

4.12.4 SOLID WASTE – PUBLIC UTILITIES

4.12.4.1 INTRODUCTION

This solid waste analysis is based upon information within the following documents:

- *West Roseville Specific Plan Final EIR*, February 2004
- *Sierra Vista Specific Plan Final EIR*, May 2010
- *Draft Creekview Specific Plan*, 2010

All of the above listed documents are available for review during normal business hours at:

City of Roseville Permit Center

311 Vernon Street

Roseville, California.

No comments were received relative to solid waste in response to the Notice of Preparation (NOP) (Appendix A). Refer to Appendix B of this EIR to view the comments received on the proposed project in response to the NOP.

4.12.4.2 ENVIRONMENTAL SETTING

Solid Waste Collection and Disposal

Solid waste generated in the City of Roseville is collected and hauled by the City and delivered to the Western Placer Waste Management Authority (WPWMA) for processing and disposal. The WPWMA is a regional agency comprised of the cities of Roseville, Rocklin, and Lincoln, and Placer County, which owns and operates the Materials Recovery Facility (MRF) and the Western Regional Sanitary Landfill (WRSL). The MRF and the WRSL are located on 320 acres at the southwest corner of Athens Avenue and Fiddymment Road in Placer County, and are approximately three miles north of the Project area. Nortech Waste, LLC., a private firm, operates the MRF and Nortech Landfill, Inc., a private firm, operates the landfill under separate contracts to the WPWMA.

The City of Roseville has entered into a joint powers agreement (JPA) with these other agencies for solid waste management. The JPA administers the County's Solid Waste Management Plan. The City entered into a Flow Control Agreement with the WPWMA in 2005, which requires all waste generated within the City limits to be delivered to the MRF for sorting and disposal at the WRSL. In compliance with the City's Municipal Code, Section 9.17.050, all construction and demolition debris, generated within the City of Roseville must be delivered to the WPWMA's facilities for recycling or disposal. Collection of solid waste within the City is operated and managed by the City's Environmental Utilities Department. Permitted Non- Exclusive Franchise haulers may handle temporary refuse collection and disposal for construction and demolition.

The majority of solid waste collected from within the service area is first delivered to the MRF for processing. The MRF, which opened in 1995, receives, separates, processes, and markets recyclable materials removed from delivered solid waste. The MRF has a mixed waste processing capacity of 2,200 tons per day¹, a permitted processing capacity of 1,750 tons per day, and a permitted vehicle capacity of 1,014 vehicles per day. In addition to processing mixed solid waste, the MRF includes a green waste compost facility. The compost portion of the facility has an annual processing capacity of 75,000 cubic yards. Based on an average density of 0.8 tons per cubic yard, this equates to an annual processing capacity of approximately 60,000 tons. Recyclables captured at the MRF include:

- **Wood / green waste** processed for compost & woodchips
- **Metal** - ferrous/metallic items
- **Plastic** - many grades
- **Glass** - all colors
- **Paper** - newspaper, junk mail, phonebooks, magazines, scrap paper, paperboard and cardboard.

¹ <http://www.wpwma.com/facilities.html>

In calendar year 2008, the MRF processed an average of 487 vehicles per day² and received an average of 1,076 tons of waste per weekday³. Of this amount, 831 tons consisted of mixed solid waste, 192 tons consisted of source separated green waste; the remainder consisted of wood waste and other source separate recyclables. During the same time period, the WPWMA received and processed a total of 54,548 tons of source separated green waste at its composting facility.

The WRSL is a Class II/III municipal solid waste (non-hazardous) landfill. The WRSL is permitted to accept 1,900 tons per day and 624 vehicles per day. In calendar year 2008, the WRSL received an average of 932 tons and 130 vehicles per weekday. The WRSL has a total capacity of 36,350,000 cubic yards. As of July 1, 2009, a total of 10,911,366 cubic yards have been disposed at the landfill, leaving a remaining capacity of 25,438,634 cubic yards. Under current projected development conditions, the landfill has a projected lifespan extending through 2041.

Solid Waste Generation

To estimate the amount of waste expected on an annual basis to be processed at the MRF and disposed of at the WRSL, the City uses waste generation, disposal and diversion rates expressed as pounds per person per day. The City has calculated solid waste generation, disposal and MRF recycling rates based on actual 2008 data obtained from City of Roseville records, data maintained by the WPWMA and data maintained by Cal Recycle. The generation rate includes construction and demolition debris (C&D). The generation rates based on 2008 data are considered appropriate for inclusion of C&D in this analysis, as they are estimated to represent a conservative level of disposal on an annual basis as described further in this Section. For purposes of this analysis, it is assumed that all waste would be processed and disposed at WPWMA facilities.

² While a majority of the waste received at both the MRF and WRSL occur on weekdays, and the peak vehicle loading at the WRSL occurs on weekdays, vehicle loading at the MRF during calendar year 2008 was consistent across both weekdays and weekends. Therefore, the average vehicle loading for the MRF includes both weekdays and weekends.

³ Regional University Specific Plan, December 2007

Table 4.12.4-1 summarizes the 2008 data and source of the data used within this analysis. The data is categorized by the various waste streams as landfill waste, direct recyclables or MRF diverted recyclables. As shown in Table 4.12.4-1, the City generated 172,906 tons of waste during 2008 (474 tons per day, rounded). This includes waste disposed at landfills, alternative daily cover (ADC), waste diverted through recycling purposes (direct and MRF recycling), and construction and demolition debris. Recycling is accomplished through either direct recycling opportunities or through the processing and recovery of recyclables at WPWMA facilities (including source separated recycling of wood waste, green waste, and C&D; landfill recovery; and recyclables recovered from the MRF lines). The City offers various direct recycling opportunities including cardboard, newspaper, CRV, battery drop off locations and e-waste pick up programs. These recyclable materials are not processed through the MRF.

As summarized in the table below, the City disposed 108,243 tons of solid waste through landfill burial and 9,901.5 tons of ADC, for a total disposal of 118,145 tons disposed. Total waste diverted from landfill disposal totaled nearly 54,762 tons through direct recycling opportunities and diversions through recyclables collected from the MRF. In January 2008, the City's residential population was reported to be 109,437 persons. Based on the data in Table 4.12.4-1, the City calculated various waste generation, disposal and diversion rates. These are documented in Table 4.12.4-2.

TABLE 4.12.4-1

2008 SOLID WASTE GENERATION DETAIL (TONS)

Waste Description	Records Source	Landfill	Direct Recycling	MRF Recycling
Cardboard	Roseville		3,408.0	
Newspaper	Roseville		1,030.6	
CRV	Roseville		88.4	
Residential Buy-Back	WPWMA / Nortech		14.8	
MRF	WPWMA			50,220
Landfill (a)	Cal Recycle	108,243.0		
Alternative Daily Cover (b)	Cal Recycle	9,901.5		
WASTE GENERATION TOTAL (TONS) = 172,906 (rounded)		118,144.5	4,541.8	50,220

(a) According to Cal Recycle, 90,357 tons was disposed at WRSL facilities. The remaining 17,886 tons was disposed at other landfills within the State.

(b) According to Cal Recycle, 7,568 tons was used as ADC at WRSL facilities. The remaining 2,333.5 tons was used as ADC at other landfills within the State.

TABLE 4.12.4-2

SOLID WASTE GENERATION, DISPOSAL AND DIVERSION RATES

CATEGORY	RATE
Generation Rate	8.6 lbs/person/day
Disposal Rate	5.9 lbs/person/day
MRF Recycling Diversion Rates	2.5 lbs/person/day

At buildout of the existing General Plan, the City estimates a total population of 164,793 people. Using the generation, disposal and diversion rates reported in Table 4.12.4-2, this population would generate 258,642 tons of solid waste per year. Of this amount, it is estimated 177,441 tons per year would be disposed at the landfill, and 75,187 tons per year would be diverted for recycling through processing at the MRF.

4.12.4.3 REGULATORY SETTING

Solid waste activities are regulated by Federal, State and Local regulation as summarized below.

Federal**Resource Conservation and Recovery Act, Subtitle D**

Title 40 of the Code of Federal Regulations (CFR), Part 258 (Resource Conservation and Recovery Act [RCRA, Subtitle D]) contains regulations for municipal solid waste landfills and requires states to implement their own permitting programs incorporating the federal landfill criteria. The federal regulations address the location, operation, design, groundwater monitoring, and closure of landfills. Federal requirements for disposal of biosolids are set forth in Title 40 Part 503 of the CFR.

State**Integrated Waste Management Act**

The California Integrated Waste Management Act, also known as Assembly Bill 939 (AB 939) (Public Resources Code Section 41780), enacted in 1989, contains regulations affecting solid waste disposal in California. AB 939 is designed to increase landfill life and conserve other resources through increased source reduction and recycling. AB 939 requires cities and counties to prepare Solid Waste Management Plans and adopt Source Reduction and Recycling Elements (SRRE) to implement AB 939's goals. These goals include diverting approximately 50 percent of solid waste from landfills and identifying programs to stimulate local recycling in manufacturing and the purchase of recycled products.

The SRRE, which is part of the City of Roseville General Plan, contains goals and policies for solid waste disposal. The City has met AB 939's 50 percent reduction goal for 2000. The City's waste reduction for 2006 was 66 percent. To meet

these goals, the SRRE specifies three methods: (1) source reduction, which is a net reduction in waste generation at the source; (2) recycling, which is a reuse of materials to produce new similar products or different products; and (3) composting, which is a process of biological decomposition of solid organic debris, such as leaves, grass clippings, and other organic material commonly found in the municipal waste stream to create useable material.

The Legislature amended the California Integrated Waste Management Act in 2007 through Senate Bill 1016 (SB 1016). Previously, the Act had required Cal Recycle, at least once every two years, to review a jurisdiction's source reduction and recycling element and household hazardous waste element. Under SB 1016, which repealed that requirement, Cal Recycle instead was required to make a finding whether each jurisdiction was in compliance with AB 939's diversion requirements for calendar year 2006 and to determine compliance for the 2007 calendar year and later years based on the jurisdiction's change in its per capita disposal rate. Cal Recycle is also required to review a jurisdiction's compliance with those diversion requirements in accordance with a specified schedule, which would be conditioned upon the CWMB finding that the jurisdiction is in compliance with those requirements or has implemented its source reduction and recycling element and household hazardous waste element.

SB 1016 also requires Cal Recycle to issue an order of compliance if it finds that the jurisdiction has failed to make a good faith effort to implement its source reduction and recycling element or its household hazardous waste element pursuant to a specified procedure. Cal Recycle is required to comply with certain requirements in making this determination, including considering the extent to which the jurisdiction has maintained its per capita disposal rate.

SB 1016 repeals this review schedule on January 1, 2018, and, after that date, requires Cal Recycle to review each jurisdiction's source reduction and recycling element and household hazardous waste element at least once every 2 years.

Solid Waste Reuse and Recycling Access Act of 1991

Assembly Bill 1327 (AB 1327) (Solid Waste Reuse and Recycling Access Act) enacted in 1991 requires jurisdictions to adopt ordinances that require development projects to provide adequate storage areas for collection and removal of recyclable materials.

Department of Resources Recycling and Recovery (Cal Recycle)

Cal Recycle is the new home of California's recycling and waste reduction efforts. Officially known as the Department of Resources Recycling and Recovery, Cal Recycle is a new department within the California Natural Resources Agency and administers programs formerly managed by the State's Integrated Waste Management Board and Division of Recycling. Cal Recycle is the State agency charged with the primary responsibility for permitting of solid waste facilities. Cal Recycle operates through its designated Local Enforcement Agencies (LEAs), which typically are County Health Departments. Air pollution from solid waste facilities is regulated by local air pollution control districts or air quality management districts, while water pollution is regulated by regional water quality control boards.

Universal Waste Rule- February 9, 2006

Universal wastes are hazardous wastes that are widely produced by households and many different types of businesses. Universal wastes include televisions, computers and other electronic devices as well as batteries, fluorescent lamps, mercury thermostats, and other mercury containing equipment, among others. The hazardous waste regulations (Cal. Code Regs, title 22, Section 66261.9) identify seven categories of hazardous wastes that can be managed as universal wastes. Any unwanted item that falls within one of these waste streams can be handled, transported and recycled following the simple requirements set forth in the universal waste regulations (UWR) (Cal. Code Regs, title. 22, div. 4.5, ch. 23)

AB 32- California Global Warming Solutions Act-Mandatory Commercial Recycling

The Mandatory Commercial Recycling measure, which is part of AB 32, is designed to achieve a reduction in greenhouse gas emissions of five million metric tons of carbon dioxide equivalents. It will increase waste diversion from landfills beyond the previous state-mandated rate of 50 percent to a goal of 58 percent by January 2012.

The commercial sector generates well over half of the solid waste in California, at 68 percent, according Statewide Waste Characterization data from 2008. Yet that sector is not directly subject to the requirements of another bill that attempted to divert waste from landfills – AB 939, the Integrated Waste Management Act of 1989.

In order to achieve the 58 percent commercial recycling goal, an additional two million to three million tons of materials will need to be recycled from the commercial sector by 2020, according to the Department of Resources Recycling and Recovery, better known as Cal Recycle.

Local**Western Placer Waste Management Authority**

The Western Placer Waste Management Authority (WPWMA) is a regional agency comprised of Placer County and the Cities of Roseville, Rocklin and Lincoln. The WPWMA provides recycling and waste disposal opportunities to those communities, as well as to the City of Auburn and the Town of Loomis. The WPWMA oversees operations of the Materials Recovery Facility (MRF), the Western Regional Sanitary Landfill (WRSL), and the Permanent Household Hazardous Waste Collection Facility (PHHWCF). The MRF receives, separates, processes and markets recyclable materials removed from delivered solid waste.

The City of Roseville entered into a Flow Control Agreement with the WPWMA in 2005. This agreement states that any waste generated within the City must first be processed at the WPWMA's Material Recover Facility (MRF) for sorting and then sent to the Western Regional Sanitary Landfill (WRSL) for disposal. Temporary construction and demolition debris must go through the Materials Recovery Facility. Any materials that are collected through recycling programs that are established by the City, such as the collection of green waste, cardboard, newspaper, and other recyclables does not have to be delivered to the MRF. The City of Roseville retains the rights to market any collected recyclables.

Placer County Solid Waste Local Enforcement Agency

Placer County Environmental Health Services has been certified by the Cal Recycle as the Local Enforcement Agency (LEA) to enforce state solid waste statutes and regulations within the County. The LEA's primary functions are permitting, inspection and enforcement at solid waste operations and facilities such as landfills/disposal sites (active and closed), including sites for disposal of construction/demolition debris and inert materials; transfer stations, including Materials Recovery Facilities; and composting facilities.

City of Roseville General Plan and Zoning Ordinance

As described previously, the City's Source Reduction and Recycling Element is part of the City of Roseville General Plan, and contains includes goals and policies for solid waste disposal. Section 9.17 of the Municipal Code includes provision for refuse hauling and recycling.

4.12.4.4 IMPACTS

Solid Waste Analysis

This solid waste analysis considers waste processing demands on the MRF and disposal demands on the WRSL. These demands were estimated based on the total tonnage of waste projected to be generated by the City plus the Project and

by evaluating the impacts from this demand on processing capabilities at the MRF and the lifespan of the landfill. Because all waste collected and processed at WPWMA facilities is first tipped onto the MRF floor for processing, the MRF is conservatively evaluated based upon total waste generation. This analysis is considered conservative in that it does not reduce the amount of waste based upon direct (i.e., privately conducted and City recycling programs such as cardboard, newspaper, CRV, battery drop off locations and e-waste pick up programs) recycling that does not impact operations of the MRF. To estimate the amount of waste expected on an annual basis, the City uses the solid waste generation rates shown in Table 4.12.4-2, above.

Threshold of Significance

For the purposes of this EIR, a significant impact would occur if the development proposed for the project would do the following:

- Be served by a landfill or MRF with insufficient permitted capacity to accommodate the project's solid waste disposal needs.
- Fail to comply with federal, state, and local statutes and regulations related to solid waste.

IMPACT 4.12.4-1	INCREASED DEMAND FOR SOLID WASTE SERVICES AT THE MATERIALS RECOVERY FACILITY	
Applicable Policies and Regulations	Assembly Bill 939 Senate Bill 1016 City Source Reduction and Recycling Element	
	CSP	Urban Reserve
Significance with Policies and Regulations	Less Than Significant	Less Than Significant
Mitigation Measures:	None Required	None Required
Significance after Mitigation:	Less Than Significant	Less Than Significant

CREEKVIEW SPECIFIC PLAN

Development of the CSP would result in solid waste generated by residences, retail and commercial establishments, offices, schools, and recreational facilities. Development of the project area would include 2,011 dwelling units resulting in a population of 5,108 people. Using the waste generation factor of 8.6 pounds per person per day (Table 4.12.4-2), the project is expected to generate 8,017 tons per year (22 tons per day) of solid waste to be processed at the MRF. The City currently processes approximately 148,145 tons per year (406 tons per day) at the MRF. This is the sum of landfill disposal and ADC at WRSL facilities plus MRF recycling (90,357 tons disposal + 7,568 tons ADC + 50,220 tons MRF recycling) at buildout of the General Plan, that number is conservatively expected to be as high as 258,642 tons per year (708 tons per day) if no direct recycling efforts are assumed. The total solid waste expected to be produced for processing at the MRF by the City, including the CSP at buildout, would be as much as 266,659 tons per year (730 tons per day).

As explained above, the MRF currently processes an average of 1,071 tons per day and is designed to receive up to 2,200 tons per day. The peak tonnage received at the MRF would continue to increase as growth occurs in the service area. The MRF is permitted to receive 1,750 tons per day and is currently operating at approximately 61% of permitted capacity. At buildout of the City and the CSP, an additional 302 tons per day (708 - 406) of waste would be processed at the MRF. Adding this to the current processing rate of 1,071 tons per day yields an estimated capacity need of 1,373 tons per day. This would represent 78.5% of the MRFs permitted capacity at buildout. Thus there is adequate capacity to serve the CSP; therefore, this would be considered a **less than significant** impact.

URBAN RESERVE

Although no development is currently proposed in the Urban Reserve area, a total of 405 dwelling units are estimated for future development within the Urban Reserve for purposes of this analysis. Using the waste generation factors shown in Table 4.12.4-2, future development of the Urban Reserve area would produce approximately 1,615 tons per year (5 tons per day, rounded) of solid waste for processing at the MRF. At buildout of the City, the CSP and the Urban Reserve areas, it is estimated that the City of Roseville will produce approximately 1,378 tons per day of waste for processing at the MRF. When considering existing demands upon MRF processing, this would represent 78.7% of the MRF's permitted capacity at buildout.

The WRSP FEIR identified a significant and unavoidable impact due to increased demand for solid waste services at the MRF, because the processing volumes were expected to exceed the permitted capacity of that facility. Since preparation of the WRSP FEIR, staff has been able to better verify waste generation rates. As a result, the existing permitted MRF processing capacity would be sufficient to serve not only the CSP at buildout, but the Urban Reserve as well. This is a departure from what was assumed in the WRSP FEIR, which assumed that MRF capacity would need to be expanded. Therefore, WMM 4.11-

10 (Increase MRF Capacity) is no longer applicable to the project. Impacts on the MRF are considered **less than significant**.

IMPACT 4.12.4-2	INCREASED DEMAND FOR SOLID WASTE SERVICES AT THE LANDFILL	
Applicable Policies and Regulations	Assembly Bill 939 Senate Bill 1016 City's Source Reduction and Recycling Element	
	CSP	Urban Reserve
Significance with Policies and Regulations	Significant	Significant
Mitigation Measures:	WMM 4.11-7 Expand the WRSL Landfill	WMM 4.11-7 Expand the WRSL Landfill
Significance after Mitigation:	Significant and Unavoidable	Significant and Unavoidable

CREEKVIEW SPECIFIC PLAN

Development of the CSP would result in solid waste generated by residences, retail and commercial establishments, offices, schools, and recreational facilities. Using the factors shown in Table 4.12.4-2, above, a total of 8,017 tons per year (22 tons per day) of solid waste would be generated by the CSP. Of this amount, 5,500 tons per year (based on a disposal rate of 5.9 pounds per person per day), including ADC, would require disposal through direct bury at the landfill. At buildout of the City's General Plan, it is anticipated that landfill disposal will reach 177,441 tons per year (486 tons per day). At buildout of the CSP, City landfill disposal needs would reach 182,941 tons per year (501 tons per day).

The landfill has a remaining capacity of approximately 25,438,634 cubic yards. According to WPWMA staff, 1,200 pounds of solid waste take up approximately one cubic yard of landfill space. Thus considering the remaining capacity estimates cited above yields a remaining landfill capacity of 15,263,180 tons.

Currently, the landfill is projected to be able to accept waste until 2042. However, the final closure date could be affected by several factors, including regional growth rates, economic conditions, and the efficiency of waste recovery. Depending on when the project area is built out, it would generate approximately 110,000 tons of solid waste for disposal at the landfill over 20 years (5,500 tons per year x 20 years). This waste would require approximately 0.72 percent of the landfill's remaining capacity and will shorten the life time of the landfill by less than 3 months based on a remaining life span of 33 years (between year 2009 and 2042). Because the CSP could shorten the life of the landfill the impact is considered **significant**.

Approximately 465-acres west of the WRSL are available for a landfill expansion, although no expansion has been approved to date. As discussed in WMM 4.11-7, the landfill could be expanded to increase capacity; however, the City cannot guarantee landfill expansion beyond current plans. Therefore, this impact is considered **significant and unavoidable**.

URBAN RESERVE

Although no development is currently proposed in the Urban Reserve area, a total of 405 dwelling units are estimated for development within the Urban Reserve for purposes of this analysis. Using the waste generation factors shown in Table 4.12.4-2, future development of the Urban Reserve area would produce approximately 1,108 tons per year (3 tons per day) of solid waste for landfill disposal. At buildout of the CSP and the Urban Reserve, over a 20 year period, an additional 132,160 tons of solid waste would be produced ((CSP 5,500 tons per year + UR 1,108 tons per year) x 20 years). This will require approximately 0.87% of the landfill's remaining capacity and will shorten the life of the landfill by 3.5 months. The Urban Reserve's contribution to shortening the life of the landfill would be approximately one-half month.

The WRSP FEIR identified a significant and unavoidable impact on increased demand for landfill capacity because the life of the landfill would be reduced by

approximately 1.4 years and identified WMM 4.11-7 Expand the Landfill to reduce impacts. Because the City cannot guarantee landfill expansion beyond current plans by the WPWMA mitigation measure WMM 4.11-7 is still considered an appropriate measure. Impacts on the landfill are considered **significant and unavoidable**.

IMPACT 4.12.4-3	EXPANSION OF THE LANDFILL	
Applicable Policies and Regulations	Title 40 CFR, Part 258 Integrated Waste Management Act Placer County General Plan	
	CSP	Urban Reserve
Significance with Policies and Regulations	Significant	Significant
Mitigation Measures:	WMM 4.11-7 Expand the WRS� Landfill	WMM 4.11-7 Expand the WRS� Landfill
Significance after Mitigation:	Significant and Unavoidable	Significant and Unavoidable

CREEKVIEW SPECIFIC PLAN

The CSP would contribute to the need to expand the landfill in the future. Expansion of the landfill would create environmental effects. Plans for expansion of landfill capacity beyond 2041 have not been developed; however, specific impacts cannot be identified at this time. Because of the identified expansion site's proximity to the existing landfill, however, it can be anticipated that the impacts of an expansion would be similar to those attributed to the existing landfill. There would be construction related impacts such as air pollutant emissions, noise, and erosion. In addition, agricultural land and biological resources, including wetlands, could be lost. Once constructed, the landfill could create additional odors, traffic, operational air emissions, including increased emissions of landfill gas and combustion flare emissions; litter; night lighting and other changes in visual character; and degradation of surface and

groundwater quality. These impacts would be similar to those of the existing landfill and, where significant, could be reduced by implementation of MM 4.11-7 Expand the WRSL, mitigation measures already required of the landfill and the solid waste facilities permitting process. However, there could be impacts, such as the loss of biological and agricultural resources that would remain **significant and unavoidable** even after mitigation.

URBAN RESERVE

Although not proposed at this time, future development of the Urban Reserve area would contribute to the need to expand the landfill. Implementation of MM 4.11-7 Expand the WRSL Landfill would reduce impacts. As indicated above the expansion would create environmental effects. Because these effects can not be fully characterized at this time and it is reasonable to assume that there may be resulting loss of biological and agricultural resources, this impact would be **significant and unavoidable** even after mitigation.

IMPACT 4.12.4-4	CONSTRUCTION DEBRIS DEMAND FOR SOLID WASTE SERVICES	
Applicable Policies and Regulations	Assembly Bill 939 Senate Bill 1016 City's Source Reduction and Recycling Element	
	CSP	Urban Reserve
Significance with Policies and Regulations	Significant	Significant
Mitigation Measures:	WMM 4.11-11 Divert Construction Debris	WMM 4.11-11 Divert Construction Debris
Significance after Mitigation:	Significant and Unavoidable	Significant and Unavoidable

CREEKVIEW SPECIFIC PLAN

Development of the CSP area would involve removal of debris from the site and construction of new buildings and infrastructure that would generate construction and demolition debris (C&D) that requires disposal. Construction and demolition activities can generate significant amounts of waste.

The solid waste generation rate is inclusive of construction and demolition debris (C&D). The City generated 172,906 tons of solid waste during 2008 as shown in Table 4.12.4-1. This is equivalent to 474 tons per day of solid waste. During the same time period (2008), a total of 963 homes totaling approximately 1,617,000 square feet were constructed within the City of Roseville, along with 2,134,900 square feet of non-residential construction. Using a C&D debris factor recommended by the Environmental Protection Agency of 4.4 pounds per square foot of construction, this level of development would generate 23.7 tons per day of C&D. C&D waste, therefore, would represent 5% of the total annual waste generation rate within the City. As described previously, the waste generation rate of 8.6 pounds per person per day includes C&D debris. However, it is unclear if the amount of C&D debris included in the waste generation rate adequately represents future C&D generation as the City and CSP develop. Therefore, an analysis of the City's future absorption rates for residential and non-residential construction was prepared to estimate potential future C&D debris generation on a yearly basis. This yearly estimated C&D generation rate is then compared to the estimated volume of C&D generated in 2008 to determine if the levels of C&D waste in the waste generation rate of 8.6 pounds per person per day adequately accounts for potential future C&D waste volumes.

The City's estimates based upon absorption studies that 23,734 dwelling units will be constructed between 2010 and 2039 (30 years) with a maximum of 2,087 homes (3,735,938 square feet) constructed in 2022, 2023 and 2024. The absorption information also estimates 24,714,377 square feet of non-residential construction will be built over this same time period with the maximum of

1,343,400 square feet constructed in 2038. However, during 2038 it is expected that residential construction will only result in 300,000 square feet of residential development as the City reaches residential build out. It is projected that the year 2024 would generate the maximum square footage of construction, including C&D debris (when considering both residential and non-residential absorption rates) through the year 2039. In 2024, residential C&D is estimated at 22.5 tons per day and non-residential is estimated at 4.7 tons per day, for a total C&D generation of 27.2 tons per day. This exceeds the estimates included in the annual waste generation rates of 23.7 tons per day by 3.5 tons per day. The City's analysis indicates there are 5 years (2021 through 2025) when C&D generation will exceed the 27.2 tons per day assumed within the City's waste generation rates, with 2024 representing the highest of these 5 years. Assuming the additional 3.5 tons per day is processed at the MRF, total capacity needs at the MRF yield 1,376.5 tons per day. This is based upon 1,373 tons per day as identified in Impact 4.12.4-1 plus the additional C&D waste of 3.5 tons per day. As described in Impact 4.12.4-1, the MRF is permitted to receive 1,750 tons per day. Therefore, the additional C&D waste is not expected to impact the MRF facility.

As discussed above, solid waste estimates generated for buildout of the CSP area are inclusive of C&D waste and would increase processing demands at the MRF and shorten the life of the landfill. This is simply because some amount of C&D is not able to be recycled and is included in the waste to be disposed at the landfill. Because the project will reduce the life of the landfill, albeit by less than 3 months, this is considered a significant impact. Consistent with the requirements of AB 939, previously adopted WMM 4.11-11 identified in the WRSP EIR, requires 50% of the construction debris from the CSP to be diverted from the landfill. Developers must submit all diversion and disposal records to the City's Environmental Utilities Department to demonstrate that the 50% diversion requirement has been satisfied. This would ensure that the impacts from construction are reduced. However, because the City cannot ensure that all C&D waste can be diverted from the landfill, nor can the City guarantee

landfill expansion beyond current plans, the impact of C&D waste upon the landfill is considered **significant and unavoidable**.

URBAN RESERVE

Although not proposed at this time, future development of the Urban Reserve area would generate debris from the construction of infrastructure and new buildings. As discussed above construction debris will create demand upon the MRF and shorten the life of the landfill. Previously adopted WMM 4.11-11, identified in the WRSP EIR, continues to apply to the Urban Reserve area and would reduce the impact of construction debris disposed in the landfill by 50%. Implementation of this mitigation measure is still appropriate and would mitigate impacts; however, because the life of the landfill would be reduced by the project and because the City cannot guarantee landfill expansion beyond current plans, the impact of C&D waste upon the landfill is considered **significant and unavoidable**.

4.12.4.5 MITIGATION MEASURES

The Project area was included in the program-level analysis of the West Roseville Specific Plan Final EIR. Mitigation adopted by the City Council at time of approval in 2004 is still applicable in the CSP area unless superseded by CSP project-specific mitigation, and will continue to apply to the Urban Reserve area unless noted. The following refers to the previously adopted WRSP mitigation measures as “WMM,” and will show either ~~strikeout~~ for language that is being eliminated from the previously adopted WMMs or underline for language that is proposed to be added to the previously adopted WMMs.

WMM 4.11-7 *Expand the WRSL Landfill (Impact 4.12.4-2 and 4.12.4-3 – CSP and Urban Reserve)*

Development in the ~~WRSP-CSP Area and Remainder Area~~
Urban Reserve shall pay collection fees to the City of

Roseville, a portion of which shall be used to service bonds necessary to fund landfill expansion.

WMM 4.11-11 *Divert Construction Debris (Impact 4.12.4-4 – CSP and Urban Reserve)*

Developers of the CSP and Urban Reserve areas shall ensure a 50% diversion of development's construction waste stream from landfill disposal. In Developer contracts with construction contractors and their sub-contractors, the Developer shall require that the amount of construction waste be diverted from landfill disposal by no less than 50%. The Developer shall further require that contractors and sub-contractors submit records of diversion and disposal to the City's Environmental Utilities Department in order to verify compliance with this requirement.

Since preparation of the WRSP FEIR, the City has implemented a green waste program whereby all new residential customers receive green waste bins. Therefore this mitigation measure is no longer required because it is a standard operating procedure.

~~**WMM 4.11-9 *Greenwaste policies (Impact 4.11-9 Remainder)***~~

~~All residences shall be provided with one 90-gallon greenwaste receptacle.~~

~~**WMM 4.11-10 *Increase MRF Capacity (Impact 4.11-10 WRSP and Remainder Area)***~~

~~Operations at the MRF could be expanded by increasing the number of processing lines. Like expansion of the landfill, increasing the MRF capacity would be under the jurisdiction of WPWWMA. The WPWWMA can and should increase the~~

~~capacity of the MRF and the City should advocate that it do
so.~~