

3.13 UTILITIES AND SERVICE SYSTEMS

This section describes the utilities and service systems that would serve the Globemaster Corridor Specific Plan (GCSP; Proposed Project) area; identifies associated regulatory requirements, and analyzes the Proposed Project's impacts to utilities and service systems. The following discussion focuses on the existing utilities and service systems in the City of Long Beach (City) and more specifically, the Plan Area.

The Initial Study (IS) and Notice of Preparation (NOP) are contained in Appendix A-1, Initial Study; and Appendix A-2, Notice of Preparation, respectively. Comments regarding utilities and service systems, received in response to the NOP (see Appendix A-3, Notice of Preparation Comment Letters), specifically related to potential disruption of water supply infrastructure and wastewater infrastructure capacity, have been considered in the preparation of the analyses presented in this section.

The IS found that the Proposed Project would have less than significant impacts as it relates to compliance with solid waste disposal-related statutes and regulations (Appendix A-1). As such, this impact will not be addressed further in this Draft Program Environmental Impact Report (PEIR)/Draft Program Environmental Impact Statement (PEIS).

3.13.1 Existing Conditions

Sewer System

The Proposed Project is located within the jurisdictional boundaries of Los Angeles County Sanitation District (LACSD) No. 3. The LACSD owns, operates, and maintains the large trunk sewers that form the backbone of the regional wastewater conveyance system. Local collector and/or lateral sewer lines are the responsibility of the jurisdiction in which those lines are located. The Long Beach Water District (LBWD), which operates and maintains approximately 765 miles of sanitary sewer lines, is the jurisdiction with responsibility of the local collector and/or lateral sewer lines. The wastewater generated by the City of Long Beach (City) is treated at the Joint Water Pollution Control Plant, located in the City of Carson, which has a capacity of 400 million gallons per day (mgd) and currently produces an average flow of 254.7 mgd. As a result, the facility has a remaining capacity of 145.3 mgd. In addition, wastewater generated in the City is treated at the Long Beach Water Reclamation Plant, located at 7400 East Willow Street, which has a capacity of 25 mgd and currently produces an average recycled water flow of 9.8 mgd (LACSD 2018a). As a result, the facility has a remaining capacity of 15.2 mgd. Combined, these two facilities have a remaining capacity of 160.5 mgd. Tertiary treated sewage from these facilities is used to irrigate public landscaping through the recycled water program and recharge the groundwater basin. The wastewater infrastructure for the immediate Plan Area vicinity primarily consists of vitrified clay pipe.

Storm Drain System

Both the City and the Los Angeles County Flood Control District (LACFCD) maintains storm drain mains within the City. The City currently maintains an intricate storm drain system, consisting of streets and gutters, catch basins, and underground pipes, ditches, streams/creeks, pump stations, and channels/rivers. This storm drain system transmits storm waters away from residential and business uses in the City to designated drainage areas, including the Los Angeles and San Gabriel Rivers. In order to ensure proper function of the City storm drain system, the City implements the Long Beach Stormwater Management Plan, which is a comprehensive program containing several elements, practices, and activities aimed at reducing or eliminating pollutants in stormwater to the maximum extent practicable. In addition, the City performs bi-annual maintenance work on the storm drain system, in addition to emergency repair work on an as-needed basis (City of Long Beach 2017, 2019a).

The LACFCD provides stormwater collection and conveyance for a majority of the City. In the immediate Plan Area vicinity, as-built storm drain plans illustrate a collection system commencing near the intersection of Spring Street and Lakewood Boulevard, which ultimately terminates near Orange Avenue. Pipe sizes for this particular section of storm drain system range from 66- to 96-inch diameter, reinforced concrete pipe (RCP), and includes a 9- by 7-foot rectangular reinforced concrete box for a small portion. An adjacent storm drain collection system running north and south along Cherry Avenue, between 33rd Street and 36th Street, contributes to the larger storm drain system. See Figure 2-2, Local Context, in Chapter 2.0 (Project Description) for street locations (City of Long Beach 2018a).

The existing storm drain system starting near the intersection of Walnut Avenue and Tehachapi Drive, which flows east to Cherry Avenue, then south to Bixby Road, then east along Bixby Road, will service the northerly portion of the Plan Area with RCP pipes ranging from 36 to 78 inches in diameter. The existing storm drain system starting near the intersection of Walnut Avenue and 28th Street, which flows north to Spring Street, then west to Orange Avenue, will service the southwesterly portion of the Plan Area with RCP ranging from 30 to 54 inches in diameter (City of Long Beach 2018a).

Water Service

The LBWD provides water services to the entire City, through a series of underground pipelines. The service area includes over 912 miles of water mains, with nearly 90,000 active service connections (LBWD 2018). As indicated in Table 3.13-1, Water Supplies – Current and Projected, the major sources of water for the LBWD include imported water, purchased from the Metropolitan Water District of Southern California (MWD); groundwater pumped and treated by the LBWD; and recycled water. In addition, the LBWD is partnering with other water agencies to

conduct ongoing research into other possible new water supplies, including desalinated seawater, and actively supports water conservation measures to reduce water demand (MWD 2016).

Table 3.13-1
Water Supplies – Current and Projected (af/yr)

Water Purchased From	2015	2020	2025	2030	2035	2040
Groundwater	32,693	33,001	33,501	34,001	34,501	35,001
Imported	35,100	35,100	35,100	35,100	35,100	35,100
Recycled Water	9,190	9,190	9,190	9,190	9,190	9,190
Total	76,983	77,291	77,791	78,291	78,791	79,291

Source: Long Beach Water Department 2016

Notes: af/yr = acre-feet per year

Fire Flow

The City adopted the California Fire Code, with some amendments and modifications, as part of the Long Beach Municipal Code. Generally, the intent of the California Fire Code is to prescribe regulations consistent with nationally recognized good practices for the safeguarding of life and property from the hazard of fire and explosion. Fire flow is the quantity of water available or needed for fire protection in a given area, and is normally measured in gallons per minute (gpm), as well as the duration of flow. Fire flow requirements, found in the Long Beach Municipal Code, are based on building types and floor area and range from 1,250 to 8,000 gpm, at 20 pounds per square inch (psi).

In accordance with the California Fire Code, the Long Beach Fire Department (LBFD) requires the installation of sprinkler systems in many new buildings, including retail buildings in excess of 5,000 square feet and buildings greater than 55 feet in height. In addition, on-site hydrants are required in any portion of a project site that exceeds the allowable distance from a public hydrant located in the right-of-way. Fire flow requirements are subject to LBFD standards, based on the type of building and its uses on a case-by-case basis.

Solid Waste and Recycling Services

Solid waste collection services are provided by the City's Environmental Services Bureau; however, the City is also a member of the LACSD. Based on solid waste generation rates identified from the California Department of Resources Recycling and Recovery (CalRecycle), it was estimated that the annual tonnage of solid waste generated in the City in 2012 was 260,964 tons per year (City of Long Beach 2017; CalRecycle 2018).

A large majority of the City's solid waste is disposed of at the Southeast Resource Recovery Facility (SERRF). The City and LACSD have a Joint Powers Agreement to operate the SERRF, located at 120 Pier S Avenue in Long Beach. SERRF is a refuse-to-energy transformation

facility, which was developed to reduce the amount of waste to be managed and to reduce the consumption of natural resources. The SERRF reduces the volume of solid waste by approximately 80 percent, while creating electrical energy. The SERRF produces 36 megawatts of electricity for Southern California Edison, which is enough to supply 35,000 homes with electrical power (City of Long Beach 2017).

Solid waste from the existing uses in the City is collected and trucked to the SERRF, where it is processed through one of three boilers. In addition, the SERRF performs “front-end” and “back-end” recycling, by recovering items such as white goods (i.e., large electrical goods used domestically, such as refrigerators and washing machines), prior to incineration and collection of metals removed from the boilers after incineration. Each month, an average of 825 tons of metal are recycled rather than sent to a landfill. The Solid Waste Facility Permit from the County Solid Waste Management Program for the SERRF authorizes the disposal of a maximum of 2,240 tons per day. Currently, the SERRF processes approximately 1,345 tons per day. Remaining capacity and estimated closure dates are not determined because the SERRF is a transformation facility that never reaches capacity, as it continually converts solid waste to energy and ash. In 2012, approximately 203,040 tons, or 47 percent, of the solid waste disposed of by the Long Beach residents and businesses were disposed of at the SERRF (Los Angeles County 2017; City of Long Beach 2017, 2019b; LACSD 2018b).

In 2013, the Puente Hills Landfill closed after 56 years of operation. As such, solid waste considered not suitable for processing at the SERRF and generated in the City is taken to landfills in Orange, San Bernardino, and Riverside counties (see Table 3.13-2, Capacity of Landfills Serving the City of Long Beach [2012]) (Los Angeles Daily News 2013). Solid waste would not be consider suitable for processing at the SERRF if it would: 1) damage or threaten to damage combustion units or otherwise adversely affect maintenance of the SERRF; 2) present a substantial endangerment to the health or safety of the public or SERRF employees; 3) cause any permit requirement or condition to be violated; or 4) exceed the materials handling capacity of the combustion feed system (City of Long Beach 2018b). Upon closure of the Puente Hills Landfill, residents and commercial haulers are encouraged to use other nearby LACSD facilities for disposal and recycling. Alternative disposal options include two ramped-up Material Recovery Facilities (MRFs), operated by LACSD, including the Downey Area Recycling and Transfer Facility in Downey, and the Puente Hills MRF, located at the base of the Puente Hills Landfill. In addition, completed in 2011 and owned and operate by LACSD, the Mesquite Regional Landfill is permitted to receive up to 20,000 tons of municipal solid waste per day, with a total capacity of 600 million tons of municipal waste (LACSD 2018c).

**Table 3.13-2
Capacity of Landfills Serving the City of Long Beach**

Landfill and Location	Remaining Capacity	Maximum Permitted Throughput (tons/day)	Estimated Closing Date
Antelope Valley Public Landfill (Palmdale, CA)	17,911,225 cubic yards	5,548	4/1/2044
Azusa Land Reclamation Co. Landfill (Azusa, CA)	51,512,201 cubic yards	8,000	01/01/2045
Chiquita Canyon Sanitary Landfill (Castaic, CA)	60,408,000 cubic yards	12,000	1/1/2047
Commerce Refuse-To-Energy Facility (Commerce, CA)	1,000 tons/day (permitted capacity)	1,000	N/A
El Sobrante Landfill (Corona, CA)	143,977,170 Tons	16,054	01/01/2015
Frank R. Bowerman Sanitary Landfill (Irvine, CA)	205,000,000 cubic yards	11,500	12/31/2053
Kettleman Hills - B18 Nonhaz Codisposal (Kettleman City, CA)	15,600,000 cubic yards	8,000	N/A
Lancaster Landfill and Recycling Center (Lancaster, CA)	14,514,648 cubic yards	5,100	03/01/2044
McKittrick Waste Treatment Site (McKittrick, CA)	769,790 cubic yards	3,500	12/31/2059
Mid-Valley Sanitary Landfill (Rialto, CA)	61,219,377 cubic yards	7,500	04/01/2045
Olinda Alpha Sanitary Landfill (Brea, CA)	34,200,000 cubic yards	8,000	12/31/2021
Prima Deshecha Sanitary Landfill (San Juan Capistrano, CA)	134,300,000 cubic yards	4,000	12/31/2102
Puente Hills Landfill (Closed) (Industry, CA)	N/A	N/A	10/31/2013
San Timoteo Sanitary Landfill (Redlands, CA)	12,360,396 cubic yards	2,000	01/01/2039
Savage Canyon Landfill (Whittier, CA)	9,510,833 cubic yards	3,350	12/31/2055
Simi Valley Landfill & Recycling Center (Simi Valley, CA)	119,600,000 cubic yards	9,250	01/31/2052
Southeast Resource Recovery Facility (Long Beach, CA)	2,240 tons/day (permitted capacity)	2,240	N/A
Sunshine Canyon City/County Landfill (Los Angeles County, CA)	77,900,000 cubic yards	12,100	10/31/2037

Source: CalRecycle 2020.

N/A = not applicable

Electric Power

Electric utilities are currently being serviced by Southern California Edison (SCE), which provides energy services to the Plan Area, the City, and the greater southern California area. Based on an SCE interactive distribution map, last updated September 14, 2012, three substations (5738, 5753

and 5785) service the Plan Area with overlapping coverage. According to the data: 1) substation 5738 has a maximum available capacity of 7.75 megavolt amperes (MVA) but has no current available capacity (0 MVA); 2) substation 5753 has a maximum available capacity of 4.37 MVA but also has no current available capacity (0 MVA); and 3) substation 5785 has a maximum available capacity of 10.0 MVA and a currently available capacity of 0.9 MVA. Although all of the substations servicing the area appear to be at or near capacity, the existing system is sufficient to meet the existing demands of the current land uses (Dudek 2016).

Natural Gas

Southern California Gas Company (SoCalGas), Gas Transmission Department, operates and maintains a 12-inch, high-pressure natural gas transmission pipeline (Number 512), which lies beneath Cherry Avenue in the Plan Area. However, SoCalGas has no other facilities in the Plan Area, as gas is supplied to the Plan Area by the Long Beach Energy Resources Department (SoCalGas 2016).

The Long Beach Energy Resources (LBER) Department, also known as the Long Beach Gas and Oil Department (LBGO), provides service to approximately 500,000 residents and businesses in the cities of Long Beach and Signal Hill (Long Beach Energy Resources Department 2019). Based on atlas maps provided by LBER, existing gas mains ranging from 10 to 20 inches are located in Cherry Avenue, with 4-inch gas mains also available along the study area perimeter. Based on a general assessment of these facility maps, the current gas infrastructure appears acceptable to meet the demands of the current land uses (Dudek 2016).

Telecommunication

The Technology & Innovation Department of the City of Long Beach is responsible for monitoring three cable franchises in the City of Long Beach, including Spectrum Communications, Frontier Communications, and AT&T U-verse. All three companies hold a franchise issued by the California Public Utility Commission to provide their services to all residents in the City (City of Long Beach Technology & Innovation 2019).

3.13.2 Regulatory Setting

Federal

There are no applicable federal policies or regulations related to the Proposed Project.

State

Urban Water Management Planning Act

The Urban Water Management Planning Act of 1983 requires: 1) preparation of a strategy that plans for water supply and assesses the reliability of water sources over a 20-year period, in 5-year increments; 2) identifies and quantifies adequate water supplies for existing and future demands under normal, single-dry, and multiple-dry years; and 3) implements conservation controls to ensure the efficient use of urban water supplies. Requirements set forth in the Urban Water Management Plan (UWMP) apply to every urban water supplier with 3,000 customers or more that provides over 3,000 acre-feet of water per year (af/yr), to ensure reliability in water service to meet the needs of customers during normal, dry, and multiple dry years.

Governor's Drought Declaration

On January 17, 2014, Governor Brown proclaimed a State of Emergency asking Californians to reduce water use by 20 percent and directing State officials to take all necessary actions to make water available. Additional key measures in the proclamation include the following: 1) directing water suppliers to implement water shortage contingency plans; 2) ordering the State Water Resources Control Board (SWRCB) to consider petitions for consolidation of places of use for the State Water Project and Central Valley Project, in an effort to streamline water transfers and exchanges between water users; 3) directing the California Department of Water Resources (DWR) and the SWRCB to accelerate funding for projects that would have broken ground in 2014 and would enhance water supplies; 4) ordering the SWRCB to notify water rights holders across the State that they may be directed to cease or reduce water diversions based on water shortages; and 5) requiring the SWRCB to consider modifying requirements for releases of water from reservoirs or diversion limitations to conserve water in reservoirs and improve water quality.

Following the Governor's drought declaration, the California DWR announced on January 31, 2014 that if current dry conditions persist, customers would receive no deliveries from the State Water Project. Deliveries to agricultural districts with long-standing water districts were determined to be at risk for a potential 50% reduction.

On April 25, 2014, the Governor issued an executive order to accelerate actions intended to reduce harmful effects of the drought and called on Californians to redouble their efforts to conserve water. On July 15, 2014, the SWRCB approved an emergency regulation requiring water conservation for outdoor water use. Subsequently, on December 22, 2014, Governor Brown issued Executive Order (EO) B-28-14, which extends the operation of the provisions outlined in the April 2014 executive order.

On April 1, 2014, the Governor issued EO B-29-15, which ordered the SWRCB to impose restrictions to achieve a 25% reduction in potable urban water usage through the end of February 2016; directed the DWR to lead a statewide initiative to replace 50 million square feet of lawns and turf with drought-tolerant landscapes; and directed the California Energy Commission to implement a statewide rebate program for the replacement of inefficient household devices. The LBWD has been found compliant with the EO and State Board rules, exceeding the required reduction in water usage (City of Long Beach 2016).

Senate Bill 610

Enacted in 2001 (effective January 1, 2002), Senate Bill 610 Water Supply Assessment (SB 610 WSA) added Section 21159.9 to the Public Resources Code, requiring that any proposed “project,” as defined in Section 10912 of the Water Code, comply with Water Code Section 10910, et seq. 53, commonly referred to as a “SB 610 Water Supply Assessment.” Water Code Section 10910 et seq. outlines the necessary information and analysis that must be included in an environmental impact report (EIR) to ensure that a proposed land development has sufficient water supply to meet existing and planned water demands over a 20-year projection.

The standard for the certainty and reliability of water supplies sufficient to meet the demands of the proposed development is more exacting than that required for the UWMP. Ultimately, because the SB 610 WSA is a source document for an EIR prepared for a project, pursuant to the California Environmental Quality Act (CEQA), it must provide substantial evidence showing that sufficient water will be available to meet water demands for the water purveyor’s existing and planned uses, over a 20-year planning horizon.

The initial question in conducting an SB 610 WSA is whether there is a “project” that is subject to the SB 610 WSA process. According to the SB 610 WSA requirements, a “project” is defined as any of the following:

- Residential developments of more than 500 dwelling units;
- Shopping centers or business establishments employing more than 1,000 persons or having more than 500,000 square feet of floor space;
- Commercial office buildings employing more than 1,000 persons or having more than 250,000 square feet of floor space;
- Hotels, motels, or both, having more than 500 rooms;
- Industrial, manufacturing, or processing plants, or industrial parks planned to house more than 1,000 persons, occupying more than 40 acres of land, or having more than 650,000 square feet of floor area;

- Mixed-use projects that include one or more of the projects specified in Water Code Section 10912(a); or
- Projects that would demand an amount of water equivalent to or greater than the amount of water required by a 500-dwelling-unit project.

If a public water system has fewer than 5,000 service connections, then “project” means any proposed residential, business, commercial, hotel or motel, or industrial development that would account for an increase of 10% or more in the number of the public water system’s existing service connections, or a mixed-use project that would demand an amount of water equivalent to, or greater than, the amount of water required by residential development that would represent an increase of 10% or more in the number of the public water system’s existing service connections.

Senate Bill 7

SB X7-7 was enacted in 2009, authorizing the DWR to prepare a plan implementing urban water conservation requirements. SB X7-7, otherwise referred to as the 20×2020 Water Conservation Plan, requires urban water suppliers to adopt a water conservation target of 20% reduction in urban per capita water use by the year 2020, compared to a 2005 baseline. SB X7-7 also requires agricultural water providers to prepare water management plans, measure water deliveries, and implement water efficiency measures.

Senate Bill 1374

SB 1374 requires that the annual report submitted to CalRecycle (formerly known as the California Integrated Waste Management Board [CIWMB]) include a summary of the progress made in the diversion of construction and demolition waste materials. In addition, SB 1374 requires CalRecycle to adopt a model ordinance suitable for adoption by any local agency to require 50 to 75 percent diversion of construction and demolition waste materials from landfills by March 1, 2004. Local jurisdictions are not required to adopt their own construction and demolition ordinances, nor are they required to adopt CalRecycle’s model by default. However, adoption of such an ordinance may be considered by CalRecycle when determining whether to impose a fine on a jurisdiction that has failed to implement its Source Reduction and Recycling Element (SRRE).

Assembly Bill 939 – Solid Waste Reduction

The California Integrated Waste Management (CIWM) Act of 1989 (Assembly Bill [AB] 939) was enacted as a result of a national crisis in landfill capacity, as well as a broad acceptance of the hierarchy (i.e., reduce, reuse, recycle, environmentally sound landfilling, and transformation) as the desired approach to solid waste management. AB 939 mandated local jurisdictions to meet waste diversion goals of 25% by 1995 and 50% by 2000, and established an integrated framework for program implementation, solid waste planning, and solid waste facility and landfill compliance.

Other elements included encouraging resource conservation and considering the effects of waste management operations. The diversion goals and program requirements are implemented through a disposal-based reporting system by local jurisdictions under CIWMB regulatory oversight. Since the adoption of AB 939, landfill capacity has increased. Regional capacity problems exist, but capacity is no longer considered the statewide crisis it once was. AB 939 has achieved substantial progress in waste diversion, program implementation, solid waste planning, and protection of public health and safety and the environment from the operation of landfills and solid waste facilities (CalRecycle 1999). The City offers recycling programs for both commercial and residential uses.

Assembly Bill 75

AB 75, passed in 1999, and the State Agency Model Integrated Waste Management Act (Chapter 764, Statutes of 1999, Strom-Martin) took effect on January 1, 2000. This bill added new provisions to the Public Resources Code, mandating that State agencies develop and implement an Integrated Waste Management Plan that outlines the steps to be taken to achieve the required waste diversion goals.

Current statutes require all State agencies and large facilities to divert at least 50% of their solid waste from disposal facilities on and after January 1, 2004. The law requires that each State agency and large facility submit an annual report to CalRecycle summarizing its yearly progress in implementing waste diversion programs. The law also mandates that community service districts providing solid waste services report disposal and diversion information to the city, county, or regional agency in whose jurisdiction those entities are located. In addition to the waste diversion goals, all State agencies are required to buy recycled materials from 12 different categories, ranging from paper and plastic to paint, solvents, and lubricating oils.

Senate Bill 1016

The Per Capita Disposal Measurement System Act (SB 1016) changed the way State agencies and local governments measure their progress toward meeting the statutory waste diversion mandates. State agencies and large State facilities now use per capita disposal as an indicator of their compliance with the 50% waste diversion requirement. Compliance is also determined by diversion program implementation.

Assembly Bill 341

AB 341, enacted in 2011, changed the due date of the State agency waste management annual report to May 1, beginning in 2012. The bill makes a legislative declaration that is the policy goal of the State that not less than 75% of solid waste generated be source reduced, recycled, or composted by 2020.

Local

Long Beach Water Department, Urban Water Management Plan

In accordance with the Urban Water Management Planning Act, the LBWD has prepared a 2015 UWMP, which projects that the LBWD's water supply will increase by 7% from 2015 to 2040 to meet projected water demands.

2005 Stormwater Master Plan

In 2005, the City's Stormwater Master Plan (September 2005) was updated to evaluate the hydraulic capacity of the major storm drain systems within the City boundary. The study has been conducted to provide City officials with a planning tool for future drainage improvements. The analysis includes policies have been built into the updated Stormwater Management System as follows:

- The conveyance capacity of the existing conduit plus the conveyance capacity of the roadway up to the right-of-way line is compared to the runoff from a 25-year storm.
- If the conveyance system is found deficient, then a replacement conduit is sized to convey the full 10-year runoff in a concrete pipe (or box) parallel to and at the same grade as the existing conduit.

The plan includes a list of individual facilities that do not meet the 10-year conveyance requirements. The only substandard City facility in the vicinity of the Plan Area is within the 37th Street right-of-way, as noted on Figure 5-2, Substandard Facilities, in the Stormwater Master Plan. When a conveyance facility had less than a 10-year capacity a replacement facility was sized. The replacement facilities were sized for the full 10-year design flow at the same grade as the existing facility. They provide an indication of the size necessary to replace the existing facility.

Individual deficiencies are grouped into improvement projects. The groupings ensure that overall improvements in a specific area can convey the full 10-year runoff. Prior to proceeding with any of the identified projects, it is recommended that a detailed drainage report be prepared that addresses potential alternatives to upgrade the system. The nearest projects to the Plan Area are as follows:

- Project ID 00004: Bixby Road Storm Drain

Project ID 00007: Stearns Street Storm Drain

Municipal NPDES Permit

The City of Long Beach is subject to the Waste Discharge Requirements for Municipal Separate Storm Sewer System Discharges from the City of Long Beach (Permit No. R4-2014-0024, National Pollutant Discharge Elimination System [NPDES] No. CAS004003) (MS4 Permit),

which was approved February 6, 2014, and became effective on March 28, 2014. This MS4 Permit supersedes Order No. 99-060, issued in 1999. To implement the requirements of the 1999 MS4 Permit, the City developed the Long Beach Storm Water Management Program, a comprehensive program of practices and activities aimed at reducing or eliminating storm water pollutants from new development, to the maximum extent practicable. This program includes customized strategies, control measures, and Best Management Practices (BMPs), consistent with the Los Angeles Regional Water Quality Control Board (RWQCB) Watershed Management Areas.

The City has the option of collaborating with other MS4 permittees on the development of an Enhanced Watershed Management Program, which evaluates the multi-benefits of regional projects and implements regional control measures and BMPs. The Watershed Management Program includes an evaluation of existing water quality conditions, identifying water quality priorities within each Watershed Management Area, selecting watershed control measures, and incorporating compliance schedules. Since 2015, the following watershed management programs have been approved and are currently being implemented: Long Beach Nearshore, Los Cerritos Channel Watershed, Lower Los Angeles River Watershed, and Lower San Gabriel River (City of Long Beach 2016).

Currently, the MS4 permit requires that the project designer and/or contractor of all new development and redevelopment projects that fall under specific “priority” project categories must develop a Standard Urban Stormwater Mitigation Plan (SUSMP). Certain categories of development are considered “priority” because the Los Angeles RWQCB determined that these categories have the greatest potential to degrade water quality. The three categories of “priority” projects include: 1) 10 or more home subdivisions; 2) 100,000 square feet or larger commercial developments; and 3) projects located adjacent to or directly discharging to environmentally sensitive areas. Future development projects occurring under the Proposed Project would be designed in accordance with a MS4 priority project-mandated SUSMP.

Sanitation Districts of Los Angeles County Ordinances

The Sanitation Districts of Los Angeles County adopted a Wastewater Ordinance effective April 1, 1972, as amended on July 1, 1980, July 1, 1983, November 1, 1989, and July 1, 1998, to protect and finance the operation of the Sanitation Districts' wastewater conveyance, treatment, and disposal facilities. Individual sanitation districts also adopted Connection Fee Ordinances in 1981 (which were amended in 1984, 1990, 1992, and 1997). Companies that discharge industrial wastewater to the sewerage system are governed by both the Wastewater Ordinance and the Connection Fee Ordinance for the district in which the discharge is located. These legal mechanisms establish the Sanitation Districts' Industrial Wastewater Discharge Permit, Connection Fee, and Surcharge Programs. The Industrial Wastewater Discharge Permit Program allows for the regulation of industrial wastewater dischargers to protect the public health,

environment, and the public sewerage system. The Surcharge Program requires all industrial companies discharging to the Sanitation Districts' sewerage system to pay their fair share of the wastewater treatment and disposal costs. The Connection Fee Program requires all new users of the Sanitation Districts' sewerage system, as well as existing users that significantly increase the quantity or strength of their wastewater discharge, to pay their fair share of the costs for providing additional conveyance, treatment, and disposal facilities.

City of Long Beach General Plan

Conservation Element (1973)

Public utilities goals are included in the Conservation Element (adopted in 1973) of the City's General Plan. The following goals are applicable to the Proposed Project:

Water Resource Management Goal 1: To assure adequate quantity and quality of water to meet the present and future domestic, agricultural, and industrial needs of the City.

Water Resources Management Goal 5: To maintain, upgrade, and improve water systems and facilities serving Long Beach.

Mobility Element (2013)

The Mobility Element seeks to guide development and improvements to the existing circulation system. Together with the existing circulation system, the Mobility Element considers the mobility of critical resources (e.g., water, energy, and communications). The following goals and policies related to utilities and services systems in the City's Mobility Element are applicable to the Proposed Project.

Strategy No. 19: Promote well-maintained water, wastewater, and stormwater infrastructure systems that serve the demands of existing and future residents and businesses while mitigating environmental impacts.

- **MOR Policy 19-1:** Plan for and provide appropriate levels and types of infrastructure based on the desired character of each neighborhood or district.
- **MOR Policy 19-2:** Ensure that development is appropriate and in scale with current and planned infrastructure capabilities.
- **MOR Policy 19-3:** Promote water-efficient fixtures and appliances to reduce water demand.
- **MOR Policy 19-4:** Expand the use of water recycling and graywater systems to treat and recycle wastewater and to further reduce water demand related to irrigation of landscaped areas.

Land Use Element (2019)

The following proposed strategies and policies in the 2019 Land Use Element are applicable to the analysis of utilities and would:

- **LU Policy 1-3:** Require sustainable design strategies to be integrated into public and private development projects.
- **LU Policy 1-6:** Require that new building construction incorporate solar panels, vegetated surface, high albedo surface and/or similar roof structures to reduce net energy usage and reduce the heat island effect.
- **LU Policy 2-1:** Promote the establishment of local green energy generation projects along with the infrastructure to support such projects.
- **LU Policy 3-1:** Implement land use regulations and economic development strategies that will help diversify the local economy and expand job growth. Accommodate a mix of industries in Long Beach, including high technology, telecommunications, aerospace, green technology, renewable energy, healthcare, higher education, manufacturing, port and shipping, professional services, restaurants, entertainment and the film industry.

Strategy No. 17: Improve public infrastructure to serve new development, established neighborhoods, commercial centers, and industry and regional-serving facilities.

- **LU Policy 17-1:** Coordinate land use development and infrastructure investment.
- **LU Policy 17-2:** Maintain adequate and sustainable infrastructure systems to protect the health and safety of all City residents, businesses, institutions, and regional-serving facilities.
- **LU Policy 20-9:** Recycle or beneficially reuse a majority and growing proportion of the City's wastewater supply.
- **LU Policy 20-10:** Seek to supply a majority and growing proportion of the City's water for both domestic and non-potable demand through use of reclaimed and recharged groundwater sources by 2030.
- **LU Policy 20-11:** Coordinate with other agencies to reduce stormwater runoff by capturing runoff for groundwater recharge, irrigation, and recycling purposes.

Urban Design Element (2019)

Strategy No. 1: Improve function and connectivity within neighborhoods and districts.

- **UD Policy 1-2:** Focus development and supporting infrastructure improvements within targeted Areas of Change identified within the Land Use Element.

Strategy No. 5: Integrate healthy living and sustainable design practices and opportunities throughout Long Beach.

- **Policy UD 5-5:** Accommodate space for the use of rooftop solar panels and other forms of renewable energy on buildings, underutilized sites, utility plants, and parking facilities through a simplified permitting process, wherever feasible.

Strategy No. 6: Improve public infrastructure to serve new development, established neighborhoods, commercial centers, and industry and regional-serving facilities within areas of change and future growth areas.

- **UD Policy 6-1:** Prioritize improvements to remedying infrastructure, public facilities, and service deficiencies to underserved neighborhoods and business hubs.
- **UD Policy 6-3:** Maintain adequate and sustainable infrastructure systems to protect and enhance the health and safety of all City residents, businesses, institutions, and regional-serving facilities.
- **UD Policy 6-4:** Promote sustainability through the use of new technologies and green infrastructure systems and equipment. Prioritize areas to retrofit with green infrastructure, Low Impact Development, and Stormwater BMPs.
- **UD Policy 31-7:** Ensure that landscaping for new projects complies with Title 23, Chapter 2.7 of the California Code of Regulations, Model for Water Efficient Landscape Ordinance.
- **UD Policy 31-8:** Incorporate water conservation methods, such as regular adjustment of irrigation controllers, irrigation scheduling based on plant water needs, preventing overspray, water-efficient landscape designs using low water-use plants, efficient irrigation systems, minimizing turf areas, soil improvement and mulch, watering during early or late hours, and water budgeting using Water Use Classification of Landscape Species (WUCOLS) to reduce the amount of water used in a landscape.

Strategy No. 39: Beautify the City with trees and landscaping while being conscious of water resources and utilizing sustainable practices.

- **UD Policy 39-4:** Ensure that landscaping for new projects complies with Title 23, Chapter 2.7 of the California Code of Regulations, Model for Efficient Landscape Ordinance.

- **UD Policy 39-5:** Integrate native, drought-tolerant, or low-water-use plant species in streetscapes and design for ease of maintenance to assure their longevity and limit water and resource use.
- **UD Policy 39-7:** Consider providing bioswales, pervious strips, flow-through planters, and pervious pavement to help infiltrate stormwater runoff before it enters the sewer system.

Land Use Element (1989)

The City’s General Plan Land Use Element (1989) was updated in 2019. At time the Notice of Preparation (NOP) for this PEIR/PEIS was published and circulated for review (September 12, 2018), the 1989 General Plan Land Use Element was in effect. Subsequent to the NOP, the 2019 General Plan Land Use Element was approved by City Council on December 3, 2019. The following is the specified objectives from the 1989 Land Use Element that are related to water.

Objective: Long Beach will continue to take actions that are necessary to preserve and adequate supply of water for domestic, commercial, and industrial purposes.

Sustainable City Action Plan

The City adopted the Sustainable City Action Plan on February 2, 2010, with the purpose of moving the City towards becoming a more sustainable City. Sustainability is defined in this plan as maximizing individual benefits and minimizing negative environmental impacts, to ensure the long-term health of the environment, for the enjoyment and use of current and future generations. The Sustainable City Action Plan includes initiatives, goals, and actions that are meant to guide City decision-makers in striving towards achieving a sustainable City. The following goals, initiatives, and actions are applicable to the Proposed Project:

Waste Reduction Goal 1: Annual reduction in average pounds of solid waste generated per person per day.

Waste Reduction Initiative 1: Increase diversion by reducing waste and increasing recycling and reuse.

Water Goal 1: Reduce per capita use of potable water, exceeding the State mandate to achieve a demand reduction of 20% in per capita water use by the year 2020.

Water Initiative 1: Ensure a sustainable water supply through conservation and reduced dependence on its imported water.

Water Initiative 2: Implement low impact development strategies to reduce runoff and pollution at the source and increase the beneficial use of rainwater.

City of Long Beach Municipal Code

Chapter 18.76, Water Submeters, of the Long Beach Municipal Code, establishes the City’s intent to conserve water and to ensure sufficient water resources are available to current and future City residents. Specifically, this chapter of the Long Beach Municipal Code encourages water conservation in multi-family residential and mixed-use building, by requiring the installation of water submeters at individual units to assist building owners in allocating water costs per unit, thereby incentivizing residents to conserve water.

Section 18.67.070 (Compliance with Waste Management Program) requires any demolition project of “any valuation” to submit documentation that the project has met diversion requirements. Specifically, the City requires 60% of the waste tonnage of construction or demolition debris to be recycled, reused, or diverted from landfills or disposal sites.

3.13.3 Thresholds of Significance

The following significance criteria are based on Appendix G of the California Environmental Quality Act (CEQA) Guidelines (14 CCR 15000 et seq.), and will be used to determine the significance of potential utilities and service systems impacts. Since the release of the IS (September 2018), updates to the CEQA Guidelines have gone into effect. One of the revisions involves slight changes to the threshold questions related to utilities and service systems. As such, the threshold questions listed here do not match the IS and includes analysis related to electric power, natural gas, and telecommunications facilities. Impacts related to utilities and service systems would be significant if the Proposed Project would:

- A. Require or result in the relocation or construction of new or expanded water, wastewater treatment, or storm water drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects.
- B. Not have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry, and multiple dry years.
- C. Result in a determination by the wastewater treatment provider which serves or may serve the project that it does not have adequate capacity to serve the project’s projected demand in addition to the provider’s existing commitments.
- D. Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals.
- E. Comply with federal, state, and local management and reduction statutes and regulations related to solid waste.

The IS (Appendix A-1) found that the Proposed Project would have less than significant impacts as it relates to compliance with solid waste disposal-related statutes and regulations, because future developments would be required to comply with existing and future statutes and regulations mandated by the City, State, or federal law. Therefore, impacts related to compliance with federal, State, and local statutes and regulations related to solid waste are not further discussed in this Draft PEIR/PEIS.

3.13.4 Impacts Analysis

- a) *Would the project require or result in the relocation or construction of new or expanded water, wastewater treatment, or storm water drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?*

Water Facilities

The Proposed Project does not include any physical improvements but would facilitate future development that would have the potential to create a need for new or expanded water facilities within the City.

Construction activities associated with future projects facilitated by approval of the GCSP would not increase the demand for water mains or conveyance facilities.

Future development facilitated by the Proposed Project could result in the need for new or relocated water mains or conveyance facilities. The Proposed Project would connect to municipal water services, which are operated and maintained by the LBWD. Future water lines intended to service the Plan Area would likely connect into the larger 20- to 36-inch transmission water mains located along Cherry Avenue, Wardlow Road, Saint Louis Avenue, and 32nd Street. Installation of new water mains and laterals consists of either trenching to the depth of pipe placement or using a variety of different trenchless technology, which causes substantially less ground disturbance. Trenching results in a temporary stockpiling of soil along the length of the trench, pending backfilling, which could result in potential short-term erosion induced siltation of nearby waterways. Trenchless technology only requires temporary stockpiling of soil adjacent to excavations on both ends of long sections of pipe.

New development would require connections to existing water mains within the Plan Area. While no physical improvements or development are proposed at this time, the GCSP would facilitate development that could exceed water main capacity in the future. As such, water main segments in the plan area may require replacement, depending on the configuration of land uses at buildout of the Plan Area. Replacement of the aforementioned water mains, if required, would occur within existing roadways in soil already disturbed by construction of the roadways and existing utilities.

Mitigation measure **MM-UTIL-1** requires future development and/or redevelopment projects under the GCSP to have a site-specific and project-specific utilities report at the time of project entitlements. This mitigation measure would also require obtaining “will serve” letters from all applicable utility providers, which includes the Long Beach Water Department for potable water services.

Under implementation of the GCSP, it is also anticipated that the majority of existing on-site water lines within private parcels would be removed and replaced with new water lines based on the proposed building configuration and type of development proposed for each parcel. The new water lines would be implemented as needed to better serve the individual development projects that would be accommodated by the GCSP. Additionally, it is anticipated that routine maintenance and replacement of older water lines within the City’s right-of-way will continue throughout the Plan Area consistent with the Capital Improvement Program established by the Long Beach Water Department; all activities associated with routine maintenance and replacement of older water lines would be initiated and undertaken by the City, as needed.

Furthermore, future water infrastructure improvements may be subject to further environmental review depending on the extent and nature of those improvements. With incorporation of mitigation measure **MM-UTIL-1**, which requires project-specific evaluation of existing water distribution systems, impacts would be less than significant.

CEQA Impact Determination

Potential impacts to existing water distribution systems would be potentially significant if the expansion of existing infrastructure would result in additional significant impacts. Mitigation measure **MM-UTIL-1** would require project-specific analyses to determine if future projects can be served by the existing infrastructure. If required improvements are identified by the Long Beach Water Department to serve the site, the project applicant shall fund such improvements. No further mitigation is required. As such, impacts to water facilities is considered **less than significant with mitigation incorporated** under CEQA. (see Section 3.6, Hydrology and Water Quality, of this Draft PEIR/PEIS).

NEPA Impact Determination

Potential impacts to existing water distribution systems would be potentially significant if the expansion of existing infrastructure would result in additional significant impacts. Mitigation measure **MM-UTIL-1** would require project-specific analyses to determine if future projects can be served by the existing infrastructure. If required improvements are identified by the Long Beach Water Department to serve the site, the project applicant shall fund such improvements. No further mitigation is required. As such, there would be **no adverse effects** to water facilities under NEPA.

Wastewater Treatment Facilities

As discussed under threshold d, below, there is sufficient wastewater treatment capacity within the LACSD facilities to accommodate the increase in wastewater demand City-wide, and no major improvements are required. The increase in wastewater flows associated with the Proposed Project would not exceed the treatment requirements of the Los Angeles RWQCB, for the Joint Water Pollution Control Plant and Long Beach Water Reclamation Plan.

Wastewater Infrastructure (Sanitary Sewer)

The Proposed Project does not include any physical improvements but would facilitate future development that would have the potential to create a need for new or expanded wastewater infrastructure, such as sanitary sewers, within the City.

Future development facilitated by the Proposed Project could result in the need for new or relocated wastewater infrastructure facilities. The wastewater infrastructure for the immediate Plan Area primarily consists of vitrified clay pipe. The LACSD owns, operates, and maintains the large trunk sewers that form the backbone of the regional wastewater conveyance system. Local collector and/or lateral sewer lines in the City of Long Beach are the responsibility of the City. No deficiencies exist in LACSD facilities that serve the City (LACSD 2018a). The LACSD would review individual developments within the Plan Area in order to determine whether or not sufficient trunk sewer capacity exists to serve each project and whether LACSD facilities would be affected by each project. The LACSD is empowered by the California Health and Safety Code to charge a fee for connection (directly or indirectly) to the District's sewerage system. Although the Plan Area is currently receiving sewerage service, any entity increasing the quantity of wastewater discharged due to development projects on parcels already connected to the sewerage system would be required to pay a connection fee. In determining the impact to the sewerage system and applicable connection fees, the LACSD Chief Engineer would determine the user category that best represents the actual or anticipated use of the parcel or facilities on the parcel (LACSD 2018a), as is completed in Table 3.13-4, Wastewater Demand – Current and Projected (below).

The addition of new commercial and industrial uses in association with the Proposed Project, including 1) a business park to be located immediately west, southwest, and south of the existing airport runways/taxiways; 2) a community commercial district to be located along the east side of Cherry Avenue; 3) an industrial commercial district also to be located along the east side of Cherry Avenue; and 4) a general industrial area to be located primarily in the southern Plan Area, adjacent to the I-405 freeway, could require increases in the size and change in the location of new sewer mains, pumps, and laterals. Main collection lines would be upgraded to accommodate the increased flow volume. Upgrades to street infrastructure may

also require reconfiguration of wastewater infrastructure. Impacts would generally be confined to street disruptions, as well as potential short-term erosion-related impacts, as described for the installation of new water service lines. It is unlikely that wastewater service would be disrupted for existing customers during installation of new infrastructure.

Mitigation measure **MM-UTIL-1** requires future development and/or redevelopment projects under the GCSP to have a site-specific and project-specific utilities report at the time of project entitlements. This mitigation measure would also require obtaining “will serve” letters from all applicable utility providers, which includes the LACSD and LBWD for wastewater conveyance facilities and sanitary sewers in the plan area.

Furthermore, future wastewater infrastructure improvements may be subject to further environmental review depending on the extent and nature of those improvements. With incorporation of mitigation measure **MM-UTIL-1**, which requires project-specific evaluation of existing wastewater distribution systems, impacts would be less than significant.

CEQA Impact Determination

Potential impacts to existing wastewater distribution systems would be potentially significant if the expansion of existing infrastructure would result in additional significant impacts. Mitigation measure **MM-UTIL-1** would require project-specific analyses to determine if future projects can be served by the existing infrastructure. If required improvements are identified by the LACSD or Long Beach Water Department to serve the site, the project applicant shall fund such improvements. No further mitigation is required. As such, impacts to wastewater treatment facilities is considered **less than significant with mitigation incorporated** under CEQA.

NEPA Impact Determination

Potential impacts to existing wastewater distribution systems would be potentially significant if the expansion of existing infrastructure would result in additional significant impacts. Mitigation measure **MM-UTIL-1** would require project-specific analyses to determine if future projects can be served by the existing infrastructure. If required improvements are identified by the LACSD or Long Beach Water Department to serve the site, the project applicant shall fund such improvements. No further mitigation is required. As such, there would be **no adverse effects** to wastewater treatment facilities under NEPA.

Stormwater Drainage

The Proposed Project does not include any physical improvements but would facilitate future development that would have the potential to create a need for new or expanded stormwater drainage facilities within the City.

Construction activities associated with future projects facilitated by approval of the GCSP would be required to comply with all regulatory requirements related to off-site drainage. The Construction General Permit requires the development and implementation of a stormwater pollution prevention plan (SWPPP), which would include and specify water quality BMPs designed to prevent pollutants from contacting stormwater and keep all products of erosion from moving off site into receiving waters. Mitigation measure **MM-HYD-1a** would require compliance with this requirement during construction (refer to Section 3.6, Hydrology and Water Quality, of this PEIR/PEIS). In addition, mitigation measure **MM-HYD-3a** requires the preparation of a hydrology/drainage report to demonstrate that stormwater runoff flow volume and flow rate, associated with specific projects, would be less than or equal to existing conditions to prevent on- and off-site flooding. Project design features shall be identified that would contribute in reducing stormwater runoff.

Future development facilitated by the Proposed Project could result in the need for new or relocated stormwater facilities. With regulatory compliance, the amount of impervious surface and resultant runoff amount as a result of future projects under the GCSP would be reduced in comparison to current conditions, resulting in beneficial impacts related to drainage (Refer to Section 3.6, Hydrology and Water Quality, in this PEIR/PEIS). Regardless, the Proposed Project could require construction of new stormwater mains and drainage to support the Plan Area. Environmental impacts would generally be related to potential short-term erosion-related impacts, as described for the installation of new water service lines.

Mitigation measure **MM-UTIL-1** requires future development and/or redevelopment projects under the GCSP to have a site-specific and project-specific utilities report at the time of project entitlements. This mitigation measure would also require obtaining “will serve” letters from all applicable utility providers, which includes the LACFCD and Long Beach Public Works Department for stormwater drainage facilities.

Furthermore, future stormwater distribution infrastructure improvements may be subject to further environmental review depending on the extent and nature of those improvements. With incorporation of mitigation measure **MM-UTIL-1**, which requires project-specific evaluation of existing stormwater distribution systems, impacts would be less than significant.

CEQA Impact Determination

Potential impacts to existing stormwater drainage facilities would be potentially significant if the expansion of existing infrastructure would result in additional significant impacts. Mitigation measure **MM-UTIL-1** would require project-specific analyses to determine if future projects can be served by the existing infrastructure. If required improvements are identified by the LACFCD and Long Beach Public Works Department to serve the site, the project applicant shall fund such improvements. Mitigation measure **MM-HYD-1a** would ensure that future projects are in compliance with regulatory requirements, which includes site BMPs to reduce runoff. In addition, mitigation measure **MM-HYD-3a** requires the preparation of a hydrology/drainage report to demonstrate that stormwater runoff flow volume and flow rate, associated with specific projects, would be less than or equal to existing conditions to prevent on- and off-site flooding. Potential erosion-related water quality impacts would be potentially significant but mitigable with the implementation of mitigation measures discussed in Section 3.6, Hydrology and Water Quality, of this PEIR/PEIS. No further mitigation is required. As such, impacts to stormwater drainage is considered **less than significant with mitigation incorporated** under CEQA.

NEPA Impact Determination

Potential impacts to existing stormwater drainage facilities would be potentially significant if the expansion of existing infrastructure would result in additional significant impacts. Mitigation measure **MM-UTIL-1** would require project-specific analyses to determine if future projects can be served by the existing infrastructure. If required improvements are identified by the LACFCD and Long Beach Public Works Department to serve the site, the project applicant shall fund such improvements. Mitigation measure **MM-HYD-1a** would ensure that future projects are in compliance with regulatory requirements, which includes site BMPs to reduce runoff. Potential erosion-related water quality impacts would be potentially significant but mitigable with the implementation of mitigation measures discussed in Section 3.6, Hydrology and Water Quality, of this PEIR/PEIS. No further mitigation is required. As such, there would be **no adverse effects** to stormwater drainage under NEPA.

Electric Power, Natural Gas, and Telecommunication

Upgrades would be required associated with new construction, with respect to electric power, natural gas, and telecommunication facilities. Point of connection to the Proposed Project would be submitted to SCE, LBER, Spectrum Communications, Frontier Communications, and AT&T U-verse prior to construction of the proposed development. Upgrades would be confined to the lateral connections to the Plan Area and not any centralized facilities. Upgrades would likely be completed by either trenchless technology

or completion of open trenching, to the depth of the underground utilities. The construction of the laterals would be temporary and would be subject to all applicable regulatory requirements. Environmental impacts would generally be related to potential short-term erosion-related impacts, as described for the installation of new water service lines.

Electric Power

The Proposed Project does not include any physical improvements but would facilitate future development that would have the potential to create a need for new or expanded electrical power infrastructure within the City.

Buildout under the GCSP would create a net increase in electricity demand of compared to existing conditions. Mitigation measure **MM-UTIL-1** requires future development and/or redevelopment projects under the GCSP to have a site-specific and project-specific utilities report at the time of project entitlements. This mitigation measure would also require obtaining “will serve” letters from all applicable utility providers, which includes Southern California Edison for electrical substation capacity and transmission facilities.

In addition, plans submitted for entitlements and/or building permits of development projects that would be accommodated by the GCSP would be required to include verification demonstrating compliance with the current Building and Energy Efficiency Standards and are also required to be reviewed. Development projects that would be accommodated by the GCSP would also be required adhere to the provisions of CALGreen, which established planning and design standards for sustainable site development, energy efficiency (in excess of the California Energy Code requirements), water conservation, material conservation, and internal air contaminants.

In addition, all discretionary entitlements, including Site Plan Review, require compliance with Section 21.45.400 of the LBMC that establishes green building standards for private and public development found. This section establishes a threshold for LEED compliance based on project type. Compliance with this section also requires incorporating sustainable surface parking lot design to reduce the heat island effect and designing buildings with solar ready roofs.

Furthermore, future electrical infrastructure improvements may be subject to further environmental review depending on the extent and nature of those improvements. With incorporation of mitigation measure **MM-UTIL-1**, which requires project-specific evaluation of existing electrical power facilities, and required green building standards and efficiencies, impacts would be less than significant.

Natural Gas

The Proposed Project does not include any physical improvements but would facilitate future development that would have the potential to create a need for new or expanded natural gas infrastructure, such as sanitary sewers, within the City.

As shown in Table 3.15-4 (see Section 3.15, Energy, of this Draft PEIR/PEIS), the Proposed Project would consume approximately 137,749,891 thousand British thermal units (kBtu) per year. Existing land uses are estimated to consume approximately 28,994,764 kBtu per year. The net change in estimated natural gas consumption between the Proposed Project and Existing is estimated to be 108,755,127 kBtu per year. For disclosure, in comparison, in 2017, SoCalGas delivered approximately 2,957 million therms (295.7 billion kBtu) to Los Angeles County (CEC 2017d). The Proposed Project is subject to statewide mandatory energy requirements as outlined in Title 24, Part 6, of the California Code of Regulations. Title 24, Part 11, contains additional energy measures that are applicable to Proposed Project under CALGreen. Prior to Proposed Project approval, the applicant would ensure that the Proposed Project would meet Title 24 requirements applicable at that time, as required by state regulations through their plan review process. Therefore, due to the inherent increase in efficiency of building code regulations, the Proposed Project, would not require the City to obtain new or expanded natural gas supplies.

Mitigation measure **MM-UTIL-1** requires future development and/or redevelopment projects under the GCSP to have a site-specific and project-specific utilities report at the time of project entitlements. This mitigation measure would also require obtaining “will serve” letters from all applicable utility providers, which includes the LBER for gas demand and distribution facilities in the plan area.

Furthermore, future natural gas infrastructure improvements may be subject to further environmental review depending on the extent and nature of those improvements. With incorporation of mitigation measure **MM-UTIL-1**, which requires project-specific evaluation of existing natural gas facilities, impacts would be less than significant.

Telecommunications

The Proposed Project does not include any physical improvements but would facilitate future development that would have the potential to create a need for new or expanded telecommunications facilities within the City.

Construction activities associated with future projects facilitated by approval of the GCSP would not increase the demand for telecommunications facilities.

Future development facilitated by the Proposed Project could result in the need for new or relocated telecommunications facilities. Similar to existing market conditions, telecommunication utility providers would extend existing services to meet the increased demand for telephone, internet, and cable services as future developments are proposed. Where necessary, infrastructure improvements would be made to existing telecommunications facilities in order to meet customer demands and achieve compliance with the City’s goal of investing in telecommunications infrastructure systems. Most telecommunications facilities in the City are currently located within existing right-of-way areas and/or are located underground. As such, environmental impacts associated with future improvements to telecommunications facilities are anticipated to be minimal, as these facility areas would have previously been disturbed through association with past infrastructure improvements.

Mitigation measure **MM-UTIL-1** requires future development and/or redevelopment projects under the GCSP to have a site-specific and project-specific utilities report at the time of project entitlements. This mitigation measure would also require obtaining “will serve” letters from all applicable utility providers, which includes telecommunication providers in the plan area.

Furthermore, future telecommunications infrastructure improvements may be subject to further environmental review depending on the extent and nature of those improvements. With incorporation of mitigation measure **MM-UTIL-1**, which requires project-specific evaluation of existing telecommunication facilities, impacts would be less than significant.

CEQA Impact Determination

Potential impacts to existing electric, natural gas, and telecommunication utilities would be potentially significant if the expansion of existing infrastructure would result in additional significant impacts. Mitigation measure **MM-UTIL-1** would require project-specific analyses to determine if future projects can be served by the existing infrastructure. If required improvements are identified by the respective utility provider to serve the site, the project applicant shall fund such improvements. No further mitigation is required. As such, impacts to electric power, natural gas, and telecommunications is considered **less than significant with mitigation incorporated** under CEQA.

NEPA Impact Determination

Potential impacts to existing electric, natural gas, and telecommunication utilities would be potentially significant if the expansion of existing infrastructure would result in additional significant impacts. Mitigation measure **MM-UTIL-1** would require project-specific analyses to determine if future projects can be served by the existing infrastructure. If required improvements are identified by the respective utility provider to serve the site, the project applicant shall fund

such improvements. No further mitigation is required. As such, there would be **no adverse effects** to electric power, natural gas, and telecommunications under NEPA.

b) *Would the project have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry, and multiple dry years?*

An increase in long-term demand for water is anticipated to occur during operation of future development occurring under the Proposed Project. As required for all new development in California, the Proposed Project would comply with California State law regarding water conservation measures, including pertinent provisions of Title 24 of the California Government Code (Title 24), regarding the use of water-efficient fixtures.

Based on information provided in the 2015 UWMP, LBWD’s water supply will increase by 7% from 2015 to 2040 to meet projected water demands (see Table 3.13-3, Current and Projected Water Demand by Sector). The LBWD has adequate supplies to meet projected demands for a single dry-year supply and demand scenario, as well as a multiple dry-year supply and demand scenario, throughout the 20-year planning period (through 2040). LBWD water supplies would consist of 36% groundwater, 12% imported water from MWD, 10% desalinated seawater, and 27% through conservation methods (LBWD 2016).

**Table 3.13-3
Current and Projected Water Demand by Sector (in acre-feet)**

Land Use Type	2015 Usage	2040 Buildout
Single Family Residential	17,778	20,363
Duplex	3,114	3,421
Multi-Family Residential	15,517	20,562
Irrigation	2,187	2,208
Commercial	14,359	16,374
Industrial	219	122
Fire Lines	4	3
Losses	2,028	2,882
Conservation	0	(6,830)
Total	55,206	59,105

Source: Long Beach Water Department 2016

Note: af = acre-feet per year

As summarized in Table 3.13-3, the 2015 UWMP projects future water demands separately for each land use sector. These projections account for distribution system losses and water conservation measures. The water demand projections in the 2015 UWMP account for the Southern California Association of Governments’ (SCAG’s) 2012 Regional Transportation Plan population, housing, and employment growth projections, which are slightly higher

than the most current socioeconomic projections included in SCAG’s Draft 2016 Regional Transportation Plan. The 2015 UWMP includes the higher 2012 projections to err on the side of overestimating growth, and thereby err on the side of overestimating water demand and the need to develop additional water supplies or pursue additional water conservation methods. Because the Proposed Project accommodates growth consistent with SCAG’s growth projections (refer to Section 3.7, Land Use and Planning, of this PEIR/PEIS), Proposed Project-related growth and its associated water demand has been accounted for in the 2040 scenario identified in the 2015 UWMP.

UWMPs are essential documents by which cities and counties determine their water supplies, consistent with general plan updates. The accuracy and usefulness of UWMPs allow for cities and counties to determine the water demand for a proposed development by determining whether or not the project was included as part of the projected water demand of the current UWMP, which accounts for growth projections outlined in a city or county General Plan. Consequently, the water demand does not need to be separately evaluated, provided the project is consistent with the UWMP and General Plan. Because the Proposed Project has been determined to be consistent with water demands in the 2015 UWMP and because LBWD has identified a surplus water supply to serve the projected demands through 2040, the Proposed Project-related demand for water would be consistent with the City’s UWMP.

CEQA Impact Determination

The Proposed Project would have sufficient water supplies available to serve buildout of the Plan Area and reasonably foreseeable future development during normal, dry, and multiple dry years. Impacts related to water demand would be **less than significant** and no mitigation is required.

NEPA Impact Determination

The Proposed Project would have sufficient water supplies available to serve buildout of the Plan Area and reasonably foreseeable future development during normal, dry, and multiple dry years. There would be **no adverse effects** related to water demand.

- c) *Would the project result in a determination by the wastewater treatment provider, which serves or may serve the project, that it has adequate capacity to serve the project’s projected demand in addition to the provider’s existing commitments?*

Wastewater generated in the City is treated by the LACSD. As previously discussed, the majority of the wastewater generated in the City is delivered to the Joint Water Pollution Control Plant of LACSD, with the remaining portion delivered to the Long Beach Water

Reclamation Plant of the LACSD. The Joint Water Pollution Control Plant treats approximately 254.7 mgd and has a total permitted design capacity of 400 mgd, whereas the Long Beach WRP treats approximately 9.8 mgd and has a total permitted capacity of 25 mgd.

Based on build out excluding remaining existing uses summarized in Table 3 of Section 2.6.2 (see Chapter 2.0, Project Description, of this Draft PEIR/PEIS), the wastewater demand for Proposed Project land uses, in comparison to existing land uses, has been summarized in Table 3.13-4, Projected Wastewater Demand.

**Table 3.13-4
Projected Wastewater Demand (gpd)**

Land Use Type	Unit of Measure	Flow (gpd)	Square Feet	Usage (gpd)
Office	1,000 ft ²	200	1,770,554	354,111
Medical Office		200	127,992	25,598
R&D		300	234,651	70,395
Manufacturing		200	1,046,951	209,390
Light Industrial/Warehousing		25	3,120,751	78,019
Retail		100	453,077	45,307
Restaurant		1,000	89,351	89,351
Hotel	1 room	125	162,944 ¹	31,335
Total				903,507

Source: Svesson, 2020; LACSD, Table 1. Website: <https://www.lacsd.org/civicax/filebank/blobdload.aspx?blobid=3531>

¹ For hotel uses, a square footage rate of 650 square feet per room is applied. (Source: deRoos, J. A. (2011). Planning and programming a hotel [<https://scholarship.sha.cornell.edu/cgi/viewcontent.cgi?article=1293&context=articles>])

gpd = gallons per day
ksf = thousand square feet

The Proposed Project would result in 903,507 gpd or 0.9 mgd. The LACSD facilities serving the Plan Area have a remaining capacity of 160.5 mgd. Therefore, the Proposed Project-related increase in wastewater would represent approximately 0.6% of the remaining capacity of these facilities. As such, there is sufficient wastewater treatment capacity within the LACSD facilities to accommodate the increase in wastewater demand City-wide, and no major improvements are required. The increase in wastewater flows associated with the Proposed Project would not exceed the treatment requirements of the Los Angeles RWQCB, for the Joint Water Pollution Control Plant and Long Beach Water Reclamation Plan.

As indicated in Table 2 of Section 2.7.2 (see Chapter 2.0, Project Description, of this Draft PEIR/PEIS), the development potential (i.e., total square feet) based on the 10- and 20-year market projections, which were prepared at the outset of the planning process, are generally similar to the development potential provided in Table 3.13-4.

Therefore, the Proposed Project-related increase in wastewater under the 10- and 20-year market projections would similarly represent a small percentage of the remaining capacity of the LACSD treatment facilities.

CEQA Impact Determination

The Proposed Project would result in a determination by the LACSD that it has adequate capacity to serve the Proposed Project's projected demand, in addition to the LACSD's existing commitments. Impacts would be **less than significant**, and no mitigation is required under CEQA.

NEPA Impact Determination

The Proposed Project would result in a determination by the LACSD that it has adequate capacity to serve the Proposed Project's projected demand, in addition to the LACSD's existing commitments. As such, there would be **no adverse effects** under NEPA.

- d) *Would the project generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?*

Construction

As indicated in Table 1 of Section 2.4.2 (see Chapter 2.0, Project Description, of this Draft PEIR/PEIS), the Proposed Project would result in 9,683,778 square feet of development, respectively. Future projects would be reviewed by the City on a project-by-project basis and would comply with any requirements in effect when the review is conducted.

Construction of future projects facilitated by the Proposed Project would generate demolition waste; however, such debris would be accommodated by the County's existing landfills, with a large majority of the City's solid waste being disposed of at the SERRF. In addition, construction waste would be recycled to the extent feasible, pursuant to Chapter 18.67, Construction and Demolition Recycling Program, of the Long Beach Municipal Code. Under the Long Beach Municipal Code, covered projects requiring demolition or building permits are required to divert at least 60% of all Proposed Project-related construction and demolition material from landfills. Compliance with this chapter of the Long Beach Municipal Code would be a condition of approval on any construction or demolition permit issued for a covered project.

CEQA Impact Determination

The Proposed Project would have a **less than significant impact** related to solid waste generation during construction under CEQA, and no mitigation measures regarding demolition/construction debris are required.

NEPA Impact Determination

The Proposed Project would have **no adverse effects** related to solid waste generation during construction under NEPA, and no mitigation measures regarding demolition/construction debris are required.

Operations

With respect to Proposed Project operations, the City's Environmental Services Bureau provides solid waste collection services to collect and dispose of the solid waste/refuse generated by the City. Solid waste generated in the City is also transported to LACSD facilities when solid waste is not suitable for processing at the SERRF, which currently processes approximately 1,345 tons per day. Remaining capacity and estimated closure dates are not determined because the SERRF is a transformation facility that never reaches capacity, as it continually converts solid waste to energy and ash. In 2012, approximately 203,040 tons, or 47 percent, of the solid waste disposed of by the Long Beach residents and businesses were disposed of at the SERRF. Solid waste considered not suitable for processing at the SERRF and generated in the City is taken to landfills in Orange, San Bernardino, and Riverside counties (see Table 3.13-2, Capacity of Landfills Serving the City of Long Beach [2012]) (Los Angeles County 2017; City of Long Beach 2017, 2019b; LACSD 2018b).

Table 3.13-5, Solid Waste Demand – Current and Projected, includes solid waste demand projections in the City through 2040. In 2012, 260,964 tons per year of solid waste was disposed in the City. The City is forecast to generate approximately 1.6 million more pounds of solid waste by 2040, or an increase of approximately 133,342 pounds per day. As shown in Table 3.13-2, Capacity of Landfills Serving the City of Long Beach (2012), the solid waste facilities accepting the remaining solid waste generated from the City that is not treated at the SERRF have a combined remaining capacity of approximately 833.7 million cubic yards and closure dates as late as 2045. Therefore, there is sufficient landfill capacity in the region to serve solid waste generated by the Proposed Project. Furthermore, future development under the Proposed Project would also include efficient waste management procedures to reduce the amount of solid waste generated in the planning area.

CEQA Impact Determination

For the reasons described above, Proposed Project operations would not generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals (e.g., County Integrated Waste Management Plan). Impacts would be **less than significant** under CEQA, and no mitigation is required.

NEPA Impact Determination

For the reasons described above, Proposed Project operations would not generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals (e.g., County Integrated Waste Management Plan). As such, there would be **no adverse effects** under NEPA.

Table 3.13-5
Solid Waste Demand – Current and Projected (lbs/day)

Land Use Type	Unit Type	Usage Factor	2012 Usage (lbs/day)	2040 Buildout (lbs/day)	2012 Usage (lbs/day)	2040 Buildout (lbs/day)	Project-related Increase (lbs/day)
Single Family ¹	lbs/unit/day	10	63,934	64,598	639,340	645,980	6,640
Multi Family ²	lbs/unit/day	4	99,860	110,940	399,440	443,760	44,320
Commercial/Retail ³	lbs/1,000 sf/day	5	21,015,600	24,484,100	105,078	122,421	17,343
Office ⁴	lbs/1,000 sf/day	6	7,984,400	8,977,500	47,906	53,865	5,959
Industrial ⁵	lbs/1,000 sf/day	5	17,571,000	25,240,600	87,855	126,203	38,348
Public Facilities/Institutional ⁶	lbs/sf/day	0.007	21,474,000	24,435,800	150,318	171,051	20,733
Total	-	-	-	-	1,429,937	1,563,279	133,342

Source: CalRecycle, Estimated Solid Waste Generation and Disposal Rates (2016)

¹ County of Los Angeles Dept. of Regional Planning, Vesting Tentative Tract No. 47905, etc. (August 1992)

² County of Los Angeles Dept. of Regional Planning, Vesting Tentative Tract No. 47905, etc. (August 1992)

³ County of Los Angeles Dept. of Regional Planning, Vesting Tentative Tract No. 47905, etc. (August 1992)

⁴ Stevenson Ranch Draft EIR (Phase IV), Los Angeles County (April 1992)

⁵ Stevenson Ranch Draft EIR (Phase IV), Los Angeles County (April 1992)

⁶ Draft EIR for the Central Commercial Redevelopment Project (Monterey Park Redevelopment Agency) (1992)

lbs/day = pounds per day

lbs/unit/day = pounds per unit per day

lbs/1,000 sf/day = pounds per thousand square feet per day

lbs/sf/day = pounds per square feet per day

3.13.5 Cumulative Impacts

As defined in the State CEQA Guidelines, cumulative impacts are the incremental effects of an individual project when viewed in connection with the effects of past, present, current, and probable future projects within the cumulative impact area for utilities. The planning area associated with cumulative impacts includes the entire 50 square miles within the limits of the City of Long Beach. Therefore, the cumulative area for utilities is listed below for each individual utility provider.

Water. The geographic area for the cumulative analysis of water infrastructure includes the service territory of the LBWD. According to the City's 2015 Regional UWMP, the MWDSC's future water supplies are reliable, because the MWDSC current allocation plan guarantees an amount of water close to the LBWD's need for water, and because the LBWD has a preferential right to the MWDSC supplies in excess of its need for that water. In addition, LBWD, which provides the groundwater supply to the City, projects that there are sufficient groundwater supplies to meet any future demand requirements in the City. Further, the current 2015 UWMP accounts for the Proposed Project's transition from traditional land uses and has demonstrated the LBWD has the ability to serve the project-related increase in water demand through the year 2040.

While the MWDSC would accommodate the Proposed Project-related demand for water, the Southern California region is currently facing a challenge in securing its firm water supplies. Due to increased environmental regulations and competition for water from outside of the region, Southern California has seen a reduced supply of imported water. Furthermore, continued population and economic growth has resulted in increased water demands, which have affected water delivery reliability and water availability.

MWDSC's 2010 Regional UWMP describes its water availability and identifies future water supplies to meet the region's long-term water demand. The 2010 Regional UWMP also identifies supply capacities from 2015 through 2035 under single dry-year, multiple dry-year, and average year hydrologic conditions. The 2010 Regional UWMP indicates that the region can provide reliable water supplies under both normal conditions and under the single-driest-year and multiple-dry-year scenarios. While the 2010 Regional UWMP has identified long-term water supplies to serve the region, the MWDSC has prepared for the possibility of being unable to meet the water demands of its member agencies. The MWDSC has established the Water Supply Allocation Plan (WSAP), which calculates each member agency's supply allocations and key implementation elements required for administering the allocation. The WSAP also considers how the MWDSC would be able to provide water to its member agencies during a catastrophic interruption in water supplies.

Mitigation measure **MM-UTIL-1** would require project-specific analyses to determine if future projects can be served by the existing infrastructure. If required improvements are identified by the Long Beach Water Department to serve the site, the project applicant shall fund such improvements.

These improvements would be completed on a project-level and carried out consistent with relevant planning documents for the subject utility.

Similar to that described for sewer lines, installation of new water mains and laterals could result in potential short-term erosion induced siltation of nearby waterways. Potential cumulative erosion related water quality impacts would be potentially significant but mitigable with the implementation of mitigation measure No further mitigation is required. Cumulative impacts to water are considered **less than significant with mitigation incorporated**.

Wastewater. The geographic area for the cumulative analysis for wastewater treatment is defined as the City and LACSD. Within its service area, LACSD uses United States Census Bureau population information with population projections, as well as existing land use and build out or zoned land use to project current and future wastewater flows. The City is almost entirely built out, with most new development occurring as in-fill projects. While the Proposed Project does not include physical improvements, the future build out permitted by the GCSP is not anticipated to generate wastewater above LACSD's current capacity. The Proposed Project would result in a population consistent with the growth projections for the City provided in the 2016–2040 Regional Transportation Plan/Sustainable Communities Strategy. Further, with consideration of projected City growth, it is anticipated that LACSD's existing and planned wastewater treatment capacity would be sufficient to accommodate the growth forecasted by the United States Census Bureau within its service area, and development that is generally consistent with this forecast can be adequately served by LACSD facilities. Therefore, the Proposed Project's contribution to wastewater generation in the LACSD service area would not be cumulatively considerable.

Mitigation measure **MM-UTIL-1** would require project-specific analyses to determine if future projects can be served by the existing infrastructure. If required improvements are identified by the LACSD and Long Beach Public Works Department to serve the site, the project applicant shall fund such improvements. These improvements would be completed on a project-level and carried out consistent with relevant planning documents for the subject utility.

Installation of new sewer mains and laterals consists of either trenching to the depth of pipe placement or using a variety of different trenchless technology, which causes substantially less ground disturbance. Trenching results in a temporary stockpiling of soil along the length of the trench, pending backfilling, which could result in potential short-term erosion induced siltation of nearby waterways. Trenchless technology only requires temporary stockpiling of soil adjacent to excavations on both ends of long sections of pipe. Cumulative impacts related to wastewater generation would be **less than significant** and no mitigation is required. No further mitigation is required. Cumulative impacts to wastewater are considered **less than significant with mitigation incorporated**.

Stormwater. The geographic area for the cumulative analysis of water infrastructure includes the service territory of the City and LACFCD. Mitigation measure **MM-UTIL-1** would require project-specific analyses to determine if future projects can be served by the existing infrastructure. If required improvements are identified by the LACFD and Long Beach Public Works Department to serve the site, the project applicant shall fund such improvements. These improvements would be completed on a project-level and carried out consistent with relevant planning documents for the subject utility.

Potential cumulative construction-related stormwater quality impacts would be potentially significant but mitigable with the implementation of mitigation measure **MM-HYD-1a** (see Section 3.6, Hydrology and Water Quality, of this Draft PEIR/PEIS), in combination with similar mitigation measures implemented at other cumulative project sites. No further mitigation is required. Cumulative impacts to water are considered **less than significant with mitigation incorporated**.

Electric Power, Natural Gas, and Telecommunication. The geographic area for the cumulative analysis of electric power, natural gas, and telecommunication infrastructure includes the service territory for each utility provider.

Mitigation measure **MM-UTIL-1** would require project-specific analyses to determine if future projects can be served by the existing infrastructure. If required improvements are identified by the utility provider to serve the site, the project applicant shall fund such improvements. These improvements would be completed on a project-level and carried out consistent with relevant planning documents for the subject utility. No further mitigation is required. Cumulative impacts to electric power, natural gas, and telecommunication are considered **less than significant with mitigation incorporated**.

Solid Waste. The geographic area for the cumulative analysis of impacts to solid waste disposal capacity is the County of Los Angeles. Development associated with the Proposed Project and other past, present, and reasonably foreseeable projects within the County would contribute to an increase in demand for landfill capacity and solid waste services for the County. As stated previously, the SERRF, a refuse-to-energy transformation facility, serves the planning area and does not have a scheduled closure date. Remaining capacity and estimated closure dates for the SERRF are not determined because the facility is a transformation facility that that never reaches capacity, as it continually converts solid waste to energy and ash. The SERRF currently does not exceed its daily maximum permitted disposal capacity. Solid waste considered unprocessable by SERRF would be taken to landfills in Orange, San Bernardino, and Riverside Counties. There is currently sufficient permitted capacity within the LACSD system serving Los Angeles County to provide adequate future capacity for the County's solid waste needs. The City currently complies with all federal, State, and local statutes and regulations related to solid waste. Therefore, the Proposed Project would not have a significant cumulative impact on waste disposal capacity at

LACSD facilities. Cumulative impacts related to solid waste generation would be **less than significant**, and no mitigation is required.

3.13.6 Mitigation Measures

In the absence of significant impacts, the following mitigation measure **MM-UTIL-1** has been identified for utilities and service systems.

In addition to the mitigation measure identified below, impacts implementation of mitigation measure **MM-HYD-1a** (see Section 3.6, Hydrology and Water Quality, of this Draft PEIR/PEIS) would ensure that BMPs are incorporated during construction and operation of project-specific design documents. These measures also ensure compliance with regulatory requirements for runoff. In addition, mitigation measure **MM-HYD-3a** requires the preparation of a hydrology/drainage report to demonstrate that stormwater runoff flow volume and flow rate, associated with specific projects, would be less than or equal to existing conditions to prevent on- and off-site flooding. Project design features shall be identified that would contribute in reducing stormwater runoff.

MM-UTIL-1 Prior to the issuance of project entitlements or grading permits, whichever comes first, for individual development or redevelopment projects under the Globemaster Corridor Specific Plan (GCSP), a utilities report shall be prepared by the Project Applicant that will identify the ability for existing utility infrastructure to serve the project. As part of this report, the project applicant shall provide evidence to the City of Long Beach Development Services Department that that the development project has been reviewed by the applicable utility provider and that a “Will Serve” letter has been issued. The “Will Serve” letter process is necessary in order to determine whether or not sufficient capacity exists to serve each development project and if the existing utility facilities will be affected by the development project. The report shall include, but not be limited to, the following analyses:

Water Infrastructure

1. The report shall analyze the existing water main conditions and estimates the project-specific water demand for future development. Any development or redevelopment project that would impact existing water facilities within the Plan Area, for which improvements and/or relocation are required or have been identified, shall fund the improvements those as prescribed by City of Long Beach Water Department.

Stormwater/Storm Drain Infrastructure

2. A Hydrology/Hydraulics report shall be prepared that estimates the site-specific discharge rates for a future development. The hydrology and hydraulic study shall analyze the on-site and immediate off-site storm drain systems to determine capacity and integrity of the existing systems. The Project Applicant shall request the “allowable discharge rate” – which limits peak flow discharges as compared to existing conditions based on regional flood control constraints – from the Los Angeles County Department of Public Works and shall comply with such discharge rate. This report can be completed in conjunction with the Hydrology/Drainage Report required under mitigation measure **MM-HYD-3a**. Any development or redevelopment project that would impact segments of the existing storm drain facilities within the Plan Area, for which improvements are required, shall fund upsizing of those storm drain segments as prescribed by City of Long Beach Public Works Department and Los Angeles County Flood Control District.

Wastewater/Sewer Infrastructure

3. The report shall analyze the existing sewer main conditions and estimates the project-specific wastewater generation for future development. Any development or redevelopment project that would impact existing sewer facilities within the Plan Area, for which improvements and/or relocation are required or have been identified, shall fund the improvements those as prescribed by Los Angeles County Sanitation District and Long Beach Water Department.

Electrical Infrastructure

4. The report shall analyze the existing electrical capacity and estimate the project-specific electrical demand for future development. Any development or redevelopment project that would impact existing electrical loads or require new electrical substations or facilities within the Plan Area, for which improvements and/or relocation are required or have been identified, shall fund the improvements those as prescribed by Southern California Edison.

Natural Gas

5. The report shall analyze the existing gas pipeline capacity and estimate the project-specific natural gas demand for future development. Any development or redevelopment project that would impact existing natural gas facilities or require new infrastructure within the Plan Area, for which improvements and/or

relocation are required or have been identified, shall fund the improvements those as prescribed Long Beach Energy Resources Department.

3.13.7 Significance After Mitigation

With the implementation of mitigation measures **MM-UTIL-1**, **MM-HYD-1a**, and **MM-HYD-3a**, all potential impacts related to utilities and service systems would remain **less than significant**.

3.13.8 References

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