

Draft Background Report

August 2022

Introduction

The Comprehensive Plan guides how Carlton will plan for and manage growth and development over the next 20 years. It directs all activities related to land use and the future of natural and man-made systems and services in Carlton. It also has an important purpose as the primary means for realizing the community's vision for the future.

The Comprehensive Plan establishes a policy framework rooted in a factual basis that helps inform other critical planning documents and implementing tools that together serve as a coordinated, overarching strategy for the city. This approach establishes the structure for how the city works and provides services, and the types of services that it provides. Ultimately, the Comprehensive Plan outlines the direction that the city will take when planning for land use and informs all its land use decisions and actions, including how land is developed and services are provided.

The following report present a series of background information that identifies the city's current assets and trends related to the fourteen Oregon Statewide Planning Goals that are applicable to Carlton.

Each section is informed by a review of relevant documents and a compilation of demographic, socioeconomic and GIS data, where applicable. The purpose of these reports is to create a shared understanding of the city's current assets and identify potential policy questions or updates to consider. The information from this background report will also be used in the Comprehensive Plan itself.

Goal 1: Citizen Involvement

Goal 1 requires cities to establish a committee for citizen involvement responsible for oversight and evaluation of the city's public involvement efforts related to land use planning. Goal 1 requires "the opportunity for citizens to be involved in all phases of the planning process¹." The goal also outlines the need to have a committee for citizen involvement to monitor and encourage public participation. It requires each citizen involvement program to address:

- Opportunities for widespread public involvement
- Effective two-way communication with the public
- The ability for the public to be involved in all phases of the planning process
- Making technical information easy to understand
- Feedback mechanisms for policy-makers to respond to public input, and
- Adequate financial support for public involvement efforts

Citizen Involvement Initiatives

Committees

The city has several committees to help guide planning efforts: the Budget Committee, Carlton Urban Renewal Agency, City Council and Planning Commission. Each of these committees are tasked with some level of public involvement initiative. In addition, the Planning Department conducts a variety of involvement activities in relation to land use applications. Specifically, carrying out public notice of land use applications, in-person, and virtual consultation with community members, hosting and attending community events, and engaging with the community to assist in planning efforts like Envision Carlton 2040.

Land Use Applications & Plans

Several application types require some varying degree of public involvement such as public notices and public discussion forums along many points of the land use process. Additionally, previous planning processes have included the creation of committees to help guide the plan. Specifically, the 2019 Carlton Parks Development Plan benefited from the insight of the Carlton Parks Committee by speaking with the residents of Carlton on needed improvements.

Goal 2: Land Use Planning

Goal 2 requires each local government in Oregon to have and follow a comprehensive land use plan and implementing regulations. Cities and counties must build their comprehensive plans on a factual basis and follow their plan when making decisions for appropriate zoning. City and county plans must be consistent with one another.

Department of Land Conservation and Development. Oregon's Statewide Land Use Planning Goals.

Demographics

Population and Age

According to 2020 Census estimates, the population of Carlton is 2,220 people. Much of the population are young to middle-aged adults, at 77.5% of residents 18 years and older. The median age is 40 years, and the average household size is 2.9 people².

Population Growth

Going back to 2010 Census data, the approximate population of Carlton was 1,739 people, with the 2020 population estimate of 2,220, the population has increased by approximately 27 percent².

Income

The 2020 median household income in Carlton was \$77,917, approximately 15 percent more than the State of Oregon median income of \$65,667. Approximately 6.9% of Carlton residents are experiencing poverty, compared to Oregon's 12.4% of residents experiencing poverty².

Race and Ethnicity

Most Carlton residents identify as White alone at approximately 82 percent of residents, followed by Some Other Race Alone at 5 percent, followed by White; Some Other Race at 4 percent. Additionally, Black, or African American alone is 0.4 percent, American Indian and Alaska Native alone is 1 percent, Asian alone is 0.9 percent, Native Hawaiian and Other Pacific Islander alone is 0.3 percent, and Some Other Race alone is 5 percent².

Land Use Planning System

Comprehensive Plan

Carlton's Comprehensive Plan was adopted in 2000 and most recently amended in 2009. The first section of the plan is organized around the applicable Oregon Statewide Planning Goals, while the second section includes synthesized information gathered during the update of the plan. The plan was developed through meetings of local government and elected officials, responses to community surveys, attendance at public meetings and hearings, and responses to draft proposals.³

Zoning

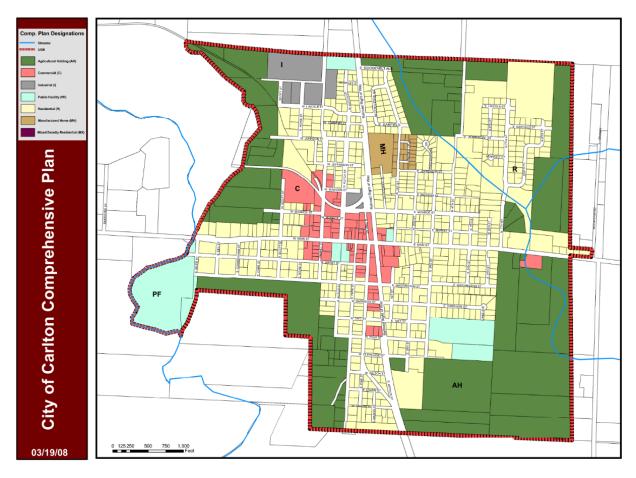
The City of Carlton's Zoning system is defined by its 14 zoning districts as follows:

Residential Low	Residential Medium	Residential High	Downtown	
Density	Density	Density	Winery/Gallery District	
Downtown Main Street	Downtown Railroad	Commercial Business	Commercial Industrial	
District	District	Commercial business		
General Industry	Public Facility	Agriculture Holding	Mixed-Density	
			Residential	
Flood Plain	Manufactured Home			
Management	ivianulaciuleu nome			

US Census Bureau. American Community Survey, 2020 5-year estimates.

³ City of Carlton, Oregon. City of Carlton Comprehensive Plan 2000.

Urban Growth Boundary



The Carlton Urban Growth Boundary (UGB) (see above) is bound by North Yamhill River to the west, bordering a private drive and farmland to the south, farmland to the east, and farmland to the north. The Carlton definition of UGB is "an adopted boundary around the city that defines the area in which the city expects to grow, where public facilities will be extended, and where joint planning responsibilities are exercised with Yamhill County⁴."

Buildable Lands Inventory

Cities must periodically review their UGB to ensure that there is enough land within them to accommodate expected growth. Part of this process is conducting a Buildable Lands Inventory (BLI). The BLI determines the amount of buildable land in the UGB that is either vacant or redevelopable, which can be able to accommodate housing and jobs in the future.

In 2007, in an update to the Comprehensive plan they found that there was sufficient buildable land within the city limits to accommodate the City's projected needs to the year 2017. Using a projection to 2027, they estimated that Carlton will need a total of 17.9 acres of commercial and industrial land. The 2007 buildable lands inventory showed that only 12.5 acres of commercial and industrial zoned land was available to meet future demand. An additional 11 acres of land was rezoned from Agricultural Holding

⁴ City of Carlton, Oregon. Carlton Municipal Code. *Definitions*.

to General Industrial to provide sufficient land to meet the projected need. From an estimated projection of an additional 437 dwelling units by the year 2027, residential land needs called for an additional 81.6 acres of land by the year 2017, the City had a total of 89.5 acres of vacant property designated for residential development.

Goal 3: Agricultural Lands

Zoning Protection

The city of Carlton maintains an Agricultural Holding District zoning per Chapter 17.48 of the CMC. The agricultural holding (AH) district allows an orderly phasing of urban development of land. It is a holding district that allows agricultural uses to continue until such time that the agricultural lands are needed for urban uses and public facilities and services are available.⁵

Goal 5: Natural Resources, Scenic and Historic Areas, and Open Spaces

Natural Resources

There are no forestlands in the City of Carlton. There are a few large clusters of fir and oak trees scattered around the planning area. Trees and brush line the North Yamhill River that runs along the western edge of the city.

The Department of Geology and Mineral Industries completed an inventory of mineral and aggregate resources for Yamhill County in 1981. There are no existing quarrying or mining activities in the Carlton area as of then. One quarry was listed with no reserves of sand and gravel available.⁶

Open Space and Parks

Two small streams off Hawn Creek run through the northeast section of the city. These merge and flow out of the southeast corner of the city. The land adjacent to these creeks is primarily used for agriculture, open and wooded space. These areas provide ideal open space settings.

An area that is particularly suited for open space use is the vacant land in the northwest section of the city. This sloping area once overlooked Carlton Lake which also served as a wildlife refuge. The lake was drained in 1972, but the prospect of it being reestablished makes this lakeside area a potential site for park development.

Other existing uses which provide open space in Carlton include school grounds and the City Parks. Scenic views are offered by the number of historic structures in the community and by the Coast Range Mountains to the west of the city.⁶

Cultural and Historic Resources

The Indians that inhabited the area that included Carlton were given the name "Twalaty," hence the name Tualatin. They were of a great tribe called the Kalapuya, which constituted the population of the Willamette Valley before the white trappers and settlers entered the valley.

In 1872 a railroad was built from Portland to St. Joe, but the train did not stop between the two stations. There was nothing but the farmland where Carlton is now. Mr. Wilson Carl went to Portland and talked

⁵ City of Carlton, Oregon. Carlton Municipal Code. *Chapter 17.48*.

⁶ City of Carlton, Oregon. City of Carlton Comprehensive Plan 2000.

to the Railroad Company officials to see if they would make a stop closer to them so that would not have to take their products so far. As a result, first, a flag stop was tried then a regular stop was made at what is now Carlton. The story is that when the railroad employees talked of this unnamed stop, they started calling it Carl's town, which soon shortened to Carlton. ⁷

Visit Carlton hosts a website with a self-guided Carlton History Tour, highlighting historical areas, buildings, and natural resources in Carlton. ⁸

Goal 6: Air, Water, and Land Resources Quality

Air Quality

The closest nearby air monitoring station is in Tualatin. This station is monitored by the Environmental Protection Agency (EPA). The Outdoor Air Quality program offers daily and annual data downloads of measured air pollutants. A key data point for measuring air quality comes from the amount of particulate matter (PM) with lower (starting at 0) PM count the better air quality. A 2022 download of data for the Tualatin station showed a daily count of 26 PM2.5.9 There are currently no air monitoring stations within the city. The Oregon Department of Air Quality currently prohibits open burning seasonally. Domestic/ yard debris open burning is prohibited except for the burning of yard debris between March 1 and June 15, and between October 1 and December 15.

Water Quality

The city operates and maintains the existing water system and delivers water to its consumer base utilizing Panther Creek/Carlton Reservoir as a source. The 2020 Drinking Water report put out by the city found that their water was deemed safe and meets all state and federal regulations.

Topography

Carlton is relatively flat, with some areas of elevation in the southwestern part of the city. The defining geographic feature is the North Yamhill River to the west, running along the western side of Carlton.

Land Cover

According to the US National Land Cover Database, the developed areas of Carlton are largely surrounded by cultivated crops, pasture/hay, and woody wetlands. The developed areas of the city range from clusters of developed open space, to moving inwards towards downtown, areas of low to high intensity development.¹⁰

Carlton Soils consist of very deep, moderately well drained soils that formed in mixed alluvium and colluvium. Carlton soils are on terraces, toeslopes, and footslopes and have slopes of 0 to 20 percent.¹¹

⁷ City or Carlton, Oregon. *City of Carlton History*.

⁸ Visit Carlton. Carlton History Tour.

⁹ United States Environmental Protection Agency. *Interactive Map of Air Quality Monitors*.

¹⁰ Multi-Resolution Land Characteristics (MRLC) Consortium. National Land Cover Database (NLCD) Viewer.

¹¹ United States Department of Agriculture Natural Resources Conservation Service. *2006 National Cooperative Soil Survey for Carlton, Oregon*

Climate

Yamhill County, in common with all western Oregon, has a modified marine climate. Yamhill County has three climate zones, distinguished mainly by elevation: the valley floor, the foothills of the Coast Range, and the Coast Range.¹²

Yamhill County's 12-month total precipitation increased 1.1 inches from June 1900 to May 2022. From June 1900 to May 2022, the average 12-month total precipitation was 60.3 inches. The 12-month average temperature increased 0.8°F from June 1900 to May 2022. From June 1900 to May 2022, the 12-month average temperature was 51.2°F. 13

Goal 7: Areas Subject to Natural Disasters and Hazards

While Yamhill County is generally described as having a mild climate and a relatively flat terrain, except for hills located toward the Coast Range, natural hazards do present a threat. The 2006 Yamhill County Natural Hazards Mitigation Plan and the 2020 City of Carlton Addendum to this plan, assesses vulnerability and risk to a range of natural hazards that may occur in the city.

Drought

The steering committee determined that the City's probability for drought is high, and that their vulnerability to drought is low. Due to insufficient data and resources, Carlton is currently unable to perform a quantitative risk assessment, or exposure analysis, for this hazard. State-wide droughts have historically occurred in Oregon, and as it is a region-wide phenomenon, all residents are equally at risk. Structural damage from drought is not expected; rather the risks apply to humans and resources. Industries important to the City of Carlton's local economy such as agriculture, and timber have historically been affected, and any future droughts would have tangible economic and potentially human impacts.¹⁴

Earthquake

The steering committee determined that the City's probability for a Cascadia Subduction Zone (CSZ) earthquake is moderate and that their vulnerability to a CSZ earthquake is high. Social and geological records show that Oregon has a history of seismic events. Oregon has experienced damaging earthquakes in the historic past, and geologic evidence indicates that because of the City's increasing population and development, Oregon may expect earthquakes with even greater damage potential to occur in the future. South of McMinnville, near Dayton, there is a series of inferred faults (faults that extend underground from a visible fault) and concealed faults (completely underground faults). With its location in the Pacific Northwest, Yamhill County is susceptible to both intraplate and subduction zone earthquakes.

Flood

The steering committee determined that the City's probability for flood is high and that their vulnerability to flood is moderate. In addition to the Willamette River, Yamhill County contains two other large rivers (North and South Yamhill Rivers) and smaller tributaries that are susceptible to annual flooding events. Two types of flooding primarily affect Yamhill County: urban flooding and riverine

¹² Yamhill County. Natural Hazards Mitigation Plan

¹³ USAFACTS. Climate in Yamhill County, Oregon

¹⁴ City of Carlton Addendum to the Yamhill County Multi-Jurisdictional Hazard Mitigation Plan

flooding. Urban flooding can be explained as when land is converted from fields or woodlands to roads and parking lots, it loses its ability to absorb rainfall. Riverine flooding is the over-bank flooding of rivers and streams and is the most common flood hazard in Oregon.

Landslide

The steering committee determined that the City's probability for landslide is low and that their vulnerability to landslide is low. A 1998 study completed by the Oregon Department of Geology and Mineral Industries (DOGAMI) states that although few landslides develop in the Willamette Valley as compared to more mountainous parts of the state, the marine sedimentary rock units in southern Yamhill County and the edges of the valley are susceptible to large slides. Currently there is no comprehensive list of landslide events and/or dates for Yamhill County. Landslides probably accompany every major storm system that impacts western Oregon. A DOGAMI study of the western portion of the Salem Hills indicated that slopes nearest to the Willamette River contain the greatest risk of landslide.

Severe Weather

The steering committee determined that the City's probability for windstorm is high and that their vulnerability to windstorm is moderate. Damage from high winds generally has resulted in downed utility lines, and trees usually limited to several localized areas. Electrical power can be out anywhere from a few hours to several days. Outdoor signs have also suffered damage. If the high winds are accompanied by rain, blowing leaves, and debris clog drainage-ways, which in turn may cause localized urban flooding.

The steering committee determined that the City's probability for winter storm is high and that their vulnerability to winter storm is high.¹⁵ Severe winter storms can produce rain, freezing rain, ice, snow, cold temperatures, and wind. Ice storms accompanied by high winds can have destructive impacts, especially to trees, power lines, and utility services. Both can produce widespread impacts on people and property throughout Yamhill County.

Wildfire

The steering committee determined that the City's probability for wildfire is low and that their vulnerability to wildfire is low. Significant agricultural areas of the Willamette Valley and north and central Oregon contain crops, such as wheat, are prone to wildfire damage. Communities are also at risk from wildfires, and substantial hazards exist for communities at the wildland/urban interface. A lack of firebreaks surrounding buildings, limited water availability during the high-risk summer months, and fire suppression over the last 100 years contribute to a fire hazard in the forested hillsides of Yamhill County.

Goal 8: Recreational Needs

Parks and Recreation

Parks and Recreation is a division within the City's Public Works Department. The City of Carlton manages three public parks within the city limits. There are four picnic shelters in the City of Carlton park system available for reservations. There are three picnic shelters in Wennerberg Park, and one in Hawn Creek Park.

¹⁵ City of Carlton Addendum to the Yamhill County Multi-Jurisdictional Hazard Mitigation Plan

Recreational Opportunities

Wennerberg Park offers a disc golf course in the lower section of the park. Additionally, the City of Carlton operates the Carlton Pool during the warm weather months of the year.

Carlton Parks Development Plan

Developed in 2019, the plan highlights that Carlton is preparing for population growth and an increase in residential development. The city has experienced only moderate growth in recent years, but several large residential subdivision projects planned for the community will result in a steady increase in population in coming years. The city created and adopted a Parks Development Plan in 2014 that included a Capital Improvements Program (CIP) for park facilities.

The purpose of this Parks Development Plan is to identify park and recreation amenities that will meet the needs of the community. The Plan will serve as a guide for future development of parks within the community. More specifically, the purpose of the Plan is to identify current and future park and recreation needs, park and recreation goals and policies, develop a list of proposed parks and recreation facility improvements designed to meet future needs, identify general areas where new parks facilities could be developed, develop costs estimates for proposed parks and recreation facilities improvements, and identify reimbursement and improvement system development charge (SDC) requirements.

Assets

The City of Carlton owns and maintains approximately 23.18 acres of parkland. These parklands are classified as neighborhood parks and community parks. City parks offer a range of opportunities and provide amenities for a variety of user groups.

Park	Size and Location
Ladd Park	Downtown, approximately 1.46 acres in size
Hawn Creek Park	Northeast (adjacent to Hawn Creek), approximately 2.88 acres in size and currently undeveloped
Wennerberg Park	West (adjacent to the South Yamhill River), approximately 18.85 acres in size

Ladd Park, located downtown, is approximately 1.46 acres in size and contains picnic facilities, playground equipment, a sports court, the city pool (1935) and site of the 1921 Ladd Fountain. The park is well situated regarding the downtown commercial core.

Hawn Creek Park is in the northeast section of the city, adjacent to Hawn Creek, the park is approximately 2.88 acres in size and currently undeveloped. This park was dedicated as part of the Carlton Crest Subdivision, a 155-unit subdivision that was granted preliminary approval in June 2005.

Wennerberg Park, located at the western edge of the city limits and adjacent to the South Yamhill River, is approximately 18.85 acres in size. The park provides for a mixture of recreation activities, with three baseball fields, two picnic pavilions, barbecue sites, and access to the North Yamhill River.

Improvements

According to the Parks Plan, the City of Carlton is currently well served by parks. In reviewing the current park system, Parks Committee members expressed satisfaction with the current amount of parkland available, while identifying several needed improvements to existing facilities. The Parks Committee did recognize the need to provide additional parkland in developing areas of the city to maintain the existing level of service as the city grows. The City's 23.16 acres of parkland represents 10.2 acres of parkland per 1,000 residents. In the year 2040, based on a population forecast of 3,204 residents, the city should have 32.68 acres of parkland to stay in line with the National average. This would require an addition of 9.5 acres.

For Ladd Park, the Parks Committee identified several improvements for the city pool facility located within this park. These include demolition and reconstruction of the pool building, the addition of a water slide and wading pool, and construction of a splash fountain that would appeal to younger children. Other significant improvements to this park include adding a picnic pavilion and restrooms, constructing a cover for the existing basketball court, and additional landscaping. The project team identified signage and additional trash receptacles as other minor improvements.

The Parks Committee identified several improvements to Wennerberg Park, improving both the access road through the park and parking areas and providing additional access to the Yamhill River were identified as needed projects. Improving river access includes removing noxious vegetation and improving the riparian area through the park. Other significant improvements include adding a concession facility and additional restrooms and construction of two additional picnic pavilions. The city also wishes to convert one of the existing picnic pavilion areas to a band shelter with the hopes of developing a local music program.

Improvements identified in the preferred plan for Hawn Creek Park include installing a walking path, children's play structure, park benches and furnishings, landscaping improvements, shelter area, and a basketball court. The city also wishes to retain the area in and around the Hawn Creek flood plain as an open space area. These areas shall be maintained to provide a natural storm water and drainage system. The city will consider construction of bicycle and pedestrian pathways in these areas.

Goal 9: Economic Development

Industry

The largest employment industries in Carlton are Education and Healthcare, Manufacturing, Retail Trade, Public Administration, and Construction. Nearly 72% of Carlton's workforce is employed by one of these industries¹⁶.

¹⁶ 2020 US Census Data

Commuting

2019 US Census Data shows that only 2.4% of people who live in Carlton, also work in Carlton. The graphic below depicts that 359 people live outside of Carlton, but work in Carlton. 21 people live and work in Carlton, and 852 people live in Carlton, but work elsewhere¹⁷.

Urban Renewal



In June 2009, the Carlton City Council adopted Ordinance No. 682 approving the Carlton Urban Renewal Plan for an urban renewal area within the boundaries of the City of Carlton. It identifies several projects for the area, including improving fire flows (replace water main), streetscape and sidewalk improvements, underground utilities, downtown park improvements, and administration. The Carlton Urban Renewal Agency (CURA) is made up of the mayor and six City Councilors, also known as the Board of Directors.

Organizations

Economic Development in Carlton is presided over by both the Carlton Business Association and Yamhill County. The Business Association (CBA) is "an association of businesses and individuals, organized to promote the economic vitality of the greater Carlton business community, while preserving its civic, cultural, and historic well-being" ¹⁸. Yamhill County produced the 2009 Yamhill County Agri-Business Economic and Community Development Plan to look into the future for the County's agriculture and tourism industries.

Trends

A 2017 report titled *Carlton, OR: Economic and Demographic Profile* produced by the Northwest Economic Research Center concluded that "while data limitations preclude exact figures, it is reasonable to assume that the wine industry creates a cluster of economic activity that includes large segments of employment in Manufacturing and Leisure and Hospitality. In fact, the wine industry is a key "traded cluster" that brings outside dollars into the city. While it should not be emphasized to the detriment of the many industries that indirectly support it, wine will remain an important facet of the local economy

¹⁷ US Census Bureau 'On the Map' 2019

¹⁸ Carlton, Oregon - Carlton Business Association

and trends should be noted. The persistent employment growth in Leisure and Hospitality over the last decade is likely to continue, thanks to wine tourism¹⁹."

Goal 10: Housing

Existing Housing

The housing stock in Carlton totals approximately 870 units and consists predominantly of owner-occupied detached single-family units. As of 2020 there is a 5.9% vacancy rate in Carlton or approximately 55 vacant housing units. The median gross rent in Carlton is about \$1,270, slightly above the Oregon average.²⁰

Trends

The 2021 Regional Housing Needs Analysis²¹ meets the House Bill 2003 requirement to develop a methodology for projecting regional housing need and allocate that need to local jurisdictions. This report highlights the following results for Carlton. The tables below highlight the future housing needs for Carlton using projected population numbers through 2070. The analysis results show that Carlton will need 379 new housing units, with the majority (55%) being single-family detached, followed by 40% Multifamily units. Additionally, of these units 31% should accommodate a Median Family income of +120%, followed by 20% of units to accommodate 0-30%. The second table presents the overall number of projected needed units (242), the number of units Carlton is lacking in relation to its current population (60), and the number of housing units currently needed for those experiencing homelessness (15).

¹⁹ Carlton, OR: Economic and Demographic Profile (pdx.edu)

²⁰ ECONorthwest. 2021 Regional Housing Needs Analysis Oregon

²¹ RHNA-Technical-Report.pdf (oregon.gov)

New units for each of the following						
Median Family Income	Single- Family Detached	Single- Family Attached	Manufactured and Other	Multifamily	Total Units	% of Units
UGB: Carlton						
+120%	90	2	2	23	117	31%
80-120%	45	1	5	20	70	19%
50-80%	47	0	7	15	69	18%
30-50%	17	0	0	32	49	13%
0-30%	11	1	0	63	75	20%
Total Units	209	4	14	152	379	100%
% of Units	55%	1%	4%	40%	100%	

	New Unit				
Median Family Income	Projected Need	Under- production	Housing for the Homeless	Total Units	% of Units
UGB: Carlton			•		
+120%	97	3	0	101	32%
80-120%	48	9	0	58	18%
50-80%	41	15	0	57	18%
30-50%	26	15	1	42	13%
0-30%	29	17	13	59	19%
Total Units	242	60	15	317	100%
% of Units	76%	19%	5%	100%	

Goal 11: Public Facilities and Services

Oregon Statewide Planning Goal 11 requires municipalities to prepare Public Facilities Plans to plan and identify necessary infrastructure to serve development within the UGB. The Public Facilities Plan is required to be adopted as a supporting document to a comprehensive plan.

Water Resources

Based on city records, Carlton's original water system was constructed in about 1911. The initial infrastructure appears to have included a 30 foot long, 3-foot-high concrete dam across Panther Creek just downstream of the current reservoir dam and a 9-mile-long pipeline into town. In 2003 the water treatment plant was expanded and upgraded, and steel reservoir was constructed.

Water demand is defined as the sum of all water produced and delivered to the city distribution system. It includes water consumed in all use categories and includes water loss and unaccounted-for water. Water demand varies across seasonal periods, days of the week, and hours of the day. The establishment of an average day demand (ADD) rate serves as the baseline against which other more intensified demands are measured. For this report the ADD was determined to be 160 gallons per capita per day²².

²² City of Carlton. 2014 Water System Master Plan.

Water Master Plan

Carlton adopted the Water Master Plan in 2014 to provide an evaluation of the city's water system with respect to the existing and future needs. Additionally, it identifies improvements and associated costs, and provides the city with a framework for water service through 2033.

The report outlines a series of ranked recommendations to increasing resiliency of the water systems. Regarding water supply, the findings suggest that the Panther Creek/Carlton Reservoir source serves the city well, but it is subject to at least two challenges that can reduce its reliability. One is the high sediment and silt loads that can occur in conjunction with major winter storms. The other is the occurrence of higher temperatures and algae blooms that are believed to be exacerbated by the significant silt accumulation in Carlton Reservoir.

Storm Water Master Plan

Carlton adopted the Storm Drainage Master Plan in 2002 to evaluate the existing storm water system and provide recommendations. Drainage from the western portions of Carlton flow to the northwest and southwest into the North Yamhill River. Drainage from the eastern potions of Carlton flow to the northeast and southeast into a tributary of Hawn Creek. The railroad right-of-way running through town roughly defines the east-west runoff and Monroe Street divides the north-south drainage. Carlton's storm drainage systems are comprised of a series of roadside ditches or swales that often are discontinuous across individual properties.

Wastewater Facilities Plan

Carlton adopted the Wastewater Facilities Plan in 2018 to review existing conditions, determine regulatory requirements, identify future needs, deficiencies, alternatives, and an action plan for upgrading the collection and treatment facilities for the next 20 years. The existing wastewater facilities in the City of Carlton consist of a conventional sewer collection system, including two pump stations, which convey flows to a wastewater treatment plant that provides secondary treatment and disinfection. Effluent is discharged to the North Yamhill River from November through April and is used for irrigation on land adjacent to the treatment plant lagoons in the summer.

Other Services

Police & Fire

The Carlton Police Department is responsible for enforcement of state and local laws in the City of Carlton. The Police Department enforces the state traffic laws within the city and has the primary responsibility for enforcement of the Municipal Code. Carlton Fire District provides emergency medical response, fire suppression, and rescue services to Carlton.

Civic Facilities

The City of Carlton is housed at the City Hall building on Main Street, most recently constructed in 1974. The City of Carlton also maintains the Carlton City Pool.

Schools

The Yamhill-Carlton School District is composed of Yamhill Carlton High School, Yamhill Carlton Intermediate School, Yamhill Carlton elementary School, and Alliance Academy. The 2016-2017 school year saw a total enrollment of 1,033 students from kindergarten to grade 12. The median class size for

Elementary is 24 students, for Middle ranges from 20-27, and for High school ranges from 19-20. The adopted budget for the 2021-2022 year was \$21,339,135.²³

Goal 12: Transportation

Assets

The City of Carlton is effectively divided into four quadrants by two major arterials. Highway 47 divides the city east and west. Highway 47 enters the city from the south as Pine Street, it makes a series of turns through downtown providing a two-block east-west segment along Main Street, then exits the city to the north as Yamhill Street. Main Street divides the city north and south. West of the city limits, Main Street becomes Meadowlake Road. East of the city limits Main Street becomes Hendricks Road.

Carlton is currently served by the Yamhill County Transit Route 33 bus that runs from McMinnville to Hillsboro. It runs Monday-Friday, the shelter is located on North Pine Street. There are currently 5 northbound pickup times and 5 southbound pickup times per day.²⁴

Transportation System Plan

Adopted by Carlton in 2009, the Transportation System Plan (TSP)²⁵ establishes the City's goals, policies, and strategies for developing and improving the transportation system within the Carlton Urban Growth Boundary. The Carlton TSP serves as a twenty-year plan to guide transportation improvements and enhance overall mobility for vehicles, pedestrians, and bicyclists throughout the city. The goals are:

- Preserve the function, capacity, level of service, and safety of State Highway 47
- Enhance the transportation mobility and safety of the local street system.
- Increase the use of alternative modes of transportation (walking, bicycling, rideshare/carpooling, and transit) through improved access, safety, and service. Increasing the use of alternative transportation modes includes maximizing the level of access to all social, work, and welfare resources for the transportation disadvantaged. The City of Carlton seeks for its transportation disadvantaged citizens the creation of a customer-oriented regionally coordinated public transit system that is efficient, effective, and founded on present and future needs.
- Improve coordination between the City of Carlton, Yamhill County, and the Oregon Department of Transportation (ODOT).

Trends

Key needs and trends associated with the City's transportation system as written in the TSP, are outlined below.

- Recently Rezoned Areas identify transportation improvements needed to serve areas recently rezoned to meet the City's projected residential and employment land needs through the year 2027 as part of the 2007 Carlton Comprehensive Plan update.
- Local Street Network Plan incorporate recent amendments to the Local Street Network Plan and update for recently rezoned areas.

²³ 2021-2022 Adopted Budget

²⁴ Yamhill County Transit Route 33

²⁵ City of Carlton. *Transportation System Plan 2009*

- Bicycle and Pedestrian elements were not adequately addressed in 1999 TSP and are outdated.
 An update is needed to identify and provide detailed project descriptions and cost estimates for an improved system of pedestrian and bicycle routes and investigate the feasibility of a trail within or along railroad right-of-way and spur routes. A recent City emphasis is sidewalk construction, so pedestrian needs identified in the TSP must be updated and prioritized, with cost estimates.
- Roadway Functional Classifications and Street Design Standards review all classifications and street design standards, including street width and sidewalk requirements, to ensure they match the needs of the community and provide for adequate pedestrian facilities. Work with the Oregon Department of Transportation (ODOT) to establish a cross section for Highway 47, considering the Special Transportation Area designation within the downtown.
- Downtown Truck Bypass -review with ODOT the need and feasibility of routing truck traffic around the downtown.
- Rail Crossings review rail crossing needs with the ODOT Rail Program and update as necessary.
- Capital Improvement Program update and develop a Transportation Systems Development Charge (TSDC) for adoption.
- Safe Routes to School (SRTS) inventory pedestrian and bicycle facilities within the walk zone of Carlton Elementary School and identify key deficiencies and barriers to students walking or biking to school.

Improvements

The conclusion of the Transportation System Plan divides its recommendations by roadway, pedestrian, bicycle, and transit improvements. Roadway improvements consist of improving the turning radius of identified areas, installing center left-turn lanes, constructing a Main Street bypass, and connecting street access actress the railroad right-of-way. Pedestrian improvements consist of installing sidewalks, providing connection across the railroad, and constructing a multi-use path along right-of-way. Bicycle and transit improvements consist of installing bike lanes, providing local funds to expand the Yamhill Transit service, and constructing a transit stop on Main Street. ²⁶

Goal 13: Energy Conservation

As the City of Carlton continues to expand, the demand for energy in building and transportation networks is expected to increase. Oregon Statewide Planning Goal 13 requires jurisdictions to manage and control the development of land and uses to maximize the conservation of all forms of energy, based on sound economic principles.

Solar Energy

Within the Carlton Municipal Code²⁷, the Downtown (D) District Design Standards allows rooftop "small-scale renewable energy" in the form of mini-wind turbines, solar panels and similar features. These are granted the exception of being visible from the street, alley, pedestrian access way, or civic space.

²⁶ Carlton Transportation System Plan

²⁷ City of Carlton, Oregon. Carlton Municipal Code. *Chapter 17.30*

Street Trees

The City of Carlton maintains an Approved Street Tree guidance document which offers instructions for siting, planting, and caring for your tree. There is also a list of approved tree species that contains mature height, canopy spread, form, color, and flower information.

Electric Vehicles

The Carlton Municipal Code currently allows for Electric fueling stations within the Downtown District, subject to Site Review. City Hall currently contains one electric charging station at its facility on Main Street. It offers two chargers through Blink Charging with the cost ranging from \$0.39-\$0.49 per Kwh.²⁸

Energy Efficiency

Electricity service is provided by Portland General Electric, or PGE. The City of Carlton Municipal code governs the promotion of energy conservation and efficiency in development through site planning and landscaping in its General Development Standards.

Goal 14: Urbanization

Urban Growth History

Carlton's city limits and Urban Growth Boundary have been identical since the time of the Urban Growth Boundary (UGB) adoption on January 9, 1978, except for a 1985 simultaneous UGB and annexation action to include Wennerberg Park. Over the years, the City has seen residential and commercial infill within the existing UGB.

Development Trends

Single family homes have consistently held the highest percentage of occupied housing units in Carlton, up until 2018, when the percentage dropped from 88.7% to 87%. 2000 to 2009 saw the highest percentage of housing development with 211 units built, with a substantial decrease in new units from 2010-2013 at only 83, and since 2014 only 26 new units have been built.²⁹

²⁸ Blink Charging Find a Station

²⁹ US Census Bureau. Physical Housing Characteristics for Occupied Housing Units. American Community Survey 2010-2020