increased pressure and flows. The

pipeline distribution grid needs to be extended at the north end of the High Level System to serve future development. The basic pipeline grid is expected to cost $200,000 to $275,000. Please refer to the 1990 City of La Grande Water System Master Plan.

- The Highland Hills System serves as a second high pressure system located just south of Gekeler Lane and east of Twelfth Street. This system is indirectly supplied by the 8 MG reservoir through pressure reducing valves located at the 3.5 MG reservoir and the Second Street pressure reducing station. The third and final pressure reducing station that serves this pressure zone is located at Gekeler Lane and Twelfth Street. This system can provide service up to an elevation of 2,900 feet. According to the 1998 Water System Master Plan, if development were to occur in the Highland Hills System area at elevations higher than 2,900 feet, improvements to the water system would be required. These improvements could include: a booster pump station, a reservoir located at the proper elevation, extended piping from either the Second Street pressure reducing station or the 3.5 MG pressure reducing station. The improvements are estimated to cost $550,000 to $700,000, depending on the type of system selected to serve the area.

- The Low Level System provides water service for approximately 80 percent of the City's population over 58 miles of piping. These figures account for nearly 88 percent of the City's total water demand. The service elevations for the system are between 2,700' and 2,850'. The water for the system is supplied from the 3.5 MG reservoir through an 18" line. With regards to the system's ability to meet present and future average and peak day demands, it has been determined that the system can readily meet these conditions. In response to recommendations that were made in the 1990 Water System Master Plan, improvements have been made to the system including water line loops and upgrades, which have subsequently earned the system a "good" rating. A major change in the service area of the Low Level System has been the addition of a 16" water transmission line that provides service to the La Grande/Union County Airport and Industrial Park Areas.

F. Fire Protection

According to the City's Comprehensive Plan, fire protection should be provided to all new development within the City's UGB. The La Grande Rural Fire Department is the primary fire service provider for most areas within the City's UGB. For those areas not protected by the La Grande Rural Fire District, the City of La Grande Fire Department will provide fire protection. A Fire Protection Agreement between the property owner and the City of La Grande shall be required. The Fire Protection Agreement shall provide for annual payment for services by the La Grande Fire Department. If City water lines are unavailable to serve the development, a La Grande Fire Department approved on-site water storage system shall be required in order to provide a water supply for fire protection.

G. Master Plan

Based on the population projections for the year 2020, the City of La Grande will need an additional water supply in order to meet the future demands of its citizens. The City's current peak demands are the same as the City's total supply capacity. In the 1998 Water System Master Plan, the City was advised to seek out additional water sources, despite the City's current ownership of all the water rights for its primary water sources. Therefore, it has been recommended that the City develop alluvial wells in the eastern portion of La Grande by 1999. The City recently constructed a new well and pump station at Location "A", as recommended in the 1998 Master Plan. This location is referred to as the Highway 30 Well. For more information on Well A, please refer to the 1998 Water System Master Plan, Chapter 8, Figure U8-2. A second alluvial well has also been recommended for the two to five year construction period after the installation of Well A.

In addition, the City still possesses the water rights to the Beaver Creek Watershed water supply, although it is currently not being used. As a protective measure, it has been suggested that the City determine that its water rights to the Watershed are properly established. This supply can be activated when the system becomes cost effective. In order for the Beaver Creek Watershed to be utilized by the City, State and Federal requirements dictate that a water treatment plant must first be constructed. Before the surface water from the Beaver Creek Watershed can be distributed it must be treated. It is also recommended that the City obtain additional water rights to the Grande Ronde River, so as to ensure an adequate water supply for future water demands.

As noted in the 1990 and 1998 Water System Master Plans, the City has adequate storage facilities that are in good condition and will require only regular cleanings and basic maintenance. Anderson Perry & Associates have identified a potential need for additional storage in the future: a possible reservoir on the north end of the High Level System; a possible reservoir for a prospective low-low level system; and a possible reservoir in the southern portion of the City to provide service to a new pressure zone, which will serve the higher elevation areas where development is expected to occur.

The City's Distribution System has been identified as an area that requires varying degrees of improvement. The needs of the system have been identified and separated into three categories: general Low Level Distribution System upgrades, new well distribution system improvements, and the High Level System booster pumping station. For more information on the general Low Level Distribution System improvements, please refer to Chapter 6 of the 1998 Water System Master Plan.

H. Planned Improvements

In terms of priority during the short term planning period, several specific recommendations have been made to the City regarding improvements to the water system. As an additional water supply was determined to be immediately necessary for the City, Well A (Highway 30 Well) was constructed by the City and is fully operational. In addition to the development of Well A, a High Level Booster

Pumping Station has also been constructed per the recommendation of the 1998 Water System Master Plan. The booster pumping station will enable the High Level Distribution System to provide adequate fire flows and to ensure minimum water pressures and supply to area customers. However, as the new Well A does not fulfill the City's total water needs, a second well, Well B, has been proposed for construction within the next two to five years.

A third priority improvement that was recommended by the 1998 Master Plan, involves the City's distribution system. The plan would make additions to the distribution system piping located throughout the City as it becomes financially feasible.

According to the 1998 Master Plan, the Low Level Distribution System will require major improvements during the short term planning period. These improvements will be made specifically to the primary grid system in the eastern portion of the City, in order to accommodate the future water supply sources east of La Grande. Please refer to Chapter 6 of the 1998 Water System Master Plan for a complete list of the recommended improvements to the primary grid system. These improvements are estimated to cost between $1,000,000 and $1,500,000, and need to be completed prior to the construction of the scheduled Well B.

During the 20 year planning period the need for an additional well, Well C, has been determined and is scheduled to be located at the La Grande Airport. The need for a third well has been forecasted in conjunction with the need to create a new distribution system called the Low-Low Level System. Ideally this system would include primary distribution lines, a low-low level reservoir to be constructed south of the City, and a booster pumping station which would allow the flow to be pumped from the Low-Low Level System into the existing Low Level System.

It is important to mention in this section the 27 item list of Water System Needs as presented in the 1990 Water System Master Plan. According to the 1998 Water System Master Plan, the 1990 list is still applicable despite the completion of several of the items and the partial completion of others. Please refer to Chapter 10 of the 1990 City of La Grande Water System Master Plan in order to view the complete list of Water System Needs.

For more information on the City of La Grande's water system and short term water projects' location, please refer to Appendix Exhibits A-1, Water System Improvements (Figure U6-2); A-2, Existing and Future High Level Distribution Systems (Figure U6-1); and A-3, Possible Low-Low Level Distribution System (FigureU6-3).

Table II.1 Recommended City of La Grande Water System Improvements

System Need	Description and Location of Improvement	Priority Rating/Status	1998 Estimated Cost	Estimated Construction Period	Responsible
Water Supply					
1	Second New Well and Pumping Station (Well B)	3	$1,016,000 (1)	2001 – 2004	City
2	Third New Well and Pumping Station (Well C)	5	$1,016,000 (1)	2010 – 2020	City
Storage					
1	Low-Low Level Storage Reservoir	5	$300,000 (1)	2010 – 2020	City
Distribution System					
1	"K" Avenue – Second Street to Sunset Drive Water Line	2	$115,000 (1)	2000 – 2002	City
2	Alder Street – "K" Avenue to Adams Avenue Water Line	3	$260,000 (1)	2002 – 2005	City
3	Additional Fire Hydrants	3	$35,000 (1)	Ongoing	City
4	Willow Street – Jackson Avenue to "X" Avenue and "X" Avenue – Spruce Street to Willow Street Water Line	4	$180,000 (1)	2000 – 2005	City
5	Loop north end pipes on Greenwood, Fir and Depot Streets	4	$45,000 (1)	2000 – 2005	City
6	Cove Avenue from Twenty-First Street to Progress Loop	2	$35,000 (1)	2000 – 2002	City
7	Fire Hydrant Upgrades	3	$60,000 (1)	Ongoing	City
8	New Well Distribution System Improvements	3	$1,000,000 - $1,500,000	2001 – 2004	City
9	Low-Low Level Distribution System and Booster Station	5	Unknown	2010 – 2020	City
10	North End High Level Grid	4	$200,000 - $275,000	2005 – 2020	City/Developers
11	Highland Hills System Grid	4	$550,000 - $700,000	2000 – 2020	City/Developers
	TOTAL		**$4,812,000 - $5,537,000**		

(1) Constructed as a special Capital Project.
(2) Constructed as an annual Capital Outlay Project.

III. Wastewater

The focus of the 1998 Wastewater Facilities Plan for the City results from the City's desire to make improvements to the existing wastewater system in order to comply with the National Pollution Discharge Elimination System (NPDES) permit to operate a wastewater treatment system, and to accommodate the projected population growth for the City through the 20 year planning period. Note that all of the following information is based on the 20 year planning period, as established in the 1998 Wastewater Facilities Plan. The Plan contains population projections for both La Grande and Island City. The Island City population projections are considered because the City transports its wastewater to the La Grande Wastewater Treatment Plant. A combined estimation of 21,740 for both communities was used as a target population for the 1998 Wastewater Plan.

A. Treatment Facilities System

The City of La Grande operates and maintains a wastewater treatment plant with secondary and tertiary treatment. Wastewater flows from the City's 27" trunk line via gravity to the treatment plant headworks. There are four influent pumps at the treatment plant headworks: two are located in the original 1963 pump station and have individual capacities of 3.7 MGD; and the other two are located in the 1979 pump station and have separate capacities of 2.2 MGD.

From the headworks, the incoming wastewater is pumped to the treatment lagoon system, which includes a 3.5 acre pre-aeration cell and two non-aerated stabilization ponds that total 97 acres in size. The original treatment lagoons were constructed in 1963, with improvements being completed in 1970 and 1979 and the finished product being the City's present system.

In the treatment lagoons, the incoming wastewater receives treatment in the pre-aeration cell and in the stabilization ponds. The pond effluent then flows by gravity to the treatment facility, which houses chemical addition facilities, namely the flocculation basin, and dissolved air floatation basins. The chemicals are added to the effluent for the purpose of coagulating the suspended solids, particularly algae. Prior to the introduction of the wastewater into the dissolved air floatation basins it is disinfected through a process of chlorination. The next stage in the process involves the introduction of fine bubbles into the dissolved air floatation basins, which attach to the flocculated material and cause it to rise to the surface where it is then removed. Finally, the effluent from the dissolved air floatation basins flows by gravity to the effluent pumping station. For more information on the treatment facility process and system, please refer to Chapter 3 of the 1998 Wastewater Facilities Plan.

The majority of the City's treated wastewater is pumped five miles to the north to the discharge point located at the Grande Ronde River. Water is not pumped into the Grande Ronde River year round. During the summer months, a portion of the treated wastewater is used to fill approximately 50 acres of Oregon Department of Fish and Wildlife (ODF&W) wetland areas. A share of the City's treated wastewater is also used for irrigation purposes on a variety of crops that the ODF&W produces in order to provide wildlife and waterfowl habitat.

B. Primary Collection System

The wastewater collection system for the City contains segments that are over 85 years old, and are primarily located between "L" Avenue and "Y" Avenue west of Spruce Street. The segments of the system north of "Y" Avenue and south of "L" Avenue are approximately 50 years old. The newer portions of the system lie in the east and southeast sections of the City. The newer portions of the collection system are approximately 40 years old. The majority of the City's collection system piping lies in the public right-of-way, such as in streets and alleys; easements have been obtained where necessary. Service to private homes lie partially on private property and connect to the City's collection system through manufactured tees and wyes, that have been either installed at the original time of construction or through field constructed taps which have been added as the need arises.

Due to the considerable age of portions of the City's wastewater collection system, problems often occur concerning considerable infiltration and inflow (I/I) in the system caused by high groundwater and storm events. The result of these high water events is high flows into the treatment lagoons, which creates operational problems, inefficient treatment, and, in extreme high water events, the bypassing of raw or partially treated sewage to Gekeler Slough. The problem with I/I is thereby extended to other portions of the collection system, which makes effective removal costly and difficult.

The City's collection system is distributed among 10 basins located throughout the City. The function of the basin designations is to "identify, monitor and describe areas of the collection system for flow monitoring, field work and presentation purposes.

The flow of the collection system functions mainly by gravity, however, due to the variation in the elevations of the City, six pump stations, two pumps per station, are used in order to overcome the differences in grade.

- Pump Station Number 1 is located in Basin VIII on South Twenty-Sixth Street, north of Buchanan Lane near Interstate 84. Pump Station Number 1 receives flow by gravity through 6,000 feet of upstream piping.

- Pump Station Number 2 is located near the intersection of North Cherry Street and "U" Avenue. Pump Station Number 2 receives flow by gravity through 5,500 feet of upstream piping.

- Pump Station Number 3 is located at the beginning of Basin VIII, near the intersection of East "H" Avenue and Highway 30. The flow for Pump Station Number 3 is derived from Pump Station Number 1 and all of the sources within Basin VIII, most of which are residential. In addition, Pump Station Number 3 also receives wastewater flow from the La Grande downtown and other small businesses in the area.

- Pump Station Number 4 is located on North Depot Street. This pump station is considered to be a "lift station", and receives a minimal amount of flow from several residences, which it then discharges to a nearby manhole where the flow is then moved by gravity to the treatment plant.

The final two pump stations are located at the La Grande/Union County Airport Industrial site.

- The first pump station is located on the western segment of the Smith Loop, approximately 800 feet to the north of Airport Lane. This pump station, constructed during Phase I of the Airport Industrial Park Infrastructure Improvements during 1991, collects wastewater via a 2,500 foot, 8" pipe gravity collection system.

- The second pump station was constructed during Phase II of the Airport Industrial Park Infrastructure Improvements (1998), and is located at the intersection of the Forest Service Driveway and Airport Lane. This pump station collects wastewater from a gravity collection system through a 1,500 foot, 8" pipe.

For more information on the six pump stations, please refer to Chapter 3 of the 1998 Wastewater Facilities Plan.

With regards to the collection system of the City of La Grande, Island City and the Island City Area Sanitation District (ICASD) must also be mentioned and included in this section. The ICASD serves the residential and commercial areas within and near Island City and the Baum Industrial Park. The wastewater collected by the ICASD is subsequently discharged to La Grande's main trunk line, located near the intersection of McAlister Lane and Highway 30. The ICASD is solely responsible for the financing, operation and maintenance of their collection system. This information is presented only for the purpose of context and its relationship to the La Grande wastewater collection system.

C. Master Plan

In the 1998 Wastewater Facilities Plan, it was recommended that the City make significant improvements to the existing collection system. The existing collection system needs immediate replacement and/or repair in order to operate properly and consistently. The reported main system deficiency concerns the inadequate capacity of the main trunk line to handle peak flow events. For the purpose of clarification in this Public Facilities Plan, the main trunk line is the 27" diameter pipeline that extends from the intersection of Gekeler Lane and Highway 30 to the wastewater treatment plant. In addition, most of the City's collection system lines are degraded and leak.

In the year 2000, an Addendum was added to the 1998 Wastewater Facilities Plan in response to difficulties with the original, proposed treatment system improvements. These issues prompted a re-evaluation of the recommended improvements, which in turn produced six new alternatives for development. Included in these six alternatives was the assumption that the general treatment improvements, as outlined in the

Wastewater Facilities Plan, would be applied to all six of the alternatives with minor variations as they relate to the various treatment systems. From these six alternatives the La Grande City Council selected Alternative 1, Aerated Lagoons and Wetland Disposal. For more information on the proposed six alternatives, please refer to the year 2000 Addendum to the 1998 Wastewater Facilities Plan.

As mentioned above, recommendations for several general improvements to the City's wastewater system were also included in Alternative 1, Aerated Lagoons and Wetland Disposal. These improvements include: Trunk Line Improvements; New Headworks Facility; Influent Pump Station Improvements; Lagoon Biosolids Dredging; Alum-Algae Biosolids Disposal Improvements; and Treatment Plant Building Improvements. These improvements are scheduled for completion in December 2002. The collection system improvements will occur annually, on a budget of $500,000 to $600,000 per year for the next 40 years.

Included in the phases of Alternative 1, Aerated Lagoons and Wetland Disposal, is the investigation of the aerated lagoons in conjunction with the proposed general system improvements. Combined, these improvements will provide the necessary treatment capacity that is required in order to manage the biologic loadings that enter the treatment system. Another function of these concurrent improvements would be the system's ability to process through the lagoons and send for disposal the high flows that result from inflow and infiltration during intense rainfall and snow melt events, which in turn cause groundwater levels to rise.

After receiving biological treatment in the lagoons, the effluent will be discharged either into wetlands constructed by the Oregon Department of Fish & Wildlife (ODF&W), or into the Grande Ronde River for the flow rates and during the months in which such discharging is permitted. For the months when it is not permissible to discharge the effluent into the Grande Ronde River, the effluent will be released into the wetlands that have been created by ODF&W. A portion of the wetland disposal system will include the construction of approximately 52 acres of wetlands, on a 100 acre facility that is operated by the City of La Grande. According to the year 2000 Wastewater Addendum, the wetlands are required in order to obtain a three to six day detention time and disinfecting period prior to the release of the effluent into a facility with the potential for human contact. After the period of detention in the City constructed wetlands and disinfecting of the wetland effluent, the flows will be discharged into the ODF&W wetlands.

The implementation of Alternative 1 was originally proposed as being dependent on the completion of two items: a modification to the NPDES permit, which allows discharge into the ODF&W wetlands; and the development of a satisfactory agreement between the City and ODF&W. ODF&W has amply demonstrated that it is willing to work in agreement with the City and would like to use the effluent.

There are numerous advantages to implementing the improvements contained in Alternative 1. According to the year 2000 Wastewater Addendum, Alternative 1 will provide needed water to the ODF&W wetlands, as well as work in conjunction with the La Grande Airport's restrictions on the construction of "additional water impoundments within their restricted zone and will also help improve habitat

migratory birds and effluent treatment above and beyond the traditional treatment required prior to discharge into the natural receiving systems".

For information on the construction schedule and cost estimates for Alternative 1, please refer to the following Table III.1.

D. Planned Improvements

As indicated on the following Table III.1, a series of improvements are scheduled to be made to the City's wastewater treatment system during the short term planning period, beginning in June of 2001. These improvements will include: improvements to the trunk line entering the treatment plant, new headworks facilities, influent pump station modifications, lagoon sludge removal, alum algae sludge disposal improvements, treatment plant building improvements, treatment plant piping improvements, and electrical control system improvements.

For the long-term, 20 year planning period, the City will budget $500,000 to $600,000 annually on collection system improvements to be made to the collection system over a 40 year period.

As stated in the above text, the current and future improvements to La Grande's wastewater treatment system and general system will enable the City to better accommodate the future needs of its residents, as well as those customers in Island City who receive service from ICASD.

For more information on the City of La Grande's wastewater system and short term projects' location, please refer to Appendix Exhibits A-4, Wastewater System Vicinity Map (Figure 1-2); and A-5, Existing Wastewater ICASD Collection System (Figure 3-1).

Table III.1 City of La Grande Wastewater System Improvements, Alternative 1

System Need	Description of Improvement	2000 Estimated Cost	Estimated Construction Period	Estimated Completion Date	Responsible
Wastewater					
1	Outfall Line and Trunk Line	$2,000,000	June 1, 2001	November 1, 2001	City
2	Outfall Highway and Railroad Boring	$300,000	June 1, 2001	November 1, 2001	City
3	Wetland Construction	$1,200,000	June 1, 2001	November 1, 2001	City
4	Lagoon Improvements: Pre-Aeration Cell and Pond A	$2,300,000	June 1, 2001	November 1, 2001	City
5	Wetland Disinfection	$1,300,000	April 15, 2002	November 1, 2001	City
6	Headworks	$900,000	April 15, 2002	November 1, 2002	City
7	Treatment Plant Building	$2,300,000	April 15, 2002	November 1, 2001	City
8	Lagoon Improvements: Pond B and Settling Ponds	$1,700,000	June 1, 2002	November 1, 2002	City
	Total	**$12,000,000**			

Source: City of La Grande, May 2001

IV. Stormwater

A. Stormwater Management

The City of La Grande manages stormwater through the use of drainage ditches, drainage canals, street drainage, catch basins, underground storm drain piping, and dry wells. The area west of the Union Pacific Railroad, which receives runoff from Deal Creek, Mill Creek, and Taylor Creek, utilizes drainage canals and underground piping for creek flows. The remaining runoff from the basin is transported to the drainage canals and underground piping via streets, catch basins, and drainage ditches. The combined runoff outfalls into Gekeler Slough, which eventually drains into Catherine Creek.

The area east of the Union Pacific Railroad develops runoff primarily from the developed and undeveloped land within the City limits. Drainage ditches and dry wells are used more predominantly within this area due to minimal ground slope. Some larger ditches occur at the downstream section of the basin which feeds into Gekeler Ditch. Eventually, this ditch drains into Catherine Creek.

B. Outfall Location

The area west of the Union Pacific Railroad outfalls into Gekeler Slough. This slough eventually drains into Catherine Creek. Although the majority of the area east of the Union Pacific Railroad utilizes dry wells, any runoff that does accumulate and flows downstream will outfall into Gekeler Ditch. Gekeler Ditch eventually drains into Catherine Creek.

C. Master Plan

The City of La Grande is in the process of developing a Stormwater Management Plan. This Management Plan is divided into six phases. Phase I addresses City-wide hydrology and water quality issues. Phase II addresses lower Mill Creek, Taylor Creek, and Gekeler Slough hydraulic capacity. Phase III addresses upper Deal Creek and upper Mill Creek hydraulic capacity. Northeast La Grande hydraulic analysis is addressed in Phase IV. Northwest La Grande hydraulic analysis is addressed in Phase V and Phase VI is a summary of the completed plan.

In 1998, Phase I and Phase II were completed. Major points of interest include the water quality analysis performed, the water quality standards developed, and the hydraulic improvements proposed for lower Mill Creek, Taylor Creek, and Gekeler Slough (Alternative D). Alternative D hydraulic improvements include improving the hydraulic capacities of both Taylor Creek and Lower Mill Creek drainage to contain the 100-year flood event and diverting these flows away from the Gekeler Slough using the new Taylor Creek/Gekeler Slough Bypass. Additionally, stormwater conveyed within Gekeler Slough, upstream of Twentieth Street, will be diverted into the Taylor Creek/Gekeler Slough Bypass. The Taylor Creek/Gekeler Slough Bypass will be constructed along the east side of Foothill Road proceeding northeasterly back to the original course of drainage, downstream of the Forest Service Complex, and adjacent to Highway 30. At this confluence, an

approximate 60-acre detention facility is proposed to reduce the peak flow rate conveyed downstream.

D. Planned Improvements

The Taylor Creek, Lower Mill Creek, Taylor Creek/Gekeler Slough Bypass, and the detention facility comprise the improvements proposed for the Study Area 1 Improvement Plan. As shown on Table IV.1, the total estimated cost is $6,643,000, to be extended over a 40-year planning period. The Appendix to this document contains Figures 5-1 and 5-14, which depict the study area as well as illustrates the hydraulic improvements for the selected Alternative D.

Phase III is the next phase of the Stormwater Management Plan to be developed. This Phase will be the hydraulic analysis of upper Deal Creek and upper Mill Creek (Study Area 2). This drainage area includes Eastern Oregon University. It is important to have Phase III hydraulics performed within the short-term priorities because Study Area 2 drains into Study Area 1. Study Area 3 (northeast La Grande) and Study Area 4 (northwest La Grande) have less priority and can be performed later as Areas 1 and 2 are implemented. The estimated cost to perform the hydraulic analysis for Study Area 2 and to develop improvement alternatives is approximately $66,000. For more information on the proposed Stormwater Management Plans, please refer to the 1998 La Grande Surface Water Management Plan.

Table IV.1 City of La Grande Surface Water Improvement Plan, Alternative D Area I Hydraulic Improvements Preliminary Plan

Planning Period	Item	Project Description	Construction Year	Funding	Estimated Cost
Short-term Plan (0 to 8th Year)	1.	Construct East/West Diversion and Aires Lane channel improvements.	4th Year	City - $50,000/yr.	$210,900
	2.	Construct Lower Mill Creek channel improvements.	8th Year	City - $50,000/yr.	$206,600
	3.	Obtain right-of-way for GEK2B and the Taylor/Gekeler Slough bypass channel, including purchase of two houses.	8th Year	SRF Loan, General Obligation Bonds, Industrial Park & County Participation	$761,700
Mid-term Plan (9th to 12th Year)	1.	Construct Stage 1 pilot channel for Taylor Creek/Gekeler Slough bypass and floodplain berm.	10th Year	City - $50,000/yr.; City, County, Industrial Park	$150,000
	2.	Demolition of existing houses at Lower Mill Creek and Gekeler/Twentieth St. intersection.	11th Year	City - $50,000/yr.	$86,700
	3.	Construct Stage 1 GEK2B. Low point at Mtn. View Estates and Gekeler/Twentieth St. intersection.	12th Year	City - $50,000/yr.	$75,000
Long-term Plan (13th to 20th Year)	1.	Construct Stage 2, Taylor Creek/Gekeler Slough.	-	-	$729,700
	2.	Construct Stage 2, GEK2B Improvements.	-	-	$754,500
	3.	Construct Taylor Creek Improvements	-	-	$487,500
	4.	Construct storage recovery facility.	-	-	$2,163,200
Extended Plan (21st to 40th Year)	1.	Construct GEK2, GM, and GEKI	-	-	$1,018,000
			TOTAL		**$6,643,800**

V. Transportation

The City of La Grande has adopted a Transportation Plan for the UGB, which shall be considered a support document to the Comprehensive Land Use Plan. All major transportation needs are discussed within the Transportation Plan. In addition, the Transportation Planning Goals set forth in the La Grande/Island City Transportation System Plan, Volume I, pages 3 through 4, are incorporated herein as if fully set forth. For more information on the City's Transportation Plan, please refer to Volume I of the adopted La Grande/Island City Transportation System Plan, Ordinance Number 2946, Series 1999.

A. Roadway System

The planning area for the City's Transportation System Plan (TSP) includes not only the City and its Urban Growth Boundary (UGB), but also Island City and its respective UGB. Accordingly, the planning area for the City's TSP also includes the area to the south of Gekeler Lane in La Grande, but outside of the current UGB. The TSP also includes the La Grande/Union County Municipal Airport, including the area to the south of the Grande Ronde River located between the La Grande and Island City UGBs. The TSP serves as a 20 year multi-modal plan addressing the motor vehicle, pedestrian, bicycle, transit, rail, air, water and pipeline transportation systems of La Grande and Island City.

1. Interstate 84

The City of La Grande is served by the Old Oregon Trail (Interstate 84), which runs east to west and connects many of the communities proximal to the northern and eastern part of Oregon. Interstate 84 provides the La Grande and Island City area with a western connection to Portland and Washington State, as well as an eastern route to Idaho and Utah. 5.73 miles of Interstate 84 are located within the planning area. Access from the four lane freeway to the surface street system is provided at three interchanges: the north interchange at exit 259 (for eastbound traffic only); the Oregon State Highway 82 interchange at exit 261; and the South La Grande Interchange at exit 264.

2. Wallowa Lake Highway (Oregon State Highway 82)

The Wallowa Lake Highway serves as a direct link between La Grande and Island City, and is the only connection between Union and Wallowa Counties. The highway is part of the U.S. Forest Service's Wallowa Mountain Scenic Byway, which forms a loop through La Grande, Wallowa and Baker City. The Lewiston/Clarkston area can also be accessed by the Wallowa Lake Highway via a connection with Oregon State Highway 3 in the town of Enterprise. In addition, the Wallowa Lake Highway also provides access to the scenic attractions in the Wallowa Mountains and Hells Canyon.

Access to the Wallowa Lake Highway begins southeast of La Grande's downtown area at the intersection of Adams Avenue (U.S. Highway 30) and Island Avenue. This portion of the Highway is referred to as Island Avenue in La Grande, while

in Island City the same portion of road is known as First Street and McAlister Road. In addition, the La Grande portion of the Oregon State Highway 82 (Island Avenue) contains one of only two grade-separated crossings of the Union Pacific Railroad tracks.

3. La Grande-Baker Highway (U.S. Highway 30)

   The La Grande-Baker Highway, which was assigned a "District Level of Importance" in the 1991 Oregon Highway Plan (OHP), parallels Interstate 84 through Union and Baker Counties, thereby connecting the municipalities of La Grande, Union, North Powder, Haines and Baker City. According to the OHP, the primary function of the La Grande-Baker Highway is to serve local traffic and access. Highway 30, referred to in La Grande as Adams Avenue, leaves the vicinity of Interstate 84 and follows the La Grande-Baker Highway through the City for 5.39 miles until it ultimately rejoins with the Interstate at the other end of the City. To the south of La Grande, the Highway is known as Oregon 203.

B. Street System

Three types of streets exist within the planning area: arterials, collectors and local streets. Depending on their location within the planning area, the streets are maintained by La Grande, Island City and/or Union County.

Arterials in the City of La Grande's Comprehensive Plan are defined as connecting major traffic generators, providing continuous and efficient routes into and through the City, and connecting with County arterials and/or State highways.

Collectors are described in the City's Comprehensive Plan as carrying traffic between neighborhoods and arterials, with traffic collection being the primary purpose and access to local land, a secondary function.

Local Streets in the City's Comprehensive Plan are defined as providing access to abutting properties.

Please refer to Appendix D of the 1999 La Grande/Island City TSP, Volume 1, for more information on the functional classification, jurisdictional responsibility and physical characteristics of arterial and collector streets within the planning area.

C. Pedestrian System

In the La Grande/Island City planning area, sidewalks are present along many of the collectors and arterials. Typically, both sides of the street have sidewalks for pedestrian use. Island Avenue does not have a sidewalk along its north side, due to the fact that it is the side that is closest to the railroad tracks. Although, sidewalks have recently been constructed on the north side of Island Avenue between Albany Street and Walton Road, in order to improve pedestrian accessibility and safety. The City's pedestrian system also includes a pedestrian signal located at the Adams Avenue and Cherry Street intersection; most of the other signalized intersections in the planning area are equipped with pedestrian call buttons.

D. Bicycle System

According to the 1999 La Grande/Island City TSP, an inventory of the designated bicycle lanes in the planning area is as follows:

- Designated bicycle lanes exist on both sides of Island Avenue between Monroe Avenue in La Grande and the Grande Ronde River in Island City.
- Bicycle lanes also are located along "C" Avenue and Gekeler Lane in La Grande between Sixth and Twelfth Streets, as well as along Gekeler Lane between Twelfth and Sixteenth Streets.
- Cove Avenue from Willow Street to Interstate 84.
- Along Buchanan Lane between Interstate 84 and McAlister Road.
- Along McAlister Road between Buchanan Lane and First Street in Island City, thereby connecting Island City and La Grande by bicycle.

There is also adequate shoulder space for bicyclists on portions of Adams Avenue (U.S. Highway 30) just within and slightly beyond La Grande's City Limits. In addition, the wide sidewalk on Willow Street from Cove Avenue to Adams Avenue was installed with the intention of it being a shared bicycle and pedestrian facility.

E. Public Transit Facilities

At the present time there is no mass transit system, or fixed route inter-city public transit system that serves the general public within the La Grande/Island City area. According to the 1999 TSP, "various forms of demand-responsive public transportation are available, primarily serving population groups with special needs. Regular fixed-route services are available for trips between the La Grande/Island City urban area and other urban areas." For more information on the available forms of demand-responsive public transportation, including both local transit and inter-city, please refer to the 1999 TSP or contact the City's Transportation Department.

F. Airport Facilities/Service

The La Grande/Union County Municipal Airport provides charter air service to the area; however, no commercial air service is available at the present time. A Master Plan for the Airport facility was prepared by CH2M and was adopted in 1998. 55 miles northwest of La Grande is the City of Pendleton, which offers the closest commercial air service, with daily Horizon Air flights to and from Portland and the Tri-Cities (Pasco).

G. Rail Service

The main railroad line that links Portland with Boise, Idaho travels directly through La Grande, which is served by the Union Pacific Railroad, a Class I line-haul freight

railroad. The La Grande switching yard enables rail service to Enterprise and Joseph by way of a branch line formerly operated by Idaho Northern Pacific Railroad. In 2001, Union and Wallowa County officials and citizens were working with the Oregon State Parks and Recreation Department on a potential purchase of the line for an excursion train while the owner sold the rail salvage rights.

Passenger rail service along this line is no longer available, as Amtrak suspended trips through the area in 1997. Amtrak now coordinates with Greyhound bus lines in order to provide service to passengers from eastern Oregon to the Portland Amtrak station.

H. Pipeline Service

Included in the La Grande/Island City TSP is pipeline transportation, which includes the transmission lines for electricity, cable television and telephone services, in addition to the pipeline transport of water, sanitary sewage and natural gas. Please refer to Chapter 3 of the 1999 TSP , Volume II, for more information.

I. Master Plan

In accordance with the Oregon Transportation Planning Rule, alternate options were formulated and evaluated for the 1999 TSP. In the 1999 TSP, McKeever/Morris and DEA assert that each of the transportation system improvement options was designed to address safety, specific deficiencies, access management and other areas of concern. The recommended transportation system improvements include both state highway and local road projects.

In order to determine which of the recommended improvements were appropriate for La Grande and Island City, the consultants evaluated each of the improvement options based on a specific set of criteria. See the 1999 TSP for further information regarding each improvement recommendation, including the estimated cost of each improvement option, as well as for a detailed explanation of the evaluation criteria.

J. Planned Improvements

1. Street System Plan

The Street System Plan in the 1999 La Grande/Island City TSP presents a series of roadway and intersection improvements that have been recommended to commence within the current 20 year planning period. The proposed improvements will help preserve and enhance the existing roadway system, while at the same time improving existing facilities and promoting the development of more transportation efficient land uses. The proposed projects include new roadways, new traffic signals and improvements to the existing street system. Listed in the following Table V.1 are the recommended improvements to be made to the existing transportation system in the planning area. These improvements are part of the two cities efforts to meet the requirements of the Statewide Transportation Improvement Program.

Table V.1 Proposed Street Improvement Plan for the Short-term Planning Period

Street and Project Name	Location	Functional Classification	Project Description	Planning Period	Estimated Cost
Twenty-Sixth Street realignment and May Lane/Island Avenue Signalization	Twenty-Sixth Street to May Lane and Island Avenue	Minor Collector	Realign Twenty-Sixth Street/May Lane by installation of one traffic signal at May Lane and Island Avenue	Currently ongoing; scheduled for completion in 2004	$757,000

Source: City of La Grande, May 2001; 1999 La Grande/Island City TSP

Note: Projects are divided into categories of short-term (0-5 years), mid-term (5-10 years) and long-term (10-20 years).

2. Pedestrian System Plan

   The Pedestrian System in La Grande and Island City includes: sidewalks, walkways, crosswalks, curb ramps, signals, signing, supporting facilities, paths and shoulders in rural areas. All local, collector and arterial streets are required to have sidewalks or walkways, as dictated in the current design standards for both cities. In addition, the plan recommends a continuous system that is in good condition that will connect residential areas. The two municipalities wish to comply with this objective since the purpose of the system is to provide safe and direct inter-city access to all areas of the cities, while at the same time encouraging people to walk as an alternate mode of transportation.

   The pedestrian system network for La Grande should support and provide access to the downtown retail area. As stated in the 1999 TSP, La Grande is striving to create a pedestrian-friendly civic commercial area in the historic downtown blocks. Please refer to the La Grande Downtown Design Plan for specific project information.

3. Proposed Pedestrian System Projects

   Figure 7-5 and Table V.X at the end of this section contain complete indexes of the recommended pedestrian projects. The Table lists the specific locations and improvements to be accomplished over the next 20 years in the cities of La Grande and Island City. The projects are divided into categories of short-term (0 - 5 years), mid-term (5 - 10 years) and long-term (10 - 20 years).

   As a part of the 2001 construction period, improvements are being made to the La Grande pedestrian system on Cove Avenue and Albany Street. These improvements have been funded with a grant from the Oregon Department of Transportation's Local Street Network Fund. Below in Table V.2 is a list of the short-term projects scheduled for the La Grande and Island City pedestrian systems.

Table V.2 Recommended Short-term Pedestrian Projects

	Street/Road	Beginning	Ending	Side of Road	Planning Period	Estimated Cost
1.	Albany Street	Cove Avenue	Island Avenue	Both	Currently ongoing	$122,000
2.	Cove Avenue	Portland Street	East La Grande City Limits	South	Currently ongoing	*
3.	Cove Avenue	Portland Street	East La Grande City Limits	North	Currently ongoing	*
4.	East "L" Avenue	Willow Street	Twenty-Fifth Street	Both	2001-2004	$190,000
5.	"H" Avenue	Sunset Drive	Eighth Street	North	2001-2004	-
6.	Island Avenue	Monroe Avenue	East La Grande City Limits	North	Completed 2001	-
7.	Twelfth Street	Gekeler Lane	"J" Avenue	West	2001-2004	$219,000
8.	Twenty-Fifth Street	East "L" Avenue	Cove Avenue	Both	2001-2004	$105,000
					TOTAL	**$636,000**

* Included as part of roadway project cost estimate. (1999 TSP)
Source: City of La Grande, May 2001; 1999 La Grande/Island City TSP

4. Bike System Plan

As reported in the 1999 TSP, the La Grande/Island City Bicycle System Plan includes: bike lanes, paths, shoulders on rural roads, shared roadways on low-traffic streets, signals, signing, pavement markings and parking facilities. When properly configured into most arterial and collector streets, the bicycle system would provide safe and direct access to all parts of the City, while at the same time encouraging people to consider alternatives to automobiles. The recommended bikeway improvements should be added when a new street is built or when improvements are being made to existing streets. The 1999 TSP recommends that on arterials and collectors that are not scheduled to be improved as part of the street system plan, bike lanes should be constructed on these streets when the traffic volume exceeds 3,000 vehicles per day. In addition, the marking of bicycle lanes on streets with direct access to schools should be considered a high priority.

The selected bicycle projects for La Grande and Island City are based on corridors between likely destinations and frequently traveled areas. The plan also took into consideration the need for better bicycle facilities and access routes to nearby Eastern Oregon University. The City has been working closely with the University to identify projects that will enhance bicycle circulation in the area. Consideration was also given to bicycle routes that will link the University to the commercial and residential areas of La Grande.

5. Proposed Bicycle System Projects

The recommended bicycle projects for both La Grande and Island City are catalogued in Figure 7-6 and Table V.X at the end of this section, and will most likely occur while improvements are being made to the identified streets. However during the short-term planning period, the majority of improvements

projects will involve the installation of signs. For further information on the options recommended for the cities bike system, please refer to Chapter 7, Volume II, of the 1999 La Grande/Island City TSP. Below in Table V.3 the ongoing, short-term bicycle system improvements for the City of La Grande are listed.

Table V.3 Recommended Short-term Bicycle System Improvement Projects for the City of La Grande

Street/Road	Beginning	Ending	Facility	Side of Road	Planning Period	Cost Estimate
Cove Avenue	Pine Street	East La Grande City Limits	5-ft lanes	Both	Short-term; ongoing	$99,000
					TOTAL	**$99,000**

Source: City of La Grande, May 2001; 1999 La Grande/Island City TSP

6. Transit Plan

   As presented in the 1999 TSP, the Transit Plan should be developed to meet the needs of the "transportation-disadvantaged": the elderly, disabled, children, and those who do not have access to a car. These services should be provided within the constraints of reasonable funding and available resources. Four transit strategies and corresponding categories have been recommended in the 1999 TSP and include: Demand-Responsive Transit; Fixed-Route Local Service; a Transit Center; and Inter-city Transit. Presently, there are not any specific transit-related improvements scheduled for the 20 year planning period. For more information on the Transit Plan, please refer to the 1999 TSP, Chapter 7, Volume II.

7. Rail Service

   As mentioned above in Section G, Amtrak passenger service was available in the La Grande/Island City area until 1997. With highway funding limited and extensive rail infrastructure already in place, the reinstatement of Amtrak has been recommended in the 1999 TSP and should be supported.

8. Air Service Plan

   The Master Plan acknowledges the fact that air travel is becoming an increasingly popular mode of transportation. As stated in the 1999 TSP, the feasibility of creating an Eastern Oregon regional airport to serve the needs of La Grande and Baker City communities should be studied. If a regional airport does not prove to be practical, it should be noted that the travel demand on the interstate system and on the Pendleton Airport will certainly increase.

   Below in Tables V.4 and V.5, the transportation projects for La Grande and Island City are summarized and organized by the projects funding priority, improvement type and total cost estimate.

Table V.4 Summary of Estimated Transportation Improvement Costs for the City of La Grande

Funding Priority	Improvement Type	Total Estimated Cost (1998 dollars)
Short-term (0-5 years)	Roadway and Intersection	$3,691,000
Mid-term (5-10 years)	Roadway and Intersection	$6,522,000
Long-term (10-20 years)	Roadway and Intersection	$1,390,000
"As development occurs"	Roadway and Intersection	$3,695,000
Varied	Pedestrian	$3,542,000
Varied	Bicycle	$298,000
	Total	**$19,138,000**

Source: City of La Grande, May 2001; 1999 La Grande/Island City TSP

Table V.5 Summary of Estimated Transportation Costs for Island City

Funding Priority	Improvement Type	Total Estimated Cost (1998 dollars)
"As development occurs"	Roadway and Intersection	$2,986,000
Varied	Pedestrian	$726,000
Varied	Bicycle	
	Total	**$4,621,000**

Source: City of La Grande, May 2001; 1999 La Grande/Island City TSP

For more information on the City of La Grande's transportation system and short term projects' location, please refer to Appendix Exhibits A-8, Recommended Roadway and Intersection Projects (Table 3); A-9, Recommended Pedestrian System Improvements (Table 4); A-10, Recommended Bicycle System Improvements (Table 5); A-11, Recommended Roadway Plan (Figure 7-4); A-12, Recommended Pedestrian Plan (Figure 7-5); and A-13, Recommended Bicycle Plan (Figure 7-6).

VI. Short Term Facility Projects

Projects that are considered to be "short term" are those scheduled to begin construction within the five year planning period. This means that the projects must have approximately commenced between the years 1999 and 2004. The improvements recommended in the 1999 TSP are of varying priority levels, since a few low priority improvement projects are currently underway. Please refer to the Transportation Element of this Plan for further information of the recommended improvement priority ratings.

The water system improvements have also been ranked in terms of their priority to the City. The highest priority project listed in the City's 1998 Water System Master Plan was the construction of a new water supply and pumping station. The City has since constructed Well A, commonly referred to as the Highway 30 Well, and an accompanying pump station at the same location. The other primary improvements involve the construction of another new water supply and numerous improvements to the City's distribution system.

The short term improvements planned for the two remaining systems, Wastewater and Stormwater, have recently been amended. In the year 2000, an Addendum was

incorporated into the City's Wastewater Master Plan for the purpose of re-prioritizing system improvements. At the present time, the Stormwater system improvements are focused on Area 1.

Table VI.1 Complete Table of Short Term Facility Projects (2000-2005 Planning Period)

Improvement	Priority Rating/Status	Year	Cost Estimate	Responsible
Water				
New Well Distribution System Improvements	Adopted; high priority	2001-2004	$1,000,000 - $1,500,000	City
Second New Well and Pumping Station (Well B)	Adopted; high priority	2001-2004	$1,016,000	City
"K" Avenue – Second Street to Sunset Drive Water Line	Adopted; medium priority	2000-2002	$115,000	City
Alder Street – "K" Avenue to Adams Avenue Water Line	Adopted; medium priority	2002-2005	$260,000	City
Additional Fire Hydrants	Ongoing	Ongoing	$35,000	City
Willow Street – Jackson Avenue to "X" Avenue and "X" Avenue to Spruce Street to Willow Street Water Line	Adopted; low priority	2000-2005	$180,000	City
Loop north end pipes on Greenwood, Fir and Depot Streets	Adopted; low priority	2000-2005	$45,000	City
Cove Avenue from Twenty-First Street to Progress Loop	Adopted; medium priority	2000-2002	$35,000	City
Fire Hydrant Upgrades	Adopted; medium priority	Ongoing	$60,000	City
		Subtotal	**$2,746,000 - $3,246,000**	
Wastewater				
Outfall Line and Trunk Line Improvements	Adopted	2001	$2,000,000	City
Outfall Highway and Railroad Boring	Adopted	2001	$300,000	City
Wetland Construction	Adopted	2001	$1,200,000	City
Lagoon Improvements: Pre-Aeration Cell and Pond A	Adopted	2001	$2,300,000	City
Wetland Disinfection	Adopted	2002	$1,300,000	City
Headworks	Adopted	2002	$900,000	City
Treatment Plant Building	Adopted	2002	$2,300,000	City
Lagoon Improvements: Pond B and Settling Pond	Adopted	2002	$1,700,000	City
		Subtotal	**$12,000,000**	

Table VI.1 Complete Table of Short Term Facility Projects (Continued) (2000-2005 Planning Period)

Improvement	Priority Rating/Status	Year	Cost Estimate	Responsible
Stormwater (0 to Eighth Year)				
Construct East/West Diversion and Aries Lane channel improvements	Adopted	2002	$210,900	**City**
Construct Lower Mill Creek channel improvements	Adopted	2006	$206,600	City
Obtain right-of-way for GEK2B and the Taylor/Gekeler Slough bypass channel, including purchase of two houses	Adopted	2006	$761,700	City
			Subtotal	**$1,179,200**
Transportation				
Twenty-Sixth Street realignment and May Lane/Island Avenue Signalization	Adopted	Currently ongoing	$757,000	City
Albany Street (from Cove Avenue to Island Avenue)	Adopted	Currently ongoing	$122,000*	City
Cove Avenue (from Portland Street to East La Grande City Limits	Adopted	Currently ongoing	*	City
East "L" Avenue (from Willow Street to Twenty-Fifth Street)	Adopted	2001-2004	$190,000	City
"H" Avenue (from Sunset Drive to Eighth Street)	Recommended	2001-2004	-	City
Twelfth Street (from Gekeler Lane to "J" Avenue)	Adopted	2001-2004	$219,000	City
Twenty-Fifth Street (from East "L" Avenue to Cove Avenue)	Adopted	2001-2004	$105,000	City
Cove Avenue (from Pine Street to East La Grande City Limits)	Adopted	Currently ongoing	$99,000	City
			Subtotal	**$1,492,000**
		Total	**$17,417,200 - $17,917,200**	

*Included as part of roadway project cost estimate (1999 TSP)

VII. Funding Mechanisms

A. Existing Water System Funding Mechanisms

Source: City of La Grande, Oregon; Resolution Number 4356, Series 2000
Name of Program: Water System Development Charges (SDCs)

The City of La Grande has several SDCs in place for generating funds for the City's water system. As stated in Resolution Number 4356, Series 2000, water rates and related fees, including connection, are billed to the users of the City of La Grande's water system: "All properties receiving City water and/or sewer service which is dissected by the City limits line shall pay inside the City utility rates, if any portion of the residence is inside the City limits. Utility rates shall be those charged outside the City limits, if the residence lies completely outside of the City limits."

The first set of fees concerns the application for service, which is to be paid prior to the installation of the water meter. These charges are as follows:

Table VII.1 Water Meter/Installation Charges

	Cost of Installation	
Meter Size	**Gravel Street**	**Paved Street**
¾ inch tap	$693.00	$945.00
1 inch tap	$877.00	$1129.00
1½ inch tap	$1733.00	$1995.00
2 inch tap – compound meter	$2468.00	$2783.00
2 inch tap – turbo (irrigation) meter	$1943.00	$2258.00

Source: City of La Grande, 2001
Note: Taps that are larger than 2 inches will be charged the Engineer's estimate plus 15% overhead (adjusted at completion installation).

The citizens of La Grande who have water meters are also billed a basic water service charge based upon the amount of water used. Additional fees are applied when water is used in excess of the base rate. User water accounts are also billed monthly for fire protection and standby hydrants. See the following three tables for the City's various rates and fees.

Table VII.2 Water Service Rates

Meter Size	Base Rate	Inside City	Outside City
¾ inch R	Up to 667 C.F.	$10.85	$21.69
¾ inch Duplex/I meter	Up to 1,334 C.F.	$21.70	$43.41
¾ inch B	Up to 667 C.F.	$13.20	$26.40
1 inch B	Up to 800 C.F.	$21.70	$43.41
1½ inch B	Up to 1,600 C.F.	$35.40	$70.79
2 inch B	Up to 2,600 C.F.	$54.38	$108.96
3 inch B	Up to 4,800 C.F.	$126.38	$252.76
4 inch B	Up to 8,000 C.F.	$271.87	$543.73
6 inch B	Up to 16,000 C.F.	$434.98	$869.97
8 inch B	Up to 28,000 C.F.	$696.36	$1392.72

Source: City of La Grande, 2001 Note: Basic rate is based on cubic feet.

Table VII.3 Water Used in Excess of Base Rate (per 100 cubic feet)

Occurrence/Amount	Inside City	Outside City
First 5,000 C.F.	$0.71	$1.43
Next 45,000 C.F.	$0.58	$1.16
Next 100, 000 C.F.	$.44	$.88
Excess	$.37	$.74

Source: City of La Grande, 2001

Table VII.4 Water Service Rates for Fire Protection and Standby Hydrants (Monthly Rates)

	Inside City		Outside City	
Line Size	Metered	Unmetered	Metered	Unmetered
2 inch	$7.40	$14.81	$14.79	$29.59
4 inch	$11.10	$22.20	$22.21	$44.42
6 inch	$18.50	$37.00	$37.00	$74.00
8 inch	$25.90	$51.81	$51.80	$103.59
10 inch	$36.99	$73.98	$73.97	$147.95

Source: City of La Grande, 2001

In the event that the water lines must be extended in order for a residence(s) to receive water service from the City, the fees for extensions are as follows: $28.00 per lineal foot in a gravel street, or $31.00 per lineal foot in a paved street for a six inch main line and hydrants. If a main line larger than 6 inches is required for the development, the developer of the property will pay the actual cost of the full extension. According to La Grande's Resolution Number 4356, Series 2000, the cost for the extension will not be less than the acreage/frontage assessment. For more information on the conditions involving line extension costs, please refer to the City of La Grande's Resolution Number 4356.

Fees for related City water services are also collected by the City for the following occurrences: water service during freezing events; service within an assessment district or adjacent to an existing main; delinquent accounts; and after hours service.

B. Water System Funding Options

1. Loans

A. Source: State of Oregon, Oregon Department of Environmental Quality
Name of Program: Clean Water State Revolving Fund (CWSRF) Program

Through this program, lower-than-market rate loans are available to public agencies for the planning, design and construction of wastewater treatment systems, non-point source water pollution control projects, and for estuary management plans. On a regular basis, an application period permits prospective applicants to submit preliminary applications. This program is intended for the

planning, design and construction of water pollution control facilities to attain and maintain water quality standards, which are necessary to protect beneficial uses, such as swimming, boating, farming and drinking water.

Any public agency, for publicly owned projects, is eligible for funding under this loan program. Activities that qualify for these funds include: wastewater system facility plans and studies, secondary treatment facilities, advanced wastewater treatment facilities, sludge disposal and management, interceptors, force mains and pumping stations, infiltration and inflow correction, major sewer replacement and rehabilitation, combined sewer overflow correction, collector sewers, storm water control and non-point source control.

2. Grants and Loans

A. Source: State of Oregon, Oregon Economic and Community Development Department (OECDD)
Name of Program: Safe Drinking Water Revolving Loan Fund Program

The Safe Drinking Water Revolving Loan Fund Program was created by Congress in 1996 to assist states in establishing loan financing to construct and improve local public drinking water systems in order to comply with the Safe Drinking Water Act, i.e., to protect the public health. It is intended to assist community and nonprofit, non-community drinking water systems plan, design and construct drinking water facilities needed to correct non-compliance with current or future drinking water standards and to further the public health protection goals of the federal Safe Drinking Water Act and Oregon's Drinking Water Quality Act. With regards to the type and amount of funding available under this program, the OECDD will structure a financing package that may include a Safe Drinking Water Direct Loan, as well as loans or grants from other department programs. The total loan limit per project under this program is $2,000,000.

Eligible applicants include community water systems and nonprofit, or non-community water systems. Community water systems are defined as being a public water system which has 15 or more service connections that are used on a year-round basis by residents, or which regularly serve 25 or more year-round residents. This includes any water system which is owned privately, by a nonprofit, or is a City, district or port under Oregon law. Nonprofit or non-community water systems are defined as being a public water system that is not a community water system and that regularly serves at least 25 people and is legally recognized under Oregon law as a nonprofit entity.

Program eligibility is limited to projects necessary to ensure that water systems comply with applicable requirements and to further public health protection goals of drinking water quality standards administered by the Oregon Health Division. Eligible activities include planning and preliminary engineering, design and specifications and construction of improvements to drinking water systems. The following are considered eligible program activities: All drinking water facilities necessary for source of supply, filtration, treatment, storage, transmission and

metering; the acquisition of real property directly related to or necessary for the proposed project, including rights-of-way, easements and facility sites; preliminary and final engineering, surveying, legal review and other support activities necessary for the construction of the water system; construction contingencies in approved change orders, as approved by the Oregon Economic and Community Development Department. A reasonable amount of community growth may be accommodated in the project to cover the useful life of an eligible project if that growth is based upon current and reasonable population projections agreed to by local and state land use planning authorities. Growth may not be the primary purpose for constructing the facilities; public health improvement must be the main purpose of the project.

B. *Source: State of Oregon, OECDD*
Name of Program: Water/Wastewater Financing Program

The purpose is to provide financing for the construction of public infrastructure needed to ensure compliance with the Safe Drinking Water Act or the Clean Water Act. It is intended to assist local governments that have been hard hit with state and federal mandates for public drinking water systems and wastewater systems. Applicants eligible for this program include municipalities, as described in the Special Public Works Fund Applicant's Handbook: cities, county districts, port authorities and counties, sanitary districts, tribal councils of Native American tribes, water control districts, water supply districts, water and wastewater authorities.

Activities that qualify a municipality as being eligible for funding under this program involve the issuance of a Notice of Non-Compliance to the System by the appropriate regulatory agency with the Safe Drinking Water Act or the Clean Water Act. In addition, public infrastructure required to ensure compliance by creating or improving the following: water source, treatment, storage and distribution, wastewater collection and capacity, storm system, purchase of rights of way and easements necessary for infrastructure and design and construction engineering.

The grant/loan amounts for this program are determined by a financial analysis based on a demonstrated need and the applicant's ability or inability to afford additional loans (debt capacity, repayment sources and other factors). The maximum direct loan amount under this program is $500,000 when financed with lottery funds. The maximum bonded loan, when funded through the sale of State Revenue Bonds is $10,000,000. The loans are generally repaid with Utility Revenues, General Funds or Voter Approved Bond Issues.

The maximum grant is $500,000, including the cost of issuance and debt service reserve, in the case of a bonded loan. Technical Assistance grants and loans may finance preliminary planning, engineering studies, and economic investigations to determine project feasibility. Up to $10,000 in grant funds and $20,000 in additional loan funds may be awarded to eligible applicants under 5,000 in population.

C. Existing Wastewater Funding Mechanisms

Source: City of La Grande, Oregon; Resolution Number 4338, Series 2000
Name of Program: Sewer System Development Charges and Sewer Service Rates

The City has several SDCs in place for users of the City's sanitary sewer system. These basic fees include residential, commercial and industrial user rates, sanitary and storm sewer tap charges, inspection charges and sewer main connection fees. The following tables outline the rates/fees for each of the aforementioned SDCs.

Table VII.5
Sanitary Sewer User Rate Classifications

Zone	Milligrams	Liters Lbs.	Rates
Residential I	750	0 – 1.5	$25.28 per month
			$50.57 duplex
Commercial I	0 – 240	0 – 1.5	$2.11 per 100 c.f. of water
Commercial II	241 – 475	1.6 – 3.0	$2.59 per 100 c.f. of water
Commercial III	476 – 725	3.1 – 4.5	$3.16 per 100 c.f. of water
Commercial IV	726 – 950	4.6 – 6.0	$3.79 per 100 c.f. of water
Commercial V	951 – 1200	6.1 – 7.5*	$4.30 per 100 c.f. of water
Commercial VI	Septage Haulers		$62.08 per 1000 gallons

*All users with a strength of discharge estimated in excess of 7.5 pounds of BOD or total suspended solids per 100 c.f. shall have per unit charges for discharge strength, based on actual testing of their sewer discharge. For the term of this Resolution, users with discharge strength in excess of 7.5lb/c.f. shall pay an added thirty-nine ($0.39) cents per 100 c.f. of water used for each one (1) pound increment or portion thereof.
Source: City of La Grande, 2001
Note: Users outside the City of La Grande limits will pay an additional twenty percent (20%) sewer user rate for residential and classes one (I) through six (VI).

Commercial and industrial charges that are not specifically listed within Resolution Number 4338, Series 2000, or which fall within 2 or more classifications shall be assessed based on the user's total contribution to the total waste water loading of the treatment works, as determined by the City's Engineering Division Staff. The elements to be assessed include: sewage strength, chemical composition, impact on treatment systems and delivery flow rate.

Table VII.6
Sanitary and Storm Sewer Tap Charges
(Based on 4" Taps)

Depth of Sewer Tap at Main	Gravel Street	Paved Street
0 to 8 feet	$779.00	$1,002.00
8 to 12 feet	$947.00	$1,169.00
12 to 16 feet	$1,196.00	$1,469.00
Over 16 feet* (Deposit)	$1,632.00	$2,099.00

* Total cost minus deposit.
Source: City of La Grande, 2001

These charges provide for a maximum of fifty feet of 4" diameter pipe from the property line to the tap at the public sewer. Larger pipe sizes and/or longer lengths shall be charged according to the actual cost to the City.

Table VII.7
Sewer Main Connection Fees

Depth of Sewer Tap at Main	Gravel Street	Paved Street
0 to 8 feet	$29.16/foot	$36.36/foot
8 to 12 feet	$36.36/foot	$46.58/foot
Over 12 feet	$53.52/foot	$68.64/foot

* Charges listed are per lineal foot of main.
Source: City of La Grande, 2001

For additional information on additional sanitary sewer fees, please refer to La Grande's Resolution Number 4338, Series 2000.

D. Wastewater System Funding Options

1. Overview of Available Options

There are multiple State and Federal grant and loan programs available to communities who are seeking to improve their Public Facilities. The many programs that are available are tailored to various project types, community size and community economic situation. These programs include: the Oregon Economic Development Department (OEDD); USDA Rural Development (RD); the U.S. Economic Development Administration (EDA), and the Oregon Department of Environmental Quality (DEQ). In order to identify a community's need for funding a specific public works project, the State Community Economic Revitalization Team (SCRET) created the Northwest Economic Adjustment Initiative. The Initiative has established a process whereby separate counties prioritize their potential projects prior to them being considered by funding agencies. Anderson Perry & Associates cite in the La Grande 1998 Wastewater System study that "because some of the funding programs that have been identified as secondary or backup sources of funding will use the SCRET process to actively participate in the local prioritization process and actively educate people in these agencies about the importance of their project".

2. Qualifying Options

The City currently only qualifies for low interest loans from the DEQ through the State Revolving Loan Fund (SRF). These loans and reserve funds will be used to finance improvements to the municipalities' wastewater systems. The loans will be repaid through user rates, or SDCs.

The City's population is too large for the RD funding program. These funds are not an option for the City unless RD changes the population requirement.

The EDA programs require cities to show a funding need in order to maintain, or build the utility system capacity necessary to attract and keep existing industry. At this time, the City of La Grande is unable to show such a need, but this program may be available for future improvements.

The OECDD has several programs available that include the Water/Wastewater Financing Program, Special Public Works Program, and Community Development Block Grant. The City of La Grande does not qualify for funding under the Water/Wastewater or Community Development Block Grant programs because the City's median household income is too high. The Special Public Works Program requires the identification of a business or industry and need for utility improvement in order to attract new business.

Even though most of these programs are currently unavailable to the City, they may potentially become funding alternatives in the future.

3. Grants

   A. *Source: State of Oregon*
   Name of Program: Oregon Economic Development Department, Community Development Block Grant Program

   The OECDD administers the Community Block Development Grant (CBDG), which annually receives funding for this program by the U.S. Department of Housing and Urban Development (HUD). In order to be eligible for funding under this program, the agency requires that a need must exist for the resolution of a community's current water quality compliance problem. According to the City's 1998 Wastewater System Study, the City has received several Notices of Non-Compliance, and therefore complies with this eligibility requirement.

   A second requirement for this grant program is that more than 51 percent of the inhabitants of the City must have an income rating of low-to-moderate. According to a recent income survey, 64.7 percent of the City's residents have an income rating of low-to-moderate. Having met the two requirements, the City of La Grande is therefore eligible for funding under this grant program. Grant funds are accepted year-round and are available up to an aggregate maximum of $750,000 for planning design and construction of facilities.

4. Loans

   A. *Source: State of Oregon*
   Name of Program: State Revolving Loan Fund (SRF)

   The Oregon Department of Environmental Quality administers the SRF loan program and offers low interest rate loans to public agencies for the purpose of planning, design and construction of water pollution control facilities (i.e. wastewater treatment plants). Please refer to the 1998 La Grande Wastewater System Study for more information on the rates for the SRF loan program.

B. Source: U.S. Federal Government
Name of Program: Rural Development (RD)

The Rural Development loan and direct grant program is provided by the U.S. Department of Agriculture. Under the loan program the agency purchases local bonds at rates that are below the market rates. The U.S. Department of Agriculture sets the interest rates for these loans based upon the median household incomes (MHI) of the community, as well as upon other varying factors. The RD/grant loan program appears to be a potential source of low-interest, 40-year term loan monies only. According to the 1998 Wastewater System Study, the City is not in the position to receive grants from the program. Anderson Perry & Associates recommends that this program could only be considered as a secondary, backup source of loan funds for Phase II improvements, and should not be considered for the relatively small Phase I improvements.

5. Grants and Loans

A. Source: State of Oregon
Name of Program: Water/Wastewater Financing Program

For information on this financial program, please refer to the Water System Funding portion of this Chapter, Section B, Subsection 3.

B. Source: Oregon Economic & Community Development Department (OECDD)
Name of Program: Special Public Works Program

To view the funding package for the selected alternative, please refer to the 2000 Addendum to the 1998 La Grande Wastewater System Study.

C. Source: U.S. Federal Government
Name of Program: U.S. Economic Development Administration (EDA)

The EDA grant and loan programs are available to cities for public works projects that are able to be shown as needed to maintain, or build the capacity necessary to attract new and keep existing industry. Funds are also available for the purpose of stimulating a community's economy, as the goal of this program is to create and retain jobs. This agency has invested money in several projects located in Eastern Oregon over the past few years for Public Works Improvement Projects in communities where businesses were locating or planning to locate in the near future.

E. Proposed Stormwater System Funding Mechanisms

Source: City of La Grande, Oregon
Name of Program: Proposed Surface Water System Development Charges

The City of La Grande has instituted a Systems Development Charge and a Stormwater Utility Fee for the City's Storm Sewer Utility Fund. The fee will provide the City with a

method for funding storm sewer system operations, maintenance and improvements. At the present time, neither rates nor a date of implementation has been established.

F. Stormwater System Funding Options

For information on the funding mechanisms available for the City's Stormwater System, please refer to the Section F of this Chapter, Special Public Works Fund.

G. Existing Transportation System Funding Mechanisms

1. *Source: City of La Grande, Oregon; Resolution Number 4155, Series 1992*
Name of Program: Street User Fees (System Development Charges)

As stated in Ordinance Number 2708, Series 1985, the City of La Grande has established a fund for the purpose of generating monies for the construction, reconstruction, maintenance and repair of streets. The City Council has determined that City streets benefit all citizens of La Grande, and therefore, has concluded that the citizens should share in the costs of construction, reconstruction, major maintenance and repair of existing streets. The user fee is charged to each City utility rate payer within the City Limits; the user fee appears on either the rate payer's water or sewer statement. A low-income senior citizen may be entitled to a reduced user fee as established by Resolution. All street user fees are placed into a separate fund and are only used for the aforementioned purposes.

As stated in Resolution Number 4155, Series 1992, the Street User Fees are as follows:

Table VII.8
Street User Fees

Effective Date	Regular	Senior Citizens
July 1, 1992	$3.00/month	$1.50/month
July 1, 1993	$3.50/month	$1.75/month
July 1, 1994	$4.00/month	$2.00/month

Source: City of La Grande, 2001

H. Transportation System Funding Options

1. Grants

A. Source: State of Oregon, Department of Transportation (ODOT) and the Department of Land Conservation and Development (DLCD)
Name of Program: Transportation Growth Management (TGM) Grant Program

The Transportation Growth Management Grant Program was enacted to integrate transportation planning with the Statewide land use planning program to achieve benchmarks for mobility, air quality and community design. The program's mission is: to enhance Oregon's livability, foster

integrated land use and transportation planning and encourage development that results in compact, pedestrian, bicycle, and transit-friendly communities.

Through legislative approval, approximately $6,000,000 is available for TGM grants for the 1999-2001 biennium planning period. The TGM program receives support from federal transportation funds; each grant requires a local match of approximately 10 percent. This program has no set minimum or maximum amount for the TGM grants.

Awards in the 1997-1999 biennium averaged around $60,000. Individual awards ranged from $3,200 to $200,000. Past grant amounts for Category 1 ranged from $4,250 to $180,000, Category 2 ranged from $11,000 to $264,200, while Category 3 ranged from $12,120 to $125,000.

Cities, counties and metropolitan planning organizations are the principal recipients. Others eligible include councils of government when acting on behalf of governments, and special districts for cooperative and urban service agreements.

The eligible activities for the available grants fall into three categories:

- Category 1 grants help local governments develop transportation system plans and ordinances to implement the Transportation Planning Rule, as well as the 1998 Oregon Highway Plan.

- Category 2 grants are used to help local governments reconsider land use patterns in order to meet transportation needs by planning for compatible land uses along state highways to implement the 1998 Oregon Highway Plan.

- Category 3 grants enable local governments to implement plans that support an efficient and balanced transportation system.

B. *Source: State of Oregon, ODOT*
Project Type: Bike and Pedestrian Grants

ODOT's Bike and Pedestrian Program offers two programs to assist in the development of walking and bicycling improvements: local grants and Small-Scale Urban Projects. Cities and counties with projects on local streets are eligible for local grant funds. An 80 percent state and 20 percent local match ratio is required in order to qualify. Suitable projects include: curb extensions; pedestrian crossings; intersection improvements; shoulder widening and re-striping for bike lanes.

The second program concerns projects on urban state highways with little or no right-of-way taking and few environmental impacts. These projects are eligible for Small-Scale Urban Project Funds. Both of these programs are limited to projects costing up to $100,000. For projects that cost more than $100,000 and involve acquisition of the right-of-way, or have significant

environmental impacts should be submitted to ODOT for inclusion in the "STIP".

C. *Source: State of Oregon, ODOT*
Name of Program: Transportation Safety Grant Program

The objective for this program is to reduce the number of transportation-related accidents and fatalities through coordination with multiple other state programs. Managed by ODOT's Transportation Safety Section (TSS), these funds are intended to aid a program for three years. Programs eligible for funding include: impaired driving, youth, pedestrian, occupant protection, speed, enforcement, bicycle and motorcycle safety.

TSS grants the available funds each year by way of a report that identifies the major safety programs, offers suggestions to counter measures to existing safety issues, and lists the successful projects that are selected for funding. In this manner there is no application process.

D. *Source: State of Oregon*
Name of Program: Special Transportation Fund (STF)

The STF grants funds in order to maintain, develop and improve transportation services for persons with disabilities, as well as for people over 60 years of age. Three quarters of the funds are distributed to mass transit districts and transportation districts. The counties are eligible for the funds on a per capita formula where such districts do not exist. The remaining funds are distributed on a discretionary basis.

E. *Source: State of Oregon, Oregon Economic Development Department (OECDD) and ODOT.*
Name of Program: Immediate Opportunity Grant Program

OECDD and ODOT designed a program in order to assist local and regional economic development efforts. The program is funded by state gas tax revenues and has approximately $7 million per year available for grants. Eligible projects and activities include: improvement of public roads; inclusion of an economic development-related project of regional significance; creation or retention of primary employment; and the ability to provide local funds (50/50) to match grant. The maximum amount of any grant under the program is $500,000.

F. *Source: U.S. Federal Government*
Name of Program: Enhancement Program

This is a federally funded program for projects which demonstrate a link to the "intermodal transportation system, compatibility with approved plans, and local financial support." In order to qualify for this program a 10.27 percent local match is required. "Within the five Oregon regions, the funds are

distributed on a formula based on population, vehicle miles traveled, number of vehicles registered and other transportation-related criteria."

G. *Source: Federal Government*
Name of Program: Highway Bridge Rehabilitation or Replacement Program (HBRR)

As previously mentioned in the Planned Improvements section, federal funding is available for the replacement or rehabilitation of bridges from all functional categories. A portion of the HBRR is allocated for the improvement of bridges under local jurisdictions. In order to determine the amount available for a particular project, a "quantitative ranking system is applied to the proposed projects based on a sufficiency rating, cost factor and load capacity"; they are ranked against other Statewide projects, and require 10 percent matches from both the state and local jurisdiction.

H. *Source: State of Oregon*
Name of Program: Emerging Small Business Program

The Emerging Small Business Program can provide transportation project funding in exchange for the governing body agreeing to award the construction contract to an Emerging Small Business contractor.

2. Loans

A. *Source: State of Oregon, Department of Transportation (ODOT)*
Name of Program: Oregon Transportation Infrastructure Bank (OTIB)

This program is a revolving loan fund which was designed to promote innovative transportation funding solutions. Eligible applicants for the OTIB program include: cities, counties, transit districts, other special districts, port authorities, tribal governments, state agencies and private for-profit and not-for-profit entities. OTIB currently offers direct loans for eligible projects. These loans may be funded from available OTIB resources or through the sale of revenue bonds.

In order for projects to be considered eligible for funding under this program, they must comply with the eligibility for funding regulations stated in Title 23 or Title 49 of the Code of Federal Regulations (CFR). However, eligible projects generally include: Highway projects such as roads, signals, intersection improvements and bridges; transit capital projects such as buses, equipment and maintenance or passenger facilities and bikeway or pedestrian access projects within the highway right-of-way.

In order to be federal-aid eligible, roads must be open to public travel and functionally classified as a major collector or higher. Eligible project costs include preliminary engineering, required environmental studies, acquisition of right-of-way, equipment, construction including project management and engineering, inspections, financing costs and contingencies.

I. Existing Parks and Recreation Funding Mechanisms

Source: City of La Grande, Oregon; Resolution Number 4339, Series 2000, Article 7.1 of the Land Development Code
Name of Program: Parks and Recreation Systems Development Charge (SDC)

Per the recommendation of the Parks and Recreation Advisory Committee and Planning Commission, a Systems Development Charge (SDC) of $525.00 per new dwelling unit constructed in the City of La Grande or its urban growth boundary has been established for the purpose of generating funds for parks and recreation capital improvements.

J. Special Public Works Fund

Source: Oregon Economic & Community Development Department (OECDD)
Type of Funds Available: Loans and Grants
Name of Program: Special Public Works Fund

The purpose of the Special Public Works Fund is to create jobs, especially family-wage jobs, for Oregonians; loans and grants to construct public infrastructure to support industrial/manufacturing and eligible commercial economic development. "Eligible commercial" means commercial activity that is marketed nationally or internationally and attracts business from outside Oregon. Examples include the Oregon Coast Aquarium, OMSI, Baker City Oregon Trail Interpretive Center. While this is primarily a loan program, grant funds are available based upon economic need of the municipality.

Eligible applicants for this program are municipalities as described in the Special Public Works Fund Applicant's Handbook, which generally includes: cities, county service districts, port authorities and counties, sanitary districts, tribal councils of Native American tribes, water control districts, water supply districts, water and wastewater authorities.

In order for a municipality to be eligible for loans and/or grants under this program, public infrastructure is a requirement so as to enable eligible businesses to locate or expand: airports, design and construction engineering, port facilities, and publicly owned railroad spurs and sidings. Necessary infrastructure for the purchase of rights of way and easements include: roadways, bridges, storm drainage, wastewater collection and capacity, and water source, treatment, storage and distribution.

In addition, specific industrial/manufacturing and eligible commercial businesses must commit to the creation of permanent, full-time-equivalent jobs for a municipality to be eligible. Up to $10,000 in grant funds may be awarded for each full-time-equivalent job created (based on demonstrated financial need); of jobs created, 30% must be "family wage" jobs. Another requirement for eligibility is a public and/or private investment equal to at least twice the infrastructure cost, with the infrastructure built to the correct capacity for the purpose of being able to adequately support industrial and manufacturing development.

For distressed communities, meaning communities without firm business commitments, grant funds of up to $250,000 per project may be awarded. These types of communities were formerly known as "severely affected" communities. Technical Assistance grants and loans may finance preliminary planning, engineering studies and economic investigations to determine infrastructure feasibility for these communities.

The Special Public Works Fund provides grants and loans to eligible communities by conducting a financial analysis based on a demonstrated need and the applicant's ability or inability to afford additional loans (debt capacity, repayment sources and other factors). Loans are generally repaid with Utility Revenues, Local Improvement Districts, General Funds or Voter Approved Bond Issues. Financing limits depend on the project: up to $10,000,000 Bond Loan, up to $1,500,000 Collateral Loan, up to $500,000 for grants, and for technical assistance, up to $10,000 in grant funds and $20,000 in additional loan funds may be awarded to eligible applicants under 5,000 in population.

K. Bonds

1. *Source: General Municipality*
   Name of Program: General Obligation Bonds

   General Obligation Bonds are voter-approved and represent the least expensive borrowing mechanism that is available to municipalities. These types of bonds are primarily supported by a separate property tax levy, that has been approved explicitly for the purpose of retiring the debt. Accordingly, the levy does not terminate until all the remaining debt is paid. The tax is levied proportionately throughout the taxing jurisdiction based on the assessed value of the property. Typically, general obligation debts result from public improvement projects that will benefit the entire community.

   "State statutes require that the general obligation indebtedness of a municipality not exceed 3 percent of the real market value of all taxable property in the City. Since general obligation bonds would be issued subsequent to voter approval, they would not be restricted to the limitations set forth in Ballot Measures 5, 47 and 50. Although new bonds must be specifically voter-approved, Measure 47 and 50 provisions are not applicable to outstanding bonds, un-issued voter-approved bonds, or refunding bonds."

2. *Source: General Municipality*
   Name of Program: Limited Tax Bonds

   Limited Tax General Obligation Bonds (LTGO's) are comparable to general obligation bonds in that they represent the obligation of the municipality. LTGO's do not require voter approval due to the fact that the municipality's obligation is limited to its current revenue sources and is not secured by the general public's ability to raise taxes.

   In addition, since the LTGO's are not secured by the full taxing power of the issuer, the bond represents a higher borrowing cost than the general obligation bonds. "The municipality must pledge to levy the maximum amount under constitutional and statutory limits, but not the unlimited taxing authority with GO bonds. Because

LTGO's are not voter approved, they are subject to the limitations of Ballot Measures 5, 47, and 50."

3. *Source: General Municipality*
Name of Program: Bancroft Bonds

According to Oregon Statute, municipalities are permitted to issue Bancroft Bonds which guarantee the City's full commitment and credit to assessment bonds. The bonds then become general obligations of the City, although they are paid with assessments. Typically, these bonds provide a City with the ability to pledge its credence and credit in order to obtain a lower borrowing cost and therefore, avoid obtaining voter approval. Since Bancroft bonds are not voter approved, the taxes levied to pay debt service on them are subject to the limitations of Ballot Measures 5, 47, and 50. As a result, since 1991, Bancroft bonds have not been used by municipalities who were required to compress their tax rates.

Appendix

The following appendix contains the necessary exhibits and figures that illustrate the existing public facilities in La Grande, and indicate the location of new and proposed facility projects.

A-1	Water System Recommended Improvements[1]	Figure U6-2
A-2	Existing and Future High Level Distribution Systems[1]	Figure U6-1
A-3	Possible Low-Low Level Distribution System[1]	Figure U6-3
A-4	Wastewater Vicinity Map[2]	Figure 1-2
A-5	Existing Wastewater ICASD Collection System[2]	Figure 3-1
A-6	Surface Water Study Area[3]	Figure 5-1
A-7-1	Surface Water Alternative D Management Plan[3]	Figure 5-14
A-7-2	Surface Water Alternative D Management Plan[3]	Figure 5-14
A-8	Recommended Roadway and Intersection Projects[4]	Table 3
A-9	Recommended Pedestrian System Improvements[4]	Table 4
A-10	Recommended Bicycle System Improvements[4]	Table 5
A-11	Recommended Roadway Plan[4]	Figure 7-4
A-12	Recommended Pedestrian Plan[4]	Figure 7-5
A-13	Recommended Bicycle Plan[4]	Figure 7-6

[1] Source: City of La Grande, Oregon Water System Master Plan by Anderson Perry & Associates, (1998).
[2] Source: City of La Grande, Oregon Wastewater Facilities Plan by Anderson Perry & Associates, (1998).
[3] Source: City of La Grande, Oregon Surface Water Management Plan by Anderson Perry & Associates, (1998).
[4] Source: City of La Grande & Island City, Oregon Transportation System Plan by McKeever/Morris Inc. and David Evans and Associates Inc., (1999).

Objective

1. To plan and develop a timely, orderly, and efficient arrangement of public facilities and services to serve as a framework for urban and rural development.

2. To encourage and provide for a coordinative, cooperative program involving all affected public agencies in the La Grande areas for the acquisition, development and maintenance of public facilities.

3. To insure that the needs for public facilities, including schools, parks, and other public administrative and operational buildings, will be provided in an orderly, economical manner consistent with an overall plan for the future development of the community.

Recommendations

1. Identification and prior acquisition should be made where possible, of areas to be used for future schools, parks, open space, fire, police and other related public facilities.

2. That a capital improvement plan be maintained and reviewed yearly.

3. Fire stations should be located on major streets in a manner that will facilitate their response to all parts of their protection territory, and shall be as close to high hazard loss areas as is feasible.

4. Sites for future public facilities should be acquired in advance of actual need, in order to obtain maximum economy in site acquisition.

5. In evaluation and selection of sites for public administrative and operational facilities, the Planning Commission should base its recommendation upon the consideration of relevant planning principles including land use, physical site demands and development potentials, accessibility, and acquisition and development costs and the needs and development plans of other public agencies in the area.

6. In the acquisition of property for public administrative and operation use, the proceedings of condemnation should be used only as a last resort, and should be used only to acquire property in accordance with the Comprehensive Plan.

7. The City should pledge cooperative development of school and parks on a continuing basis, and should encourage the school district to actively participate on a continuing basis in the planning, acquisition and development of future sites for joint utilization.

8. Public agencies should observe the spirit as well as the letter of all local zoning, subdivision and similar regulatory ordinances, and all local development plans when siting public facilities.

Statewide Planning Goal 12 - Transportation

The City has adopted a Transportation Plan for the UGB which shall be considered a support document to the Comprehensive Land Use Plan. All major transportation needs are discussed within the Transportation Plan. Please refer to Volume I of the adopted La Grande/Island City Transportation System Plan.

The Transportation Planning Goals set forth in the La Grande/Island City Transportation System Plan, are as follows:

Transportation Access and Options

1. Ensure a safe and efficient transportation system allowing access into and through the community for all users, including the transportation disadvantaged.

2. Improve personal mobility and access to transportation services by expanding the variety and availability of travel modes throughout the region.

3. Improve the movement of goods and delivery of services throughout the region using a variety of travel modes.

4. Provide connectivity between transportation options and to locations outside the study area.

5. Improve the overall safety and efficiency of transportation system operations by: 1) Managing access to and development along State-maintained highway corridors; 2) Promoting transportation demand management strategies; and 3) Adopting Ordinances to ensure safe and convenient connections between travel modes.

6. Provide adequate mobility and access for emergency services.

Transportation System

1. Ensure adequate capacity for future travel demand on collector and arterial streets and on the local highways to enable economic development in the community.

2. Improve the local circulation system to reduce the community's reliance on U.S. Highway 30 (Adams Avenue) and Oregon State Highway 82 (Island Avenue).

3. Ensure the integration of adequate bike and pedestrian pathways through the community, particularly to connect schools and activity centers.

4. Protect the function of existing and planned roadways as identified in the Transportation System Plan through the application of appropriate access management techniques.

Land Use Compatibility

1. Improve area-wide quality of life by: 1) Increasing the compatibility of regional transportation system development with existing and future land use patterns, and 2) Minimizing the impacts of transportation system development on the natural and built environment.

2. Provide a transportation system that attracts people to live and work in the area and supports and enhances the local economy, including the recreation and tourism industry.

3. Enhance or maintain a balance between jobs and housing in sub-districts of the urban area in order to reduce the number and length of trips.

Funding

1. Develop a transportation system that is economical and affordable for the users and for the community to construct and maintain.

2. Ensure sustained funding for needed transportation improvement projects.

Coordination

1. Develop recommendations that ensure the Transportation System Plan will be consistent with the goals, policies, and action strategies of the Oregon Transportation Plan, Statewide Planning Goals, Oregon Benchmarks, the Transportation Equity Act for the Twenty-First Century (TEA-21), the Clean Air Act Amendments (CAAA), and the Americans with Disabilities Act (ADA).

2. Coordinate with the Oregon Department of Transportation to implement the highway improvements listed in the Statewide Transportation Improvement Program (STIP) that are consistent with the Transportation System Plan.

3. Provide timely notice to ODOT regarding any land use action on or adjacent to a State transportation facility.

Implementation

1. The Transportation System Plan is an element of the Comprehensive Plans for La Grande and Island City.

2. Maintain a Transportation System Plan that is flexible and adaptable to changing future conditions.

Statewide Planning Goal 13 - Energy Conservation

Through the plan and implementing ordinances of the City, it is apparent that energy conservation can be achieved. The residential and commercial density factors allow intense development of their respective uses while controlling growth in the urban area. The single family residential zone has no maximum density limit except for a height and landscaping requirement. The commercial and industrial zones have no minimum lot size or setback. The City Zoning Ordinance also allows planned unit development and neighborhood convenience centers in residential classifications.

The City is exploring its geothermal potential independently and in concert with the major heat load institutions in the La Grande area. The City will encourage solar orientation in the subdivision review process in order to aid the further application of the solar access ordinance. The City has potential for utilizing wind power and will encourage implementation of the appropriate wind generation technology in this area, as it becomes available.

The City is also proposing to develop its hydro energy from the Beaver Creek watershed. This may occur in two projects with a hydroelectric plant and also to directly drive turbine pumps for the new City well.

Objective –
1. To conserve energy.

2. Land and uses developed on the land be managed and controlled so as to minimize the conservation of all forms of energy, based upon sound economic principles.

Goals –
1. Encourage the use of renewable energy resources.

2. Encourage walking and/or bicycling between place of business and place of residence.

Policies –
1. That high density residential, commercial and industrial uses be located so as to minimize energy consumption.

2. That maximum use of renewable energy resources be developed to preserve the non-renewable resources.

3. Sidewalks will be required on both sides of each street plated.

4. Sidewalk improvement will be included where necessary when the adjoining street is undergoing significant street reconstruction.

Recommendations –
1. That high density residential, commercial and industrial uses be located along the major arterial systems to achieve greater energy efficiency.

2. That the City investigate the use of geothermal, solar, wind, and water resources for energy production in the La Grande Area.

Statewide Planning Goal 14 - Urbanization

The La Grande Urban Area Comprehensive Plan addresses and complies with the urbanization goal. As a result of the needs analysis considered under the separate goals for land use planning through analyzing currently developed property, vacant property, and our future needs for the different land use classifications, an Urban Growth Boundary has been established as part of the Plan. Also taken into consideration in this analysis is the availability of the City to provide urban services at a reasonable cost in order that the potential for future development is not unnecessarily burdened with excessive costs of extending those services.

Natural barriers to development and resource land considerations have also been incorporated into the justification for the Urban Growth Boundary.

A. Strategies and Policies for Efficient Conversion of Urbanizable Land

This section discusses strategies and policies for the efficient conversion of urbanizable land to urban uses within the La Grande Urban Growth Boundary.

1. Residential Development

ORS 197.296(7) requires that in establishing that actions and measures … demonstrably increase the likelihood of higher density residential development, the local government shall at a minimum ensure that land zoned for needed housing is in locations appropriate for the housing types … and is zoned at density ranges that are likely to be achieved by the housing market ... Actions or measures, or both, may include but are not limited to:

a. Increases in the permitted density on existing residential land;

b. Financial incentives for higher density housing;

c. Provisions permitting additional density beyond that generally allowed in the zoning district in exchange for amenities and features provided by the developer;

d. Removal or easing of approval standards or procedures;

e. Minimum density ranges;

f. Redevelopment and infill strategies;

g. Authorization of housing types not previously allowed by the plan or regulations; and

h. Adoption of an average residential density standard.

Policies: These policies are included to ensure efficient use of land within the Urban Growth Boundary (UGB) and that needed density ranges and housing types are provided.

1. The City should examine measures to encourage residential densities to approach the maximum allowed in each zone. Such measures could include density bonuses (allowing increased densities in exchange for a certain percentage of housing in a development reserved for lower-income groups), easing of parking restrictions for senior housing complexes, and easing of regulations to encourage infill development;

2. The City should examine measures that would increase the likelihood that the need for very low-income and/or government-assisted housing is met, as follows:

   a. Provide financial incentives to developers of multi-family units to build more low-cost units. This could be done as a part of the Federal Low Income Housing Tax Credit Program.

   b. Assist in the application (with a Housing Authority, non-profit organization or private developer) for additional housing assistance for the construction of low-cost units from Federal and/or State sources. The data presented in this document can be used to document the future need for such housing.

3. The City should implement the following principles to ensure that land zoned for higher densities is in locations appropriate for the housing types needed when it rezones Union County zoned land for residential development:

   a. Higher density residential designations should be located near existing or planned employment centers, neighborhood commercial centers, schools, and community parks;

   b. Higher density residential designations should be dispersed across the community as opposed to being concentrated in one area.

2. Conversion of Urbanizable Land Based on Provision of Adequate Public Services and Facilities
   Policies:

   a. The conversion of urbanizable lands to urban uses shall take into account the carrying capacities of public facilities and services, and no such conversion shall be permitted that exceeds such capacities.

   b. The City shall require full urban services to be provided to all urban-level development within the Urban Growth Boundary.

   c. The City shall require annexation prior to providing urban services and permitting urban-level development.

   d. The City shall require detailed land use and public facilities plans for conversion areas prior to approval of and as part of the conversion plan amendment.

e. Lands which are brought into the Urban Growth Boundary which are in resource zoning shall retain that zoning as a holding zone and be considered urbanizable land until it can be provided with urban services and annexed.

3. Urban Growth Boundary Management Agreement
The City has reviewed its Urban Growth Boundary Management Agreement with Union County regarding land use responsibilities within the Urban Growth Boundary and the Agreement is in compliance with Goal 14 and the Administrative Rule.

4. Urban Reserve Planning
The City should consider adopting an Urban Reserve Area outside of its Urban Growth Boundary in order to preserve land for eventual urbanization and to restrict development from limiting eventual urban uses. If an Urban Reserve Area is adopted, it must meet the requirements of OAR 660-21.

B. Review Modifications to the Urban Growth Boundary
This section reviews the existing Urban Growth Boundary and proposes modifications of the Boundary based on development suitability and good urban growth management strategies.

ORS 197.296(4) states that if the … urban growth boundary does not contain sufficient buildable lands to accommodate housing needs for 20 years at the actual developed density that has occurred since the last periodic review, the local government shall take one of the following actions:

1. Amend its Urban Growth Boundary to include sufficient buildable lands to accommodate housing needs for 20 years at the actual developed density during the period since the last periodic review or within the last five years, whichever is greater. As part of this process, the amendment shall include sufficient land reasonably necessary to accommodate the siting of new public school facilities. The need and inclusion of lands for new public school facilities shall be a coordinated process between the affected public school districts and the local government that has the authority to approve the Urban Growth Boundary;

2. Amend its comprehensive plan, functional plan or land use regulations, pursuant to ORS 197.296 (5) to include new measures that demonstrably increase the likelihood that residential development will occur at densities sufficient to accommodate housing needs for twenty (20) years without expansion of the Urban Growth Boundary. A local government or metropolitan service district that takes this action shall monitor and record the level of development activity and development density by housing type following the date of the adoption of the new measures; or

3. Adopt a combination of the actions described in paragraphs (a) and (b) of this subsection.

C. Statewide Planning Goal Compliance
Whenever a change in the Urban Growth Boundary (UGB) is considered, the governing body proposing such change shall address the factors found in Goal 14 - Urbanization.

ORS 197.298 establishes a hierarchy for consideration of addition of various types of land adjacent to Urban Growth Boundaries. Under this hierarchy, farm and forest land cannot be added to an Urban Growth Boundary until all adjacent land in other land categories is considered and either rejected or exhausted. The ability to reject certain categories of land to serve identified land needs is allowed, but for certain specified reasons only.

The categories of land are, in priority order, as follows:

1. Land designated as "urban reserve;"

2. Nonresource land and "exceptions land;"

3. Marginal land (available to Lane and Washington County only); and

4. Farm and forest resource land, with the most productive resource land given the lowest priority for inclusion in an Urban Growth Boundary.

Land of lower priority may be included in an Urban Growth Boundary if land of higher priority is found to be inadequate to accommodate the amount of land estimated to be required for one or more of the following reasons:

1. Specific types of identified land needs cannot be reasonably accommodated on higher priority lands;

2. Future urban services could not reasonably be provided to the higher priority lands due to topographical or other physical constraints; or

3. Maximum efficiency of land uses within a proposed Urban Growth Boundary requires inclusion of lower priority lands in order to include or to provide services to higher priority lands.

Expansion of an Urban Growth Boundary requires acknowledgement by the State, which is a determination that the proposed amendment is consistent with the applicable Statewide Planning Goals. Such proposals shall address all legal standards relevant to an Urban Growth Boundary amendment set forth in ORS 197.298, Statewide Planning Goal 14, OAR 660-004-0010, as well as any applicable local standards.

Goal 14: Requires that Establishment of and Change to the Urban Growth Boundary be Based Upon Consideration of the Following Factors:

1. Demonstrated need to accommodate long-range urban population growth requirements consistent with Land Conservation Development Commission (LCDC) goals.

2. Need for housing, employment opportunities, and livability.

3. Orderly and economic provision for public facilities and services.

4. Maximum efficiency of land uses within and on the fringe of the existing urban area.

5. EESE (Environmental/ Economic/Social/Energy) consequences.

6. Retention of agricultural land, with Class I being the highest priority for retention and Class VI the lowest priority.

7. Compatibility of the proposed urban uses with nearby agricultural uses.

D. Urban Growth Boundary Modification Criteria

1. State Requirements. The City shall use the seven Goal 14 factors listed above and the hierarchy for consideration of additional land as described in ORS 197.298 to evaluate the priority of expansion areas to the Urban Growth Boundary.

2. Local Requirements. The City shall consider other additional factors in evaluating proposed expansion areas to the Urban Growth Boundary, as follows:

   a. Feasibility to serve the expansion area at reasonable cost and with minimum impacts on existing development. Development should not conflict with planned public facilities on urbanizable land.

   b. Topography of the proposed expansion area and implications for requirements for sewer service (gravity flow vs. pumping stations).

   c. Groundwater resources within the proposed expansion area that could be developed for addition to the City's water system at reasonable cost.

   d. Existing or planned capacity of transportation systems to serve the proposed expansion area.

   e. Proximity and access of the proposed expansion area to schools, parks, bikeways, recreational resources, shopping, and employment.

   f. Environmental and/or natural resource limitations or hazards.

   g. Impact of proposed expansion area on prime agricultural lands, irrigation districts, and agriculture industry facilities.

   h. Impact of proposed expansion area on open space and other natural resource features.

   i. Consideration of potential land use conflicts created by proposed expansion areas and compatibility with existing land use pattern.

   j. Visual impact of development of the proposed expansion area.

BACKGROUND INFORMATION

THE BACKGROUND INFORMATION PROVIDED IN THIS SECTION WAS A PART OF THE FACTUAL BASE CONSIDERED IN PREPARING THE PLAN MAP AND ARRIVING AT THE PLAN OBJECTIVES, DEVELOPMENT POLICIES AND IMPLEMENTATION RECOMMENDATIONS.

The considerations taken into account in plan preparation can generally be classified as socio-economic, use, environmental, and governmental factors. The various elements of each of these classifications are illustrated below and are outlined in the following pages of this section.

LAND USE PLAN CONSIDERATIONS

SOCIO-ECONOMIC FACTORS	USE FACTORS
Population	Existing Uses
Employment	Zoning
Community Survey	Housing Conditions
	Parcel and Ownership Date
ENVIRONMENTAL FACTORS	**GOVERNMENTAL FACTORS**
Soils Conditions	Streets and Walks
Slope	Water Supply
Flood Hazards	Sewage Disposal
Resource Values	Schools
	Other Services and
	Facilities

Those background elements that were suitable for summarization and/or mapping are found in the following subsections addressing the 14 Statewide Planning Goals.

The Statewide Planning Goals and Guidelines are addressed in this Plan by categorizing the City's objectives, policies, and recommendations into the 14 Statewide Goals, with each goal topic having the City's objectives, policies and recommendations.

Summaries of the data, maps, and charts that were developed from which the objectives, policies, and recommendations are based are included in this section.

Existing Land Uses

One of the basic steps in development of a Comprehensive Plan for a community is the preparation of an existing land use map, and an analysis of the land use pattern. Without a thorough knowledge of the existing patterns of development, it is not possible to adequately plan for the future.

The land use inventory locates the established land uses, those areas presently being used for residential neighborhoods, for commercial shopping areas, for industrial, etc., and identifies some possible land use conflicts which should be recognized by a plan.

With basic land use pattern of La Grande being more or less stable in the past, conflicts have arisen from the mixture of incompatible land uses. This transition or mixture of incompatible uses is a result of one use gradually being overtaken by another use through a period of time. An example of this is in once predominately residential areas immediately adjacent to the City's central business district, old residential properties give way to commercial development as they become available, and the line between the business district and adjacent residential areas become unclear.

Existing residential densities tend to influence the future character of residential neighborhoods, and of the City as a whole since they provide a frame of reference with which local residents tend to distinguish between, for example, "high" density of apartment dwelling, and "low" density development that characterize single-family residential neighborhoods.

Since residential uses generally occupy the greatest amount of land in a community, residential densities tend to determine the overall quantity of land that will be devoted to urban purposes.

More importantly, residential densities provide a basis for determining the appropriate size and location of such fixed public investments as major streets, sewer trunks, and laterals, and water mains. The adequate siting of fire stations, schools, parks, and other public service facilities is also directly related to the pattern of residential densities. Since these facilities must serve the present as well as the future needs, a significant departure from existing density levels should be carefully considered.

Residential Land Uses

Residential uses account for the largest single major use of developed land in the UGB. All of the two-family and multi-family units are located in the City. Residential development in the City is fairly compact. There are small areas of vacant land and agricultural uses among the residential uses but this is mostly on the fringe of the City. La Grande has a few new residential areas that have been developed within the last ten years but the majority of residences are over ten years of age. There are many two-story homes built in the 20s and 40s, some of which are being converted to apartments near the central business area.

Prior to the later 1960s essentially all residential development was single family or site constructed housing. In the 1970s this began to change. Several developments for mobile homes were constructed on the east edge of the City. Apartment projects were built in all quadrants of the City and about one half or 250 units received some type of renter subsidy.

Single family housing construction has continued with several small subdivisions on the edge of the City.

Commercial Land Uses

Commercial land uses, generally encompass activities in the retailing, warehousing and service functions. Commercial uses are dispersed throughout the urban area.

Commercial development has occurred primarily along Adams Avenue, from the west City limits to the south City limits, with the core of the central business district being concentrated between Third, Spruce, and Washington and Jefferson. This core area contains approximately 73 gross acres, 50 net acres with an estimated 978,792 square feet of gross floor area, and a total of 238 commercial, residential, governmental, fraternal, and transient establishments.

Surrounding the core area in the fringe is a conglomerate of marginal and non-C.B.D. activities. The commercial uses located outside of the C.B.D. represent a variety of activities, although the most numerous are gasoline service stations and grocery stores.

The other major area of commercial activity is that strip along the Oregon State Highway 82 (Island Avenue), going toward Island City, consisting of primarily highway oriented activities such as gas service stations, restaurants, and transient establishment. The exception to the above is the development of the La Grande Town Center, which covers approximately 12 acres and 133,000 square feet of gross floor area, with 15 commercial establishments.

Industrial Land Uses

Industrial land uses in the La Grande urban area occupy approximately 128 acres, with 76 acres (60%) of which are located in the City. The major type of industrial uses located in the La Grande area reflects agricultural and forest related resources with over three-fourths of the industrially used land being occupied by enterprises engaged in lumber and wood products manufacturing or food products processing. Most of the industrial activities are located adjacent to the Union Pacific Railroad.

The industrial development in the past has been primarily agricultural or forest related, but there exists now a definite trend of other more diversified industrial uses that are locating in the La Grande area.

As noted in earlier planning reports, a significant proportion of La Grande's heavy industrial base is located in the industrial park near Island City, outside of our Urban Growth Boundary.

Table 8 shows the existing acreage of land inside and outside the City limits, within the Urban Growth Boundary for the various land uses discussed.

Public and Semi-Public Land Uses
Approximately 308 acres of land in the urban growth area is devoted to public and semi-public uses. Of this 308 acres, 207 acres (67%) is occupied by either schools, churches, or cemeteries. Approximately 261 acres (85%) of the total public and semi-public land uses are within the City limits.

Agricultural Land Uses

The Urban Growth Boundary contains very few parcels of ground that are being used for agricultural production. There are approximately 160 acres of land that is used for pasture or being cultivated that is composed of four parcels of property ranging in size from 20 to 80 acres. Each of these parcels border the City limits and are proposed for urban expansion.

TABLE 8. WITHIN UGB, OCTOBER 11, 1983

	Occupied	**Vacant**	**Total**
Commercial	210	116	326
Industrial	219	205	424
Medium Density Residential	1,385	316	1,796
High Density, Residential	179	54	233

Soils Evaluation

Soils in the La Grande Urban Development boundary are predominately the La Grande, Catherine, Palouse, Oxbow, Waha, and Hoopal series. A major consideration with reference to soil types is its capability or suitability for field crops. Soils are classified into eight classes with reference to their limitations.

Within the La Grande Urban Development boundary, four of the eight soil classes are predominate. They are Class II, Class III, Class VI, and Class VIII. Well over fifty percent of these soils are presently developed with one type of urban use or another.

Class I	-	Soils have few limitations that restrict their use.
Class II	-	Soils have moderate limitations that reduce the choice of plants or that require moderate conservation practices.
Class III	-	Soils have severe limitations that reduce the choice of plants, require special conservation practices, or both.
Class IV	-	Soils have very severe limitations that reduce the choice of plants, require very careful management, or both.
Class V	-	Soils are not likely to erode but have other limitations, impracticable to remove, that limit their use largely to pasture, range, woodland, or wildlife.
Class VI	-	Soils have severe limitations that make them generally unsuited to cultivation and limit their use largely to pasture or range, woodland, or wildlife.
Class VII	-	Soils have very severe limitations that make them unsuited to cultivation and that restrict their use largely to pasture or range, woodland, or wildlife.
Class VIII	-	Soils and land forms have limitations tat preclude their use for commercial plants and restrict their use to recreation, wildlife, water supply, or to aesthetic purpose.

Capability subclasses are soil groups within one class; they are designated by adding a small letter, e, w, or s, to the class numeral, for example IIe. The letter e shows that the main limitations is risk of erosion, unless close-growing plant cover is maintained; w shows that water in or on the soil interferes with plant growth or cultivation; and shows that the soil is limited mainly because it is shallow, droughty, or stone.

Of the six soil series for the La Grande area, the major series is La Grande. This series consists of somewhat poorly drained soils formed in silty alluvium over gravel, gently sloping at elevations from 2,200 to 4,000 feet. Permeability is moderate, runoff is slow and the erosion hazard is slight. It has severe limitations for septic tanks, structures and roads due to floods and wet subsoil.

The La Grande soils are well suited for production of grains, peas, and alfalfa. The soils generally have a capability rating of IIw. See USDA Soil Conservation Service interpretation sheets for characteristics of all soils series in this area.

The following chart shows the six major soils series in the La Grande urban area, with soil limitations affecting sanitary facilities and structural development along with the predominate capability of each soil series.

While reviewing the chart below, it is important to realize that because a certain soil series may have severe limitations for some particular use, this does not necessarily mean that the use cannot be accomplished. It points out that problems may exist but with proper engineering, design, and construction methods, many of the problems can be overcome.

TABLE 9. SOIL INTERPRETATIONS FOR THE LA GRANDE CITY AREA

Soil Series	**Soil Capability**	**Soil Limitations**		
		Drainfields	**Roads**	**Foundations**
La Grande	IIw	Severe	Moderate	Severe
Catherine	IIw	Severe	Severe	Severe
Palouse	IIe, IIIe	Slight-Moderate	Slight-Moderate	Moderate-Severe
Oxbow	IVs	Severe	Severe	Severe
Waha	IIIe	Severe	Moderate-Severe	Severe
Hoopal	IIIw	Severe	Moderate	Moderate
Rough & Stony Slopes	VIII	Severe	Severe	Severe

Geological Summary of the La Grande Urban Area

Fan gravel, terrace gravel, river and stream gravel, colluvium and Columbia River basalt formations make up the underlying geology of the La Grande area.

The Columbia River basalt formations consist of areas of lava flows and interbedded tuffs (porous rock formed by consolidation of volcanic ash, dust, etc.), of mid-Miocene age. These areas encompass most of the mountain to the west of La Grande. The tuff beds exist west and south of La Grande, marking areas of landslide topography.

Colluvium is the accumulation of mixed rock fragments and soil at the foot of a slope, and is present in the foot-slope area west of La Grande.

Fan gravels are large fan-shaped gravel deposits on the valley floor caused by rapidly flowing streams, such as the Grande Ronde River, entering the valley and dumping the gravel thus forming the fans. The deposits have been utilized for sand and gravel for concrete aggregate, as road base course, and for fill. Much of this gravel is overlain by several feet of floodplain silt.

Terrace gravels generally consist of well-rounded, weakly cemented basalt pebbles and occasional cobbles with sand and volcanic ash. The gravels overlie the Columbia River basalt at the edge of the mountain front and inter-finger with the fill sediments toward the center of the valley.

Three general types of areas in and around La Grande could present serious problems for construction: (1) unstable basalt slopes, (2) areas of unstable colluvium, and (3) valley areas with a high water table. It is possible that certain types of development can proceed satisfactorily in these areas, but the inherent geologic and engineering characteristics that create the problems must first be recognized and considered in the development plans. A summary of these hazards is indicated below.

A. Basalt slopes - tuff (volcanic ash) beds greatly reduce the slope stability. Steep slopes and thick tuff beds should be considered as potential slide areas. If these areas are developed, cuts and fills are made during construction or lot leveling and increased moisture, resulting from disruption of natural drainage, will make the areas even more unsafe. Roadside water, water from roof drains, dry wells and septic tanks, and heavy watering of lawns during the summer months all increase ground water levels, the major cause of slope movement.

B. Colluvium slopes - the colluvium is hazardous from a stability standpoint, and is relatively porous and easily infiltrated by runoff. Because of wetness, the colluvial slopes are unstable. Development in these areas may likely sustain damage from slope movement. Movement of the slopes may not be observable until some time after development has occurred.

   Much of the colluvial soils west and south of La Grande (adjacent to the steep mountain slopes) have been partially developed. As housing densities increase, the problems of slope stability are also likely to increase. Design and construction should recognize these hazardous conditions.

C. High water table - Unconfined ground water is a potential hazard in the Grande Ronde Valley. Unconfined ground water is that water which is under atmospheric pressure and is free to rise and fall in response to recharge and withdrawal from the water body. Near surface water tables are a hazard to construction, and excavations in such areas quickly fill with water. Areas where the water table is less than 10 feet from the ground surface are considered to have moderate development limitations. Higher water tables cause increasingly greater problems.

The areas with the least potential for construction problems in the future development of La Grande are those with stable soil and bedrock conditions. Their locations are indicated on the geologic maps as: (1) areas underlain by terrace gravels, (2) basalt surfaces with gentle slopes, and (3) valley areas where the water table remains at least 10 feet below ground surface at all times.

Included as a support document to this Plan and the Geologic Hazard provisions with the Zoning Ordinance is the study recently completed entitled, Soil and Hydrologic Properties and Processes Affecting the Stability of Hillslopes in the La Grande Area and the Potential for Residential Development by Bart Barlow.

Population and Employment Characteristics

Population

The City of La Grande was incorporated in 1865. Between 1960 and 1970 both La Grande and Union County experienced a moderate growth rate. Baker and Pendleton showed population declines during that period. La Grande's population increase during that period was 631 or an increase of 7%.

Between 1970 and 1980 La Grande continued to show a population increase of 2,415 or 20%. This is a change from 9,645 in 1970 to 12,060 in 1980. Between 1980 and 1990, the population of La Grande decreased from 12,060 to 11,766; a decrease of 2.5%. During the 1990s, the population increased from 11,766 to 12,327, an increase of 4.8%. During the 1990s, the population of Union County increased from 23,598 to 24,530 (an increase of 3.9%).

Income

An important aspect of an area's population is the level of family income. The family income governs the level of participation in community support and the area economy. The ability of the economy to deliver economic benefits to the people depends on the level of family income. Also, since income coupled with other social factors affect the lifestyles of the people, it may also indicate the types of consumer markets available. The level of family income also affects the community's ability to finance needed public facilities and services.

The average pay per job in 1999 for Union County was $23,569 according to the Oregon State Employment Division. This is well below the current State average pay per job of $30,867 and below the national average of $33,313. The percentage of families with lower incomes is slightly higher than the rest of Union County and the state; and at the same time the percentage of families with a higher level of income is also higher in La Grande than the rest of Union County. This is due to La Grande serving as a regional center for commerce, medical, and educational resources.

Employment

La Grande's labor force is vulnerable to seasonal fluctuations in the timber and agriculture industry. Currently the national economic situation has affected lumber mills in La Grande to only a small degree with periodic short layoffs lasting only one or two weeks. There has been a significant slow down of new construction and people involved in the building industry have been impacted.

La Grande does serve as a regional center for two counties which also stabilizes the economy and therefore the employment situation. Essentially all of the county's state and federal offices are located in La Grande as well as Eastern Oregon University and a large complex of medical offices adjacent to Grande Ronde Hospital.

The unemployment rate has been in the 6% range during the first half of 2001. This is slightly above the State average of 5.2% and the national average of 4.2%. There has been no massive deterioration of the area employment base but rather a situation where there is a larger increase

in the population than there is in employment opportunities. This situation is expected and will not change unless significant industrial development occurs and then the percentage of unemployed will only decrease temporarily.

Present Street Facilities

The City street system is a framework that shapes the City in many ways. The location of streets affects the size, shape and orientation of building lots. This in turn affects the setting of the individual buildings. This combination of streets, blocks, lots, and buildings plays a large part in developing the total character of the City.

The street patterns and their conditions are extremely important in the development of the City with reference to the possible development of new areas and their main purpose of providing safe, expeditious, and effective movement of traffic.

There are approximately 60 miles of street right-of-way in La Grande, accounting for about 464 acres of land.

The City has an adopted Transportation System Plan which includes mapping of the classification of streets and a listing of future transportation projects, with cost estimates and time frames.

Parks and Recreation

A new Parks and Recreation Master Plan was adopted as part of the Comprehensive Plan in 1996. A detailed inventory of parks and recreation facilities is included therein.

Fire Protection

La Grande has a 15 member full-time fire department, providing a four-man shift, 24 hours a day for approximately two-thirds of the time. When someone is on vacation or sick leave then there is a three-man shift. There are also 17volunteer firemen fully trained who respond to the fire calls. The City has four pumper trucks, one elevating platform truck, a rescue truck, and a haz-mat response truck.

The existing fire station is located at the corner of Elm Street and Washington Avenue. However, construction was scheduled to begin during the summer of 2001 on a new Fire Station at the intersection of Cove Avenue, Cherry Street and Pine Street. Plans were being developed to operate a regional fire museum in the old station.

The City Fire Department serves everyone within the City limits, and contracts with various residents outside the City limits for fire protection. On a scale of 1 to 10 established by Insurance Services Office, La Grande has a fire rating of 4 or good.

Police Protection

The La Grande Police Department consists of 24 full-time employees of which 15 are certified officers. This constitutes approximately 1.3 officers per 1,000 population, in comparison with

the average for the West Coast of 1.8 officers per 1,000 population. There are also 11 reserve officers.

The Police Department is located at the corner of Sixth Street and "K" Avenue together with the Sheriff's Office in the Union County Corrections Facility. The joint facility was completed in 1978.

At the present time the City Police does not normally respond to calls outside the City limits. However with the central dispatching between the Police and Sheriff's Office, the City Police do respond if they are the closest and it is a life-threatening situation.

Schools

There are eight (8) public schools in the La Grande area that serve the La Grande urban area residents. All of these schools are located within the La Grande City limits except Island City Elementary School. There are five (5) public grade schools, a middle school, a high school and Eastern Oregon University.

Central Elementary is a 14.9 acre site located on "K" Avenue and Sunset Drive serving all that area east of Twelfth Street and south of Adams Avenue.

Riveria Elementary is a 2.7 acre site located on Second Street and “Y” Avenue, serving all that area north of Adams Avenue and west of Depot Street.

Greenwood Elementary is a 5.2 acre site located on Spruce Street and “V” Avenue serving all that area east of Depot Street, north of Adams Avenue and the Oregon State Highway 82 (Island Avenue), and west of the freeway.

Willow Elementary is a 3.1 acre site located at Willow and East “O” Avenue and serves all that area south of the Oregon State Highway 82 (Island Avenue), west of the freeway, north of Gekeler Lane and east of Twelfth Street.

A new Middle School was completed for the fall of 1976. This school is located on an 8.4 acre site at Fourth Street and “K” Avenue.

The High School is located on a 13 acre site at Second Street and “K” Avenue.

Both the Middle and High Schools serve the entire La Grande urban area as well as the Island City area.

Table 10 compares the enrollment in the School District in 1983 and 2001. It is evident that enrollment is declining and that schools are operating within their intended capacity. Two (2) of the elementary schools in La Grande (Willow and Riveria) are becoming very old. The School District has been considering closing these schools and building a new elementary school.

As noted earlier, Eastern Oregon University is located within the City limits. Eastern is a four-year multipurpose regional college with a wide range of degree programs.

The campus is located in the south central part of La Grande on a 110 acre site at Eighth Street and "M" Avenue.

Eastern Oregon University prepared a new Master Plan in 2001 which anticipates the student population increasing from 2,000 in 2001, to 3,000 by 2010, and 4,250 by 2020. A portion of this student enrollment will be served at a variety of "distance learning" locations. About 30% of the students would be housed on-campus. A new Science Building is being planned, which will enable some of the projected growth to occur.

TABLE 10. SCHOOL DISTRICT ENROLLMENT

School	Student Load Potential	Student Enrollment 1983	Student Enrollment 2001
Central Elementary School	440	430	373
Riveria Elementary School	205	169	152
Greenwood Elementary School	410	361	329
Willow Elementary School	195	184	190
Island City Elementary School	190	154	160
Middle School	500	520	379
High School	1,100	830	731

Library

The La Grande Library was built in 1913 at the corner of Fourth Street and Penn Avenue. The book shelving capacity is currently as much as possible in the 8,640 square foot structure. While the building does have some size and functional limitations, the City has reinforced it so its structural and architectural integrity is sound. Handicap access was installed to the basement level and the restrooms were also altered for handicap accessibility. The library is patronized by the county residents who comprise 30% of the total library users.

City Hall

The City offices moved in 1982 from Elm Street and Washington Avenue where they had been located for 72 years. The new location at Fourth Street and Adams Avenue is a building constructed in 1912 as the area Post Office. The building is on the Federal Register of Historic Places and is in excellent condition. All of the City Planning Commission meetings and City Council meetings are held on the main floor, which is accessible to the handicapped.

Airport

La Grande owned and managed the La Grande Airport for many years but has turned over management to Union County. It is situated on 640 acres approximately three miles southeast of the City. The airport is served by two paved runways approximately 4,600 feet in length by 150 feet wide. Present facilities include a fixed base operator, tie-down areas, enclosed hanger space, an aircraft maintenance building, a Forest Service warehouse and offices and a fire retardant bomber facility managed by the Forest Service. An industrial park has been developed on about 200 acres bordering the airport.

PLAN IMPLEMENTATION

The Comprehensive Plan provides a guide for the future growth of the community. However, it is of limited value unless provisions are made for its implementation. The controls and measures which can be utilized to accomplish the objectives outlined by the Comprehensive Plan are varied; they range from legal controls such as zoning and subdivision codes to cooperative agreements between operating agencies such as joint provisions for the use of school recreation facilities. Some are immediate and complete in their effect, such as the construction of various public works projects (schools, roads, etc.). Others may occur more gradually over a period of years toward the accomplishment of Plan objectives. Implementing measures are subject to the pressures of day-to-day problems and decisions, but should be used to provide the implementation of the adopted Comprehensive Plan.

The following section discusses implementing measures that may be utilized by the City. Others may be adopted or utilized from time to time, or new ones may be developed in the future which will prove to be useful.

Zoning

Zoning is an official land use control established to serve the public health, safety, and welfare and to provide the economic, social, and aesthetic advantages resulting from the orderly use of land. Zoning is probably the single most commonly used legal device available for implementing the Comprehensive Plan. It is essentially a means of insuring that the land uses of a community are properly situated in relation to one another, providing adequate space for each type of development. The use of land structures, building height, setback of structures from the street right-of-way line, lot size, density of development and similar matters are regulated in each zone. Zoning regulations governing each specific zone classification must be uniformly applied to all areas given that zone classification.

In establishing zones of land use, the City decides what types of land uses will and will not be found in each area. However, zoning provides only a framework for growth.

In areas where the adopted zoning allows a higher intensity of land use than presently exists, zoning may have a substantial impact on existing development in that zone. Among the primary use of zoning has been the protection of the physical character of existing neighborhoods, the protection of property values and the maintenance of neighborhood stability. Changes of zones within the developed areas may constitute real or imagined threats to property values and to the stability of an area.

One situation which commonly threatens older residential neighborhoods is the use of zoning to facilitate a change in the character of a neighborhood either to a higher density residential use or to commercial uses. Residential areas surrounding expanding commercial areas are especially vulnerable to redevelopment for higher rent uses, and zoning may play a part in determining the timing of such development.

Zoning Ordinance provisions and zoning maps can be amended. However, such amendment must be consistent with the Comprehensive Plan. Where there are conflicts between the zoning

and the Comprehensive Plan, the Zoning Ordinance must be brought into conformance and be consistent with the Plan.

Subdivision

A Subdivision Ordinance is an official control pertaining to the division of land. Subdivision Ordinances coordinate the otherwise unrelated plans of a great many individual developers, and in the process to assure that provision is made for such major elements of the land development plan as right-of-way for major thoroughfares, parks, school sites, major water lines, and sewer outfalls, and so forth. They also allow for the control of the internal design of each new subdivision, so that its pattern of streets, lots, and other facilities will be safe, pleasant, and economical to maintain. Also a list of improvements that are the responsibility of the developer such as paved streets, water supply and sewage disposal systems are generally included.

Official Maps

An official map is an Ordinance intended to implement the Transportation Plan through the reservation of land for future streets, or the widening of existing streets. Within the proposed rights-of-way of these streets, Building Permits for substantial new construction cannot be granted in order that the purchase and removal of improvements will not be necessary when the streets are to be developed or widened.

This type of Ordinance provides an opportunity for delaying of construction which is proposed within a mapped street. If investigation shows that the property owner can carry out his project satisfactorily by the relocation of his structure to avoid the path of the proposed street, a change in locations would be required. If preservation of the proposed street would make use of the property impossible, the City would have an opportunity to purchase the property.

Building and Housing Codes

A Building Code establishes minimum standards of safe design and construction for structures to be constructed, altered, repaired, or moved. The City of La Grande has been enforcing the Uniform Building Code since 1965.

A Housing Code establishes minimum standards for safety of existing housing. Ordinances often call for the repair, vacation, or demolition of structures determined to be dangerous to the health, safety, and welfare of the general public or occupants of the building.

Capital Improvement Program

A Capital Improvement Program is the prioritization and scheduling of public physical improvements for a community over a specific period of time. Scheduling is based on a series of priorities, according to need, desire, or importance of such improvements, and the municipality's present and anticipated financial standing.

Capital Improvement Programming is a vital element of the community's total planning effort. As a Plan implementation tool, a City's Capital Improvement Program has an importance comparable to that of the Zoning and Subdivision Ordinances.

The Program should be brought up to date each year and should be based on realistic project costs and the ability of the City to finance the improvements.

A Capital Improvement Program was prepared in 1977 and has not been updated.

City - County Coordination

A number of proposals of this Plan pertain to areas outside the City limits. Implementation of these proposals can occur only through annexation, cooperation between the City of La Grande and Union County or through implementation by the County. La Grande should work closely with the County with regard to such areas as land use controls, subdivision design, and street and park development if the proposals of this Plan are to become a reality.

UPDATING THE PLAN

In order to plan for changes, the Comprehensive Plan itself must be continually re-evaluated and updated. The Plan should be reviewed and, if needed, changed each biennium to reflect: changes in community attitudes, policies and priorities; changes in the economic, social, cultural, and technological aspects of both the community and society in general; changes in community needs as projects are completed and also as an emergency may arise which demands a shift in emphasis; and, changes in the information which is available about the community when analysis of such information points out that basic community characteristics are changing.

Biennial review, updating and re-adoption of the Plan provides the opportunity for reconsideration of short-term proposals and also of long term considerations. This process is intended to make the Plan and the planning process a regular ongoing part of local government instead of a peripheral activity, and to provide an opportunity for general review of proposals contained in the Plan immediately prior to review of the budget, so as to increase the likelihood of the implementation of the proposals.

The Plan should be reviewed at the beginning of the calendar year by the Planning Commission. It should be the task of this body to review the Plan and recommend changes to the Plan in the form of amendments they feel to be necessary. The Plan and amendments shall be considered at a public meeting at each of the four (4) major grade schools (Willow, Greenwood, Central, and Riveria). After these meetings, the Commission will then submit their recommendations to the City Council at which time a public hearing will be held where official action can take place.

When it becomes apparent that the Comprehensive Plan and database have become outmoded, a more thorough review and complete revision of the Plan should take place. This is expected to occur at 7 - 10 year intervals.

Minor changes to the Plan, those that do not have significant effect beyond the immediate area of the change, should not be made more frequently than once a year, if at all possible. The changes should be based on special studies of other information, which will serve the factual basis to support the change. The public need and justification for the particular change should be established.

A request for minor change to the Plan shall be submitted to the Planning Office at least 30 days prior to the date that the Planning Commission is to hold the public hearing.

The Staff will evaluate the request and recommendations and set up a public hearing date for the Planning Commission review. After the Planning Commission holds the hearing, they will make a recommendation to the City Council, who in turn will hold a public hearing, then act on the amendments.

APPENDIX

A. Soil interpretations for the La Grande Region

B. Bibliography

C. Adopted Maps, Appendices, Figures and Related Documents

APPENDIX A
SOIL INTERPRETATIONS FOR THE LA GRANDE REGION

		Soil Limitations		
Soil Series	**Soil Capability**	**Drainfield**	**Roads**	**Foundations**
Veazie	IIIs	Severe	Severe	Severe
La Grande	IIw	Severe	Moderate	Severe
Catherine	IIw	Severe	Severe	Severe
Palouse	IIe, IIIe, Ive	Slight-Moderate	Slight-Moderate	Moderate-Severe
Oxbow	IVs, VIs	Severe	Severe	Severe
Alicel	IIe, IIIe	Slight-Moderate	Moderate	Moderate
Ukiah	VIIs	Severe	Moderate	Moderate
Waha	IIIe, IVi	Severe	Moderate-Severe	Severe
Hot Lake	IIw, IIIe, IVe	Severe	Severe	Severe
Gwim	VIIs	Severe	Severe	Severe
Anatone	VIIs	Severe	Severe	Severe
Umapine	IIIw	Moderate	Slight	Moderate
Imbler	IIe, IIIe	Slight	Moderate	Moderate
Hoopal	IIIw	Severe	Moderate	Moderate
Conley	IIw, IIIw, IVw	Severe	Severe	Severe
Emily	IIIs, IVs	Slight	Moderate	Slight-Moderate
Tolo	IIIe, VIe, VIIe	Moderate-Severe	Moderate-Severe	Moderate-Severe
Klicker	VIe, VIIs	Severe	Moderate-Severe	Moderate-Severe
Jett	IIe	Slight	Moderate	Moderate
Phys	IIIs, IVs	Moderate	Slight	Moderate
Hall Ranch	VIe, VIIe	Severe	Severe	Severe
Wilkens	Vw	Severe	Severe	Severe
Snell	VIIs	Severe	Moderate-Severe	Severe
Hutchinson	IIs, IIIe, IVe, VIe	Severe	Severe	Severe

APPENDIX B
BIBLIOGRAPHY

Special Flood Hazard Information, Mill Creek-Gekeler Slough, Department of the Army, Corps of Engineers, June, 1973

Engineering Geology of the La Grande Area, State of Oregon, Department of Geology and Mineral Industries, 1971.

Twelve Decades - The Historical Context of Development Decisions in La Grande, Bureau of Governmental Research and Service, 1971.

Economic and Population Characteristics and Prospects for Growth, Bureau of Governmental Research and Service, 1969.

Major Street Plan, Bureau of Governmental Research and Service, 1969.

The La Grande Central Business District, Bureau of Governmental Research and Service, 1970.

Existing Land Use in the La Grande Urban Area, Bureau of Governmental Research and Service, 1969.

Planning for Schools, Parks, and Recreation, Bureau of Governmental Service, 1970.

Traffic Operations Program to Increase Capacity and Safety, State of Oregon, Department of Transportation, November, 1975.

Comprehensive Land Use Plan for the City of La Grande, City of La Grande, July 1973.

General Soil Map with Soil *Interpretations for Land Use Planning*, Union County, Oregon, U.S. Department of Agriculture, Soil Conservation Service, October 1973.

Human Resources Data 1970, League of Oregon Cities, October 1972.

1970 Origin-Destination Study for La Grande, Oregon, Oregon State Highway Division, December 1971.

The Other Side of the Mountains - A Statistical Handbook of Northeast Oregon, Eastern Oregon Community Development Council, June 1975.

Wastewater Facilities Plan, La Grande, Oregon, Cornell, Howland, Hayes, Merryfield and Hill (CH2M-Hill), September 1975.

General Social and Economic Characteristics = Oregon, U.S. Department of Commerce, Bureau of the Census, February 1972.

Selected Characteristics of Oregon Population, Bureau of Municipal Research and Service, September 1962.

SECTION 2. Volume 1 of the La Grande/Island City Transportation System Plan is amended to remove the Interstate 84 frontage road from all maps and remove all references to said frontage road in the text of the Plan.

SECTION 3. The City Council adopts the Findings of Fact and Conclusions of Law in the Planning Commission Decision on July 26, 2005, as its own Findings and Conclusions.

SECTION 4. Ordinance Number 3013, Series 2003, and all other Ordinances or Parts of Ordinances in conflict herewith are hereby repealed.

SECTION 5. If any court of competent jurisdiction declares any Section of this Ordinance invalid, such decision shall be deemed to apply to that section only, and shall not affect the validity of the Ordinance as a whole or any part thereof other than the part declared invalid.

SECTION 6. This Ordinance shall become effective thirty (30) days after its adoption by the City Council of the City of La Grande, Oregon and its approval by the Mayor; specifically, November 4, 2005.

ADOPTED this fifth (5th) day of October 2005, by seven (7) of seven (7) Councilors present voting therefor.

APPROVED this fifth (5th) day of October 2005.

_____
Colleen F. Johnson, Mayor

ATTEST:

_____
Alexandra Norgan Lund, City Recorder

APPROVED AS TO FORM AND CONTENT:

_____ for
Ricker and Roberson, City Attorneys