

3.21 Solid Waste

3.21.1 Affected Environment

Current Plan Area

Pierce County Solid Waste Management Plan

The *Tacoma–Pierce County Solid Waste Management Plan* (Solid Waste Management Plan), developed as the planning tool for the management of solid waste activities in Pierce County over the next 20 years, was adopted in the fall of 2000 (Pierce County 2000). A supplement to the plan was published in 2008 and contains amended goals and policies for achieving the 20-year vision expressed in the 2000 plan.

The Solid Waste Management Plan maintains an inventory of all existing solid waste handling facilities, identifies potential disposal and recycling facility needs, and assesses disposal capacity needs based on 20 years of population growth for all participating jurisdictions. The plan's goals, policies, and recommendations provide elected officials with guidelines for the development of programs, capital facilities, and annual budgets. The plan provides a legal basis for Tacoma, Pierce County, the Tacoma–Pierce County Health Department, other jurisdictions, and government agencies to make permitting decisions on solid waste or recycling facilities. The plan addresses solid waste management in all unincorporated and incorporated areas of Pierce County (Pierce County 2000).

Three separate solid waste management systems operate in Pierce County: the County/Cities and Towns System; the Tacoma/Ruston System; and the Fort Lewis/McChord Air Force Base System. The cities and towns have chosen to participate in a coordinated management system developed through a series of interlocal agreements between each city and the County. These interlocal agreements are the means through which Pierce County and the cities and towns jointly agreed to:

- implement the plan;
- work cooperatively to carry out the waste reduction and recycling policy recommendations contained in the plan;
- commit to a 20-year system for the management and disposal of solid waste in Pierce County; and
- meet or surpass applicable environmental standards with regard to the solid waste management system facilities through cooperative management of an integrated solid waste system that will serve both the County and the cities and towns.

As a part of these interlocal agreements, cities and towns:

- adopt the County disposal system and authorize the County to designate sites for the disposal of all solid waste collected within the corporate limits of the cities or towns; and
- agree to not divert solid waste from the designated disposal sites, or from other elements of the County solid waste system, without prior County approval.

Garbage Collection and Recycling

Pierce County contracts with Waste Connection, Inc., a collection of subsidiary waste disposal companies, to provide waste collection services. DM Disposal currently provides garbage collection services within Sumner city limits; and Murrey's Disposal Company and American Disposal collect garbage in the unincorporated portions of Pierce County around Sumner (Murrey's Disposal 2010).

In the County, transfer facilities are used to transfer waste from self-haulers or route collection vehicles to large capacity containers, which are then transported to a waste disposal site. Transfer facilities include publicly and privately owned transfer stations, drop-box transfer stations, moderate-risk waste fixed and mobile facilities, and an intermodal facility. There is also a privately owned transfer and recycling facility at the site of the closed Hidden Valley Landfill, which offers covered drop-off for residential garbage and is capable of sorting operations, which separate landfill materials from recyclables.

Currently, all solid waste collected by waste management systems in Pierce County is disposed of at the privately owned LRI landfill south of Graham on State Route 161. LRI also operates a compost factory and gas-to-energy plant (Pierce County 2008).

The 19 cities using the Pierce County disposal system have adopted and implemented recycling collection programs similar to the minimum service levels established by the County. The City of Sumner (City) offers two separate recycling programs: one for yard waste and one for comingled recyclables. DM Recycling Company, a subsidiary of Waste Connections, provides recycling collection services throughout Pierce County, including within the current plan area. Curbside pick-up for recycling and yard waste is organized on a biweekly schedule (Murrey's Disposal 2010).

Existing and Projected Waste Stream

According to the *2008 Solid Waste Management Plan Supplement* (2008 Supplement), the annual disposed tonnage of municipal solid waste countywide held steady at approximately 600,000 tons from 2000 to 2005. Annual recycling tonnage grew from 384,642 tons in 2000 to 543,661 tons in 2005, an increase of 41.3%. Total generated tonnage for 2005 was approximately 1.14 million tons (Pierce County 2008). The 2005 countywide solid waste disposal rate was 4.35 pounds per capita per day (pcd); the rate for recycling was 3.94 pounds pcd. These tonnages and rates include municipal solid waste (i.e., hauler-collected and residential self-haul), as well as commercial self-haul.

The rate for contracted municipal solid waste disposal in 2005 was 3.88 pounds pcd (Pierce County 2008). Applied to Sumner's 2008 population of 9,060 persons (Washington State Office of Financial Management 2009), the total solid waste collected within the city limits for landfill disposal is approximately 35,152 pounds or 17.6 tons per day. This equates to an annual solid waste total of approximately 6,415 tons per year. If Sumner's UGA population is included in this calculation, the total solid waste collected is approximately 40,368 pounds per day or 7,367 tons per year.

The Solid Waste Management Plan presents Pierce County's 20-year solid waste forecasts. Updated countywide municipal solid waste projections from the 2008 Supplement are depicted in Table 3.21-1. These are high-range forecasts for long-term waste stream projections using the following assumptions:

- The per capita waste disposal rate is constant at 4.5 pounds per day.

- Projected population growth rates are consistent with historical growth in the solid waste service area and adopted population forecasts prepared by the Washington State Office of Financial Management.
- The recycling rate is 50%.

Table 3.21-1. Pierce County Population and Disposed Waste Stream Projections¹

Year	Population	Waste Stream (Tons/Year)
2010	836,688	687,130
2015	899,190	738,460
2020	947,923	778,482
2027	1,020,417	838,017

Source: Pierce County 2008.

¹ Includes Tacoma/Ruston and Fort Lewis/McChord Air Force Base).

Orton Junction Expansion Area

Located outside of the Sumner UGA in unincorporated Pierce County, the Orton Junction Expansion Area is covered by the Solid Waste Management Plan, and waste collection services are available from a Waste Connections subsidiary hauler, as described for the current plan area. As solid waste management is provided at the county level, current and projected future waste streams from the expansion area are incorporated into Pierce County planning efforts and are reflected in the countywide projections in Table 3.21-1.

East Hill Reduction Area

The East Hill reduction area currently lies within the Sumner UGA and receives waste disposal services from one of Waste Connections' unincorporated area haulers, as described for the current plan area. Solid waste management is provided at the county level; therefore, current and projected future waste streams from this area are incorporated into Pierce County planning efforts and are reflected in the countywide projections in Table 3.21-1.

3.21.2 Impacts

Impacts Common to All Alternatives

Under all the alternatives, the overall population of Pierce County is projected to increase over the next 20 years, and with it, the demand for solid waste disposal services. The demand for disposal services would differ by alternative; however, because these differences would result from adding or removing land from the Sumner UGA, and because solid waste would be generated by territories that are within or outside of the alternative boundaries, the overall demand for disposal services within Pierce County would remain consistent with the County's adopted demand projections.

Impacts Specific to the UGA Expansion (Orton Junction) Alternative

Under the UGA Expansion Alternative, the 2030 population would be 16,459. Based on the Pierce County daily per capita waste generation forecast rate of 4.5 pounds, this would result in a daily waste stream of 37 tons (13,517 tons per year).

Impacts Specific to the UGA Modification Alternative

Under the UGA Modification Alternative, the 2030 population would be 14,706. Based on the Pierce County daily per capita waste generation forecast rate of 4.5 pounds, this would result in a daily waste stream of 33.1 tons (12,077 tons per year).

Impacts Specific to the No Action Alternative

Under the No Action Alternative, the 2030 population would be 15,495. Based on the Pierce County daily per capita waste generation forecast rate of 4.5 pounds, this would result in a daily waste stream of 34.9 tons (12,725 tons per year).

3.21.3 Mitigation Measures

Incorporated Plan Features

- Under all alternatives, the Utilities Element of the City Comprehensive Plan provides solid waste policies related to the provision of solid waste collection and disposal services and supporting recycling and waste reduction programs consistent with the Solid Waste Management Plan.

Applicable Regulations and Commitments

- The City participates in an interlocal agreement with Pierce County for solid waste and recycling services.

Other Potential Mitigation Measures

- The City could support added public outreach efforts to increase awareness of recycling programs.

3.21.4 Significant Unavoidable Adverse Impacts

As population growth occurs, the amount of solid waste generated will increase, resulting in increased demand on the County's disposal system. Unavoidable impacts are not anticipated due to the countywide coordination of solid waste and recycling programs.