IV. Environmental Impact Analysis C. Energy

1. Introduction

This section analyzes the Project's potential impacts on energy resources, focusing on the following three resources: electricity, natural gas, and transportation-related energy (petroleum-based fuels). This section evaluates the demand for energy resources attributable to the Project during construction and operation and makes a determination regarding the Project's use and conservation of energy resources. In addition, this section evaluates the Project's consistency with adopted energy conservation plans and policies relevant to the Project. This section also demonstrates whether the current and planned electrical, natural gas, and petroleum-based fuel supplies and distribution systems are adequate to meet the Project's forecasted energy consumption. The information presented herein is based, in part, on the *Energy Calculations for the Hollywood and Wilcox Project*, as well as the *Utilities Technical Report* (Utility Report) prepared for the Project by Psomas in December 2017, provided in Appendices E and F of this Draft EIR, respectively.

2. Environmental Setting

a. Regulatory Framework

- (1) Federal
 - (a) Federal Corporate Average Fuel Economy (CAFE) Standards

First established by the U.S. Congress in 1975, the Corporate Average Fuel Economy (CAFE) standards reduce energy consumption by increasing the fuel economy of cars and light trucks. The National Highway Traffic Safety Administration (NHTSA) and U.S. Environmental Protection Agency (USEPA) jointly administer the CAFE standards. The U.S. Congress has specified that CAFE standards must be set at the "maximum feasible level" with consideration given for: (1) technological feasibility; (2) economic practicality; (3) effect of other standards on fuel economy; and (4) need for the nation to conserve energy.¹

¹ For more information on the CAFE standards, refer to www.nhtsa.gov/laws-regulations/corporateaverage-fuel-economy, accessed January 17, 2020.

(b) Energy Independence and Security Act

The Energy Independence and Security Act of 2007 (EISA) facilitates the reduction of national GHG emissions by requiring the following:

- Increasing the supply of alternative fuel sources by setting a mandatory Renewable Fuel Standard (RFS) that requires fuel producers to use at least 36 billion gallons of biofuel in 2022;
- Prescribing or revising standards affecting regional efficiency for heating and cooling products, procedures for new or amended standards, energy conservation, energy efficiency labeling for consumer electronic products, residential boiler efficiency, electric motor efficiency, and home appliances;
- Requiring approximately 25 percent greater efficiency for light bulbs by phasing out incandescent light bulbs between 2012 and 2014; requiring approximately 200 percent greater efficiency for light bulbs, or similar energy savings, by 2020; and
- While superseded by the USEPA and NHTSA actions described above, (i) establishing miles per gallon targets for cars and light trucks and (ii) directing the NHTSA to establish a fuel economy program for medium- and heavy-duty trucks and create a separate fuel economy standard for trucks.

Additional provisions of EISA address energy savings in government and public institutions, promote research for alternative energy, additional research in carbon capture, international energy programs, and the creation of "green jobs."²

- (2) State
 - (a) California Building Standards Code (Title 24)
 - (i) California Building Energy Efficiency Standards (Title 24, Part 6)

The California Building Energy Efficiency Standards for Residential and Nonresidential Buildings (CCR, Title 24, Part 6) were first adopted to ensure that building construction, system design and installation achieve energy efficiency and preserve outdoor and indoor environmental quality. The current California Building Energy Efficiency Standards (Title 24 standards) are the 2019 Title 24 standards, which became effective on

² A green job, as defined by the United States Department of Labor, is a job in business that produces goods or provides services that benefit the environment or conserve natural resources.

January 1, 2020.³ The 2019 Title 24 standards improve upon the 2016 standards for new construction of, and additions and alterations to, residential and nonresidential buildings.⁴

(ii) California Green Building Standards (Title 24, Part 11)

The 2019 California Green Building Standards Code (CCR, Title 24, Part 11), commonly referred to as the CALGreen Code, went into effect on January 1, 2020.⁵ The 2019 CALGreen Code includes mandatory measures for non-residential development related to site development; water use; weather resistance and moisture management; construction waste reduction, disposal, and recycling; building maintenance and operation; pollutant control; indoor air quality; environmental comfort; and outdoor air quality.⁶

(b) California's Renewable Portfolio Standard

First established in 2002 under Senate Bill (SB) 1078, California's Renewable Portfolio Standards (RPS) required retail sellers of electric services to source at least 33 percent of energy from eligible renewable energy resources by 2020.⁷ The California Public Utilities Commission (CPUC) and the California Energy Commission (CEC) jointly implement the RPS. The CPUC's responsibilities include: (1) determining annual procurement targets and enforcing compliance; (2) reviewing and approving each investor-owned utility's renewable energy procurement plan; (3) reviewing contracts for RPS-eligible energy; and (4) establishing the standard terms and conditions used in contracts for eligible renewable energy.⁸ In 2018, SB 100, discussed further below, increased the RPS to 60 percent by 2030 and requires all the state's electricity to come from carbon-free resources by 2045.

⁶ CEC, 2019 Building Energy Efficiency Standards, FAQ, January 1, 2020.

³ CEC, 2019 Building Energy Efficiency Standards, www.energy.ca.gov/programs-and-topics/programs/ building-energy-efficiency-standards/2019-building-energy-efficiency, accessed January 17, 2020.

⁴ CEC, 2019 Building Energy Efficiency Standards, www.energy.ca.gov/programs-and-topics/programs/ building-energy-efficiency-standards/2019-building-energy-efficiency, accessed January 17, 2020.

⁵ California Building Standards Commission, CALGreen, www.dgs.ca.gov/BSC/Resources/Page-Content/ Building-Standards-Commission-Resources-List-Folder/CALGreen#@ViewBag.JumpTo, accessed January 17, 2020.

⁷ CPUC, California Renewables Portfolio Standard (RPS), www.cpuc.ca.gov/rps/, accessed January 17, 2020.

⁸ CPUC, California Renewables Portfolio Standard (RPS), www.cpuc.ca.gov/rps/, accessed January 17, 2020.

(c) Senate Bill 350

SB 350, signed October 7, 2015, is the Clean Energy and Pollution Reduction Act of 2015. SB 350 is the implementation of some of the goals of Executive Order B-30-15, issued in April 2015, which established a new statewide policy goal to reduce greenhouse gas (GHG) emissions 40 percent below their 1990 levels by 2030. The objectives of SB 350 are: (1) to increase the procurement of our electricity from renewable sources from 33 percent to 50 percent by 2030; and (2) to double the energy efficiency savings in electricity and natural gas final end uses of retail customers through energy efficiency and conservation by 2030.⁹

(d) Senate Bill 100

SB 100, signed September 10, 2018, is the 100 Percent Clean Energy Act of 2018. SB 100 updates the goals of California's RPS and SB 350, as discussed above, to the following: achieve 50 percent renewable resources target by December 31, 2026, and achieve a 60-percent target by December 31, 2030. SB 100 also requires that eligible renewable energy resources and zero-carbon resources supply 100 percent of retail sales of electricity to California end-use customers and 100 percent of electricity procured to serve all state agencies by December 31, 2045.¹⁰

(e) Assembly Bill 32

As discussed in Section IV.E, Greenhouse Gas Emissions, of this Draft EIR, Assembly Bill (AB) 32 (Health and Safety Code Sections 38500–38599), also known as the California Global Warming Solutions Act of 2006, commits the state to achieving year 2000 GHG emission levels by 2010 and year 1990 GHG levels by 2020. To achieve these goals, AB 32 tasked the CPUC and the CEC with providing information, analysis, and recommendations to the California Air Resources Board (CARB) regarding ways to reduce GHG emissions in the electricity and natural gas utility sectors.

(f) Assembly Bill 1493 (AB 1493)/Pavley Regulations

AB 1493 (commonly referred to as CARB's Pavley regulations) was the first state legislation to regulate GHG emissions from new passenger vehicles. Under this legislation, CARB adopted regulations to reduce GHG emissions from non-commercial passenger

⁹ SB 350 (2015–2016 Reg, Session) Stats 2015, ch. 547.

¹⁰ SB 100 (2017–2018 Reg. Session) Stats 2018, ch. 312.

vehicles (cars and light-duty trucks) for model years 2009–2016.¹¹ The bill recognized that global warming (climate change) is a public health concern, that motor vehicles are a major source of the state's greenhouse gas emissions, and that reducing these emissions will protect public health and the environment while stimulating the economy and enhancing job opportunities.¹²

(g) California Air Resources Board

(i) CARB's Advanced Clean Cars Regulation

Closely associated with the Pavley regulations, the Advanced Clean Cars emissions-control program was approved by CARB in 2012.¹³ The program combines the control of smog, soot, and GHGs with requirements for greater numbers of zero-emission vehicles for model years 2015–2025.¹⁴ The components of the Advanced Clean Cars Program include the Low-Emission Vehicle (LEV) regulations that reduce criteria pollutants and GHG emissions from light- and medium-duty vehicles, and the Zero-Emission Vehicle (ZEV) regulation, which requires manufacturers to produce an increasing number of pure ZEVs (meaning battery electric and fuel cell electric vehicles), with provisions to also produce plug-in hybrid electric vehicles (PHEV) in the 2018 through 2025 model years.¹⁵ In March 2017, CARB voted unanimously to continue with the vehicle greenhouse gas emission standards and the ZEV program for cars and light trucks sold in California through 2025.¹⁶

(ii) Airborne Toxic Control Measure to Limit Diesel-Fueled Commercial Motor Vehicle Idling

The Airborne Toxic Control Measure to Limit Diesel-Fueled Commercial Motor Vehicle Idling (Title 13, CCR, Division 3, Chapter 10, Section 2435) was adopted to reduce

- ¹³ CARB, Advanced Clean Cars Program, About, ww2.arb.ca.gov/our-work/programs/advanced-clean-carsprogram/about, accessed January 17, 2020.
- ¹⁴ CARB, Advanced Clean Cars Program, About, ww2.arb.ca.gov/our-work/programs/advanced-clean-carsprogram/about, accessed January 17, 2020.
- ¹⁵ CARB, Advanced Clean Cars Program, About, ww2.arb.ca.gov/our-work/programs/advanced-clean-carsprogram/about, accessed January 17, 2020.
- ¹⁶ CARB, News Release: CARB finds vehicle standards are achievable and cost-effective, ww2.arb.ca.gov/ news/carb-finds-vehicle-standards-are-achievable-and-cost-effective, accessed January 17, 2020.

¹¹ CARB, California's Greenhouse Gas Vehicle Emission Standards under Assembly Bill 1493 of 2002 (Pavley), ww2.arb.ca.gov/californias-greenhouse-gas-vehicle-emission-standards-under-assembly-bill-1493-2002-pavley, accessed January 17, 2020.

¹² CARB, California's Greenhouse Gas Vehicle Emission Standards under Assembly Bill 1493 of 2002 (Pavley), ww2.arb.ca.gov/californias-greenhouse-gas-vehicle-emission-standards-under-assembly-bill-1493-2002-pavley, accessed January 17, 2020.

public exposure to diesel particulate matter and other air contaminants by limiting the idling of diesel-fueled commercial motor vehicles. This section applies to diesel-fueled commercial motor vehicles with gross vehicular weight ratings of greater than 10,000 pounds that are or must be licensed for operation on highways. Reducing idling of diesel-fueled commercial motor vehicles reduces the amount of petroleum-based fuels used by the vehicle.

(h) Sustainable Communities Strategy (SB 375)

The Sustainable Communities and Climate Protection Act of 2008, or SB 375, coordinates land use planning, regional transportation plans, and funding priorities to help California meet the GHG reduction mandates established in AB 32. SB 375 specifically requires each Metropolitan Planning Organization (MPO) to prepare a "sustainable communities strategy" (SCS) as part of its Regional Transportation Plan (RTP), which is required by the state and federal government, that will achieve GHG emission reduction targets set by CARB for the years 2020 and 2035 by reducing vehicle miles travelled (VMT) from light duty vehicles through the development of more compact, complete and efficient communities. The SCS also contains land use, housing, and transportation strategies that, if implemented, would allow the region to meet its GHG emission reduction targets.¹⁷

The Project Site is located within the MPO area of the Southern California Association of Governments (SCAG) as is the entire City. SCAG's compliance with SB 375 is described below. SCAG's first-ever SCS was included in the 2012–2035 Regional Transportation Plan/Sustainable Communities Strategy (2012–2035 RTP/SCS), which was adopted by SCAG in April 2012. The goals and policies of the SCS that reduce VMT, and result in corresponding decreases in transportation-related fuel consumption, focus on transportation and land use planning that include building infill projects, locating residents closer to where they work and play, and designing communities so there is access to high quality transit service. SCAG has since adopted the 2016–2040 RTP/SCS).¹⁸ The goals and policies of the 2016–2040 RTP/SCS are substantially the same as those in the 2012–2035 RTP/SCS. See further discussion below.

(i) Assembly Bill 758

AB 758 requires the CEC to develop a comprehensive program to achieve greater energy efficiency in the state's existing buildings. As part of the requirements of AB 758,

¹⁷ CARB, Sustainable Communities, ww2.arb.ca.gov/our-work/topics/sustainable-communities, accessed January 17, 2020.

¹⁸ SCAG, Final 2016–2040 RTP/SCS, dated April 2016.

the AB 758 Action Plan was released March 2015 and provides a 10-year roadmap that would result in accelerated growth of energy efficiency markets, more effective targeting and delivery of building upgrade services, improved quality of occupant and investor decisions, and vastly improved performance of California's buildings in service of those who own and occupy them. The AB 758 Action Plan provides a comprehensive framework centered on five goals, each with an objective and a series of strategies to achieve it.

(j) Senate Bill 1389

SB 1389 (PRC Sections 25300–25323) requires the development of an integrated plan for electricity, natural gas, and transportation fuels. Under the bill, the CEC must adopt and transmit to the Governor and Legislature an Integrated Energy Policy Report every two years. The most recently completed report, the 2016 Integrated Energy Policy Report, addresses a variety of issues including the environmental performance of the electricity generation system, the response to the gas leak at the Aliso Canyon natural gas storage facility, transportation fuel supply reliability issues, an update on the Southern California electricity reliability, a discussion of methane leakage, climate adaptation activities for the energy sector, climate and sea level rise scenarios, and the *California Energy Demand Forecast*.¹⁹

(k) California Environmental Quality Act

In accordance with CEQA and Appendix F, Energy Conservation, of the CEQA Guidelines, in order to assure that energy implications are considered in project decisions, EIRs are required to include a discussion of the potential significant energy impacts of proposed projects, with particular emphasis on avoiding or reducing inefficient, wasteful, and unnecessary consumption of energy (PRC Section 21100(b)(3)). Appendix F of the CEQA Guidelines provides a list of energy-related items that may be included throughout the various chapters of an EIR. In addition, while not described or required as thresholds for determining the significance of impacts related to energy, Appendix F provides the following topics that may be considered in the discussion of energy use in an EIR, where topics are applicable or relevant to the project:

- The project's energy requirements and its energy use efficiencies by amount and fuel type for each stage of the project's life cycle including construction, operation, maintenance, and/or removal. If appropriate, the energy intensiveness of materials may be discussed;
- The effects of the project on local and regional energy supplies and on requirements for additional capacity;

¹⁹ CEC, 2016 Integrated Energy Policy Report, docketed January 18, 2017.

- The effects of the project on peak and base period demands for electricity and other forms of energy;
- The degree to which the project complies with existing energy standards;
- The effects of the project on energy resources; or
- The project's projected transportation energy use requirements and its overall use of efficient transportation alternatives.

(3) Regional

As discussed in Section IV.F, Land Use, of this Draft EIR, SCAG's 2016–2040 RTP/ SCS presents a long-term transportation vision through the year 2040 for the six-county region of Imperial, Los Angeles, Orange, Riverside, San Bernardino, and Ventura Counties. On April 7, 2016, the SCAG Regional Council adopted the 2016–2040 RTP/SCS, the mission of which is "leadership, vision and progress which promote economic growth, personal well-being, and livable communities for all Southern Californians."²⁰ The 2016– 2040 RTP/SCS includes land use strategies that focus on urban infill growth and walkable, mixed-use communities in existing urbanized and opportunity areas. More mixed-use, walkable, and urban infill development would be expected to accommodate a higher proportion of growth in more energy-efficient housing types like townhomes, apartments, and smaller single-family homes, as well as more compact commercial buildings types. Furthermore, the 2016–2040 RTP/SCS includes transportation investments and land use strategies that encourage carpooling, increased transit use, active transportation opportunities, and promoting more walkable and mixed use communities which would potentially help to offset passenger VMT.

The 2016–2040 RTP/SCS also establishes High-Quality Transit Areas (HQTA), which are generally described as walkable transit villages or corridors that are within 0.5 mile of a well-serviced transit stop or a transit corridor that has a minimum density of 20 dwelling units per acre with a 15-minute or less service frequency during peak commute hours.²¹ Local governments are encouraged to focus housing and employment growth within HQTAs to reduce VMT. The Project Site is located within an HQTA as designated by the 2016–2040 RTP/SCS.²²

²⁰ SCAG, Final 2016–2040 RTP/SCS.

²¹ SCAG, Final 2016–2040 RTP/SCS, p. 8.

²² SCAG, Final 2016–2040 RTP/SCS, Exhibit 5.1: High Quality Transit Areas in the SCAG Region for 2040 Plan, p. 77.

(4) Local

(a) City of Los Angeles Green LA Action Plan/ClimateLA

Green LA, An Action Plan to Lead the Nation in Fighting Global Warming (LA Green Plan) is the City of Los Angeles's climate action plan. The plan, released in May 2007, sets forth a goal of reducing the City's GHG emissions to 35 percent below 1990 levels by the year 2030. ClimateLA is the implementation program for the LA Green Plan that provides detailed information about each action item discussed in the Green LA framework. ClimateLA includes focus areas addressing environmental issues including but not limited to energy, water, transportation, and waste. The energy focus area includes action items with measures that aimed to increase the use of renewable energy to 35 percent by 2020, reduce the use of coal-fired power plants, and present a comprehensive set of green building policies to guide and support private sector development.

In 2008, the City released an implementation program for the LA Green Plan referred to as ClimateLA, which provides detailed information about each action item discussed in the LA Green Plan framework.²³ Action items range from harnessing wind power for electricity production and energy efficiency retrofits in City buildings, to converting the City's fleet vehicles to cleaner and more efficient models, as well as reducing water consumption. ClimateLA is a living document, reflecting a process of ongoing learning and continuous improvement as technology advances and City departments develop expertise in the methods of lowering GHG emissions.

(b) City of Los Angeles Green Building Code

On December 20, 2016, the Los Angeles City Council approved Ordinance No. 184,692, which amended Chapter IX of the Los Angeles Municipal Code (LAMC), referred to as the Los Angeles Green Building Code, to alter certain provisions of Article 9 to reflect local administrative changes and incorporate by reference portions of the 2016 CALGreen Code. Projects filed on or after January 1, 2017, must comply with the provisions of the Los Angeles Green Building Code. Specific mandatory requirements and elective measures are provided for three categories: (1) low-rise residential buildings; (2) nonresidential and high-rise residential buildings. Article 9, Division 5 includes measures for newly constructed nonresidential and high-rise residential buildings.

²³ City of Los Angeles, ClimateLA, 2008.

(c) City of Los Angeles Sustainable City pLAn/L.A.'s Green New Deal

The Sustainable City pLAn was adopted in 2015 and includes both short-term and long-term aspirations through the year 2035 in various topic areas, including: water, solar power, energy-efficient buildings, carbon and climate leadership, waste and landfills, housing and development, mobility and transit, and air quality, among others.²⁴ Specific targets include the construction of new housing units within 1,500 feet of transit by 2017, reducing VMT per capita by 5 percent by 2025, and increasing trips made by walking, biking or transit by at least 35 percent by 2025. The Sustainable City pLAn was updated in April 2019 and renamed as L.A.'s Green New Deal. The 2019 Sustainable City pLAn/L.A.'s Green New Deal has established targets such as 100 percent renewable energy by 2045, diversion of 100 percent of waste by 2050, and recycling of 100 percent of wastewater by 2035.

b. Existing Conditions

(1) Electricity

Electricity, a consumptive utility, is a man-made resource. The production of electricity requires the consumption or conversion of energy resources, including water, wind, oil, gas, coal, solar, geothermal, and nuclear resources, into energy. The delivery of electricity involves a number of system components, including substations and transformers that lower transmission line power (voltage) to a level appropriate for on-site distribution and use. The electricity generated is distributed through a network of transmission and distribution lines commonly called a power grid. Conveyance of electricity through transmission lines is typically responsive to market demands.

Energy capacity, or electrical power, is generally measured in watts (W) while energy use is measured in watt-hours (Wh). For example, if a light bulb has a capacity rating of 100 W, the energy required to keep the bulb on for 1 hour would be 100 Wh. If ten 100 W bulbs were on for 1 hour, the energy required would be 1,000 Wh or 1 kilowatt-hour (kWh). On a utility scale, a generator's capacity is typically rated in megawatts (MW), which is one million watts, while energy usage is measured in megawatt-hours (MWh) or gigawatt-hours (GWh), which is one billion watt-hours.

The Los Angeles Department of Water and Power (LADWP) provides electrical service throughout the City and many areas of the Owens Valley, serving approximately four million people within a service area of approximately 465 square miles, excluding the Owens Valley. Electrical service provided by the LADWP is divided into two planning

²⁴ City of Los Angeles, Sustainable City pLAn, April 2015.

districts: Valley and Metropolitan. The Valley Planning District includes the LADWP service area north of Mulholland Drive, and the Metropolitan Planning District includes the LADWP service area south of Mulholland Drive. The Project Site is located within LADWP's Metropolitan Planning District.

LADWP generates power from a variety of energy sources, including hydropower, coal, gas, nuclear sources, and renewable resources, such as wind, solar, and geothermal sources. According to LADWP's 2017 Power Strategic Long-Term Resources Plan, the LADWP has a net dependable generation capacity greater than 7,531 MW.²⁵ The LADWP power system experienced an all-time high peak of 6,432 MW on August 31, 2017.²⁶ Approximately 32 percent of LADWP's 2018 electricity purchases were from renewable sources, which is similar to the statewide percentage of 31 percent electricity purchases from renewable sources.²⁷

According to the Utility Report, the Project Site would receive power from existing lines in the area, which have sufficient capacity to provide power for the Project. Existing overhead lines, which currently run throughout the on-site parking lot, would be able to provide electrical service to the Project. There is no existing electricity generation on-site including coal, oil, natural gas, solar, geothermal, wind, or hydropower.

(2) Natural Gas

Natural gas is a combustible mixture of simple hydrocarbon compounds (primarily methane) that is used as fuel source. Natural gas consumed in California is obtained from naturally occurring reservoirs, mainly located outside the State, and delivered through high-pressure transmission pipelines. The natural gas transportation system is a nationwide network, and, therefore, resource availability is typically not an issue. Natural gas provides almost one-third of the state's total energy requirements and is used in electricity generation, space heating, cooking, water heating, industrial processes, and as a transportation fuel. Natural gas is measured in terms of cubic feet (cf).

Natural gas is provided to the Project Site by the Southern California Gas Company (SoCalGas). SoCalGas is the principal distributor of natural gas in Southern California, serving residential, commercial, and industrial markets. SoCalGas serves approximately 21.8 million customers in more than 500 communities encompassing approximately

²⁵ LADWP, 2017 Power Strategic Long-Term Resources Plan, December 2017.

²⁶ LADWP, 2018 Retail Electric Sales and Demand Forecast, p. 6.

²⁷ California Energy Commission, Utility Annual Power Content Labels for 2018. As of January 27, 2020, 2018 is the most current data available.

24,000 square miles throughout Central and Southern California, from the City of Visalia to the Mexican border.²⁸

SoCalGas receives gas supplies from several sedimentary basins in the western United States and Canada, including supply basins located in New Mexico (San Juan Basin), West Texas (Permian Basin), the Rocky Mountains, and Western Canada, as well as local California supplies.²⁹ The traditional, southwestern United States sources of natural gas will continue to supply most of SoCalGas's natural gas demand. The Rocky Mountain is available but is used as an alternative supplementary supply source, and the use of Canadian sources provide only a small share of SoCalGas supplies due to the high cost of transport.³⁰ Gas supply available to SoCalGas from California sources averaged 323 million cf per day in 2017 (the most recent year for which data are available).³¹

SoCalGas would supply natural gas to the Project Site from natural gas service lines located in the vicinity of the Project Site. According to the Utility Report, there is a 3" gas line in Wilcox Avenue and a 6" gas line on Hollywood boulevard. These existing lines will be sufficient to provide service to the Project Site

(3) Transportation Energy

According to the CEC, transportation accounted for nearly 37 percent of California's total energy consumption in 2014, based on the latest information available.³² In 2018, California consumed 15.6 billion gallons of gasoline and 2.8 billion gallons of diesel fuel.^{33,34} Petroleum-based fuels currently account for 90 percent of California's transportation energy sources.³⁵ However, the state is now working on developing flexible strategies to reduce petroleum use. Over the last decade, California has implemented several policies, rules, and regulations to improve vehicle efficiency, increase the development and use of alternative fuels, reduce air pollutants and GHGs from the transportation sector, and reduce VMT. Accordingly, gasoline consumption in California

²⁸ SoCalGas, Company Profile, www.socalgas.com/about-us/company-profile, accessed January 17, 2020.

²⁹ California Gas and Electric Utilities, 2018 California Gas Report, p. 80.

³⁰ California Gas and Electric Utilities, 2018 California Gas Report, pp. 80.

³¹ California Gas and Electric Utilities, 2018 California Gas Report, pp. 80.

³² CEC, 2016 Integrated Energy Policy Report, docketed January 18, 2017, p. 4.

³³ California Board of Equalization, Net Taxable Gasoline Gallons 10 Year Report.

³⁴ California Board of Equalization, Net Taxable Diesel Gallons 10-Year Report.

³⁵ CEC, 2016–2017 Investment Plan Update for the Alternative and Renewable Fuel and Vehicle Technology Program, March 2016.

has declined.³⁶ The CEC predicts that the demand for gasoline will continue to decline over the next ten years, and there will be an increase in the use of alternative fuels.³⁷ According to CARB's EMFAC Web Database, Los Angeles County on-road transportation sources consumed 3.99 billion gallons of gasoline and 1.23 billion gallons of diesel fuel in 2018.³⁸

The existing on-site land uses currently generate a demand for transportationrelated fuel use as a result of vehicle trips to and from the Project Site. The estimate of annual VMT associated with the existing Project Site uses is 530,811 VMT per year.³⁹ This translates to 26,602 gallons of gasoline and 4,811 gallons of diesel per year.⁴⁰ Persons traveling to and from the Project Site also have the option of using public transportation to reduce transportation-related fuel use, as the Project Site is located approximately 0.25 mile west of the Los Angeles County Metropolitan Transportation Authority (Metro) Hollywood/Vine Station and near several bus lines with stops along Hollywood Boulevard. For further discussion of public transit lines that serve the Project area, refer to Section IV.G, Transportation, of this Draft EIR.

3. Project Impacts

This analysis addresses the Project's potential energy usage, including electricity, natural gas, and transportation fuel. Energy consumption during both construction and operation is assessed. The Project's estimated energy consumption was calculated using California Emissions Estimator Model (CalEEMod) Version 2016.3.2. Specific analysis methodologies are discussed below.

a. Thresholds of Significance

Appendix G was amended in December 2018 to assess whether the project would result in wasteful, inefficient, or unnecessary energy consumption. As discussed in more detail below, these checklist questions take into account requirements of Appendix F. In accordance with Appendix G of the State CEQA Guidelines, the Project would have a significant impact related to energy if it would:

³⁶ State Board of Equalization, Economic Perspective, Discussion of Recent Economic Developments, Publication 329, Volume XIX, Number 1, February 2013.

³⁷ CEC, 2015 Integrated Energy Policy Report.

³⁸ CARB, EMFAC2014 Web Database.

³⁹ The VMT, as calculated by CalEEMod, reflects existing floor area.

⁴⁰ Eyestone Environmental, Energy Calculations for the Hollywood and Wilcox Project. See Appendix E of this Draft EIR.

Threshold (a): Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?

Threshold (b): Conflict with or obstruct a state or local plan for renewable energy or energy efficiency?

With regard to Threshold (a), this analysis relies upon Appendix F of the CEQA Guidelines was prepared in response to the requirement in PRC Section 21100(b)(3), which states that an EIR shall include a detailed statement setting forth "[m]itigation measures proposed to minimize significant effects of the environment, including, but not limited to, measures to reduce the wasteful, inefficient, and unnecessary consumption of energy." In addition, with regard to potential impacts to energy, the *City of Los Angeles CEQA Thresholds Guide* states that a determination of significance shall be made on a case-by case basis, considering the following factors:

- The extent to which the project would require new (off-site) energy supply facilities and distribution infrastructure, or capacity enhancing alterations to existing facilities;
- Whether and when the needed infrastructure was anticipated by adopted plans; and
- The degree to which the project design and/or operations incorporate energy conservation measures, particularly those that go beyond City requirements.

In accordance with Appendix F and the *L.A. CEQA Thresholds Guide*, the following criteria will be considered in determining whether this threshold of significance is met:

- 1. The project's energy requirements and its energy use efficiencies by amount and fuel type for each stage of the project's life cycle including construction, operation, maintenance, and/or removal. If appropriate, the energy intensiveness of materials may be discussed.
- 2. The effects of the project on local and regional energy supplies and on requirements for additional capacity.
- 3. The effects of the project on peak and base period demands for electricity and other forms of energy.
- 4. The degree to which the project complies with existing energy standards.
- 5. The effects of the project on energy resources.
- 6. The project's projected transportation energy use requirements and its overall use of efficient transportation alternatives.

- 7. The degree to which the project design and/or operations incorporate energyconservation measures, particularly those that go beyond City requirements.
- 8. Whether the Project conflicts with adopted energy conservation plans.

The significance threshold with regard to energy infrastructure is as follows:

With regard to Threshold (b), the Project will be evaluated for consistency with adopted energy conservation plans and policies relevant to the Project. Such adopted energy conservation plans and policies include Title 24 energy efficiency requirements, CalGreen and City building codes. Also, as discussed in Section IV.E, Greenhouse Gas Emissions, of this Draft EIR, the Project would also be consistent with the SCAG RTP/SCS which includes goals to reduce VMT and corresponding decrease in fuel consumption.

b. Methodology

(1) Construction

During Project construction, energy would be consumed in the form of electricity associated with the conveyance of water used for dust control (including supply and conveyance) and, on a limited basis, powering lights, electronic equipment, or other construction activities necessitating electrical power. Electricity usage associated with the supply and conveyance of water used for dust control during construction was calculated using the California Emissions Estimator Model (CalEEMod).⁴¹ Electricity used to power lighting, electronic equipment, and other construction activities necessitating electrical power was calculated based on data provided in South Coast Air Quality Management District (SCAQMD) construction surveys (i.e., construction activity, horsepower, load factor, and hours of use per day).⁴² The SCAQMD construction surveys identified the use of diesel generators to supply construction sites with electrical power. As SCAQMD recommends use of electricity from LADWP instead of diesel generators and pursuant to Project Design Feature AIR-PDF-1, the Project would not include the use of diesel generators, the equivalent use of electrical power was calculated for the Project.

In terms of natural gas, construction activities typically do not involve the consumption of natural gas.

Project construction would also consume energy in the form of petroleum-based fuels associated with the use of off-road construction vehicles and equipment on the

⁴² CalEEMod Users Guide, Appendix E1, Technical Source Documentation, October 2017.

⁴¹ California Air Pollution Control Officers Association, CalEEMod [™] version 2016.3.2.

Project Site, construction worker travel to and from the project site, and delivery and haul truck trips (e.g., the hauling of demolition material to off-site reuse and disposal facilities). Fuel consumption from on-site heavy-duty construction equipment was calculated based on the equipment mix and usage factors provided in the CalEEMod construction output files and included in Appendix E of this Draft EIR. The total horsepower was then multiplied by fuel usage estimates per horsepower-hour included in Table A9-3-E of the SCAQMD *CEQA Air Quality Handbook*. Fuel consumption from construction worker, vendor, and delivery/haul trucks was calculated using the trip rates and distances provided in the CalEEMod construction output files. Total VMT was then calculated for each type of construction-related trip and divided by the corresponding county-specific miles-per-gallon factor using CARB's EMFAC 2014 model (EMFAC2014). EMFAC provides the total annual VMT and fuel consumed for each vehicle type. Consistent with CalEEMod, construction worker trips were assumed to include 50 percent light duty gasoline auto and 50 percent light duty gasoline trucks. Refer to Appendix E of this Draft EIR for detailed calculations.

(2) Operation

Annual consumption of electricity (including electricity usage associated with the supply and conveyance of water) and natural gas was calculated using demand factors provided in CalEEMod as part of the GHG analysis included in Section IV.E, Greenhouse Gas Emissions, of this Draft EIR. Energy impacts associated with transportation during operation were also assessed. Daily trip generation used in this analysis was based on the Traffic Study prepared for the Project included in Appendix 0.1 of this Draft EIR. As discussed therein, the trip generation for the Project was determined based on the Institute of Transportation Engineers trip generation factors for the applicable land uses. The daily Project-related trips were then input into CalEEMod, which calculated the annual VMT. The resulting annual VMT was used as part of the GHG analysis included in Section IV.E, Greenhouse Gas Emissions, of this Draft EIR. Based on this annual VMT, gasoline and diesel consumption rates were calculated using the county-specific miles per gallon calculated using EMFAC2014. The vehicle fleet mix for vehicles anticipated to visit the Project Site was calculated consistent with the CalEEMod default for Los Angeles County. Supporting calculations are provided in Appendix E of this Draft EIR. These calculations were used to determine if the Project causes the wasteful, inefficient and/or unnecessary consumption of energy.

The Project's estimated energy demands were also analyzed relative to LADWP's and SoCalGas' existing and planned energy supplies in 2023 (i.e., full buildout of the Project) to determine if these two energy utility companies would be able to meet the Project's energy demands. Finally, the capacity of existing local infrastructure to accommodate the Project's estimated electricity and natural gas demand was assessed based on service letters included as part of Appendix F of this Draft EIR.

c. Project Design Features

The Project would include project design features designed to improve energy efficiency as set forth in Section IV.E, Greenhouse Gas Emissions, and Section IV.K.1, Utilities and Service Systems—Water Supply and Infrastructure, of this Draft EIR.

d. Analysis of Project Impacts

Threshold (a): Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?

(1) Impact Analysis

The following analysis considers the eight criteria identified in the Thresholds of Significance subsection above to determine whether Threshold (a) would be exceeded.

(a) The project's energy requirements and its energy use efficiencies by amount and fuel type for each stage of the project including construction, operation, maintenance, and/or removal. If appropriate, the energy intensiveness of materials may be discussed

The Project would consume energy during construction and operational activities. Sources of energy for these activities would include electricity usage, natural gas consumption, and transportation fuels such as diesel and gasoline. The analysis below includes the Project's energy requirements and energy use efficiencies by fuel type for each stage of the Project (construction, operations, maintenance, and removal activities).⁴³

For purposes of this analysis, Project maintenance would include activities such as repair of structures, landscaping, and application of architectural coatings. Energy usage related to Project maintenance activities are assumed to be included as part of Project operations. Removal of Project activities of the structures constructed under this Project would include the future demolition or abandonment of the Project as proposed.⁴⁴ However, as it is not known when the Project would be removed, the analysis of energy usage related to Project removal activities would be speculative. For this reason, energy usage related to Project removal was not analyzed.

⁴³ *Removal activities relate to the life of a project.*

⁴⁴ Removal activities relate to the life of a project.

(i) Construction

During Project construction, energy would be consumed in the form of electricity associated with the conveyance of water used for dust control and, on a limited basis, powering lights, electronic equipment, or other construction activities necessitating Electricity from these construction activities would be limited in electrical power. comparison to existing operational electricity on the Project Site given that construction activities would be intermittent and use of heating and cooling equipment would also be used intermittently. The Project would also implement Project Design Feature AIR-PDF-1 which would require use of electricity from power poles or solar generators during construction. As a conservative assumption, electricity used for construction activities was assumed to be obtained through power poles. As discussed below, construction activities, including the construction of new buildings and facilities, typically do not involve the consumption of natural gas. Project construction would also consume energy in the form of petroleum-based fuels associated with the use of off-road construction vehicles and equipment on the Project Site, construction worker travel to and from the Project Site, and delivery and haul truck trips (e.g., hauling of demolition material to off-site reuse and disposal facilities), which together are described as "On-road construction equipment" in Table IV.C-1 on page IV.C-19.

As shown in Table IV.C-1, a total of 48.7 MWh of electricity, 89,295 gallons of gasoline, and 116,644 gallons of diesel is estimated to be consumed during Project construction. Project construction is expected to be completed by 2023.

Electricity

During construction of the Project, electricity would be consumed to supply and convey water for dust control and, on a limited basis, may be used to power lighting, electronic equipment, and other construction activities necessitating electrical power. Electricity would be supplied to the Project Site by existing electrical services within the Project Site and would not affect other services. This would be consistent with suggested measures in the *L.A. CEQA Thresholds Guide* to use electricity from power poles rather than temporary gasoline or diesel powered generators pursuant to Project Design Feature AIR-PDF-1.

As shown in Table IV.C-1, a total of approximately 48.7 MWh of electricity is anticipated to be consumed during Project construction. The electricity demand at any given time would vary throughout the construction period based on the construction activities being performed, and would cease upon completion of construction. When not in use, electric equipment would be powered off so as to avoid unnecessary energy consumption. In addition, although Title 24 requirements typically apply to energy usage for buildings, long-term construction lighting (longer than 120 days) providing illumination

 Table IV.C-1

 Summary of Energy Use During Project Construction^a

Fuel Type	
Electricity	
Water Consumption	4.9 MWh
Lighting, electronic equipment, and other construction activities necessitating electrical power ^c	43.8 MWh
Total Electricity	48.7 MWh
Gasoline	
On-Road Construction Equipment and Vehicles ^d	89,295 gallons
Off-Road Construction Equipment and Vehicles ^e	0 gallons
Total Gasoline	89,295 gallons
Diesel	
On-Road Construction Equipment and Vehicles ^d	62,886 gallons
Off-Road Construction Equipment and Vehicles ^e	53,758 gallons
Total Diesel	116,644 gallons

MWh = megawatt hours

^a Detailed calculations are provided in Appendix E of this Draft EIR.

^b Calculated energy consumption rounded to nearest hundred.

^c Electricity usage is based on SCAQMD construction site survey data and typical requirements for power generators. Such electricity demand would be temporary, limited, and would cease upon the completion of construction.

^{*d*} On-road construction equipment encompasses construction worker trips, vendor trips, and haul trips.

Off-road construction equipment encompasses construction equipment usage on the Project Site (e.g., excavators, cranes, forklifts, etc.) Heavy equipment is assumed to be powered with diesel fuel.
 Source: Eyestone Environmental, 2020.

for the site and staging areas would also comply with applicable Title 24 requirements which includes limits on the wattage allowed per specific area, which result in the conservation of energy.⁴⁵ As such, the demand for electricity during construction would not cause wasteful, inefficient, and unnecessary use of energy.

Natural Gas

Construction activities, including the construction of new buildings and facilities, typically do not involve the consumption of natural gas. Accordingly, natural gas would not be supplied to support Project construction activities; thus, there would be no demand generated by construction.

⁴⁵ California Building Energy Efficiency Standards, Title 24, Part 6, §110.9, §130.0, and §130.2.

Transportation Energy

The petroleum-based fuel use summary provided above in Table IV.C-1 on page IV.C-19 represents the amount of transportation energy that could potentially be consumed during Project construction based on a conservative set of assumptions provided in Appendix E of this Draft EIR. As shown, on- and off-road vehicles would consume an estimated 89,295 gallons of gasoline and approximately 116,644 gallons of diesel fuel throughout the Project's construction. For comparison purposes, the fuel usage during Project construction would represent approximately 0.001 percent of the 2021 (construction start year) annual on-road gasoline-related energy consumption in Los Angeles County, and 0.009 percent of the 2021 annual diesel fuel-related energy consumption in Los Angeles County, as shown in Appendix E, of this Draft EIR.

Trucks and equipment used during proposed construction activities would comply with CARB's anti-idling regulations as well as the In-Use Off-Road Diesel-Fueled Fleets regulation. In addition to reducing criteria pollutant emissions, compliance with the antiidling and emissions regulations would also result in efficient use of construction-related energy and reduce fuel consumption. In addition, on-road vehicles (i.e., haul trucks, worker vehicles) would be subject to Federal fuel efficiency requirements. Therefore, Project construction activities would comply with existing energy standards with regard to transportation fuel consumption. As such, the demand for petroleum-based fuel during construction would not cause wasteful, inefficient, and unnecessary use of energy.

(ii) Operation

During operation of the Project, energy would be consumed for multiple purposes, including, but not limited to, heating/ventilating/air conditioning (HVAC); refrigeration; lighting; and the use of electronics, equipment, and machinery. Energy would also be consumed during Project operations related to water usage, solid waste disposal, and vehicle trips. As shown in Table IV.C-2 on page IV.C-21, development of the Project would result in an increase of 1,289 MWh electricity per year, an increase of 2,837,146 cf of natural gas per year, and an increased consumption of 78,854 gallons of gasoline per year and 14,262 gallons of diesel fuel per year over baseline conditions.

Electricity

As shown in Table IV.C-2, with compliance with applicable CALGreen requirements and GHG-PDF-1 through GHG-PDF-4, buildout of the Project would result in a projected

 Table IV.C-2

 Summary of Net Annual Energy Use During Project Operation^a

Source	Project	
Electricity ^b		
Building	1,118 MWh	
Water ^{c,d}	171 MWh	
Total Electricity	1,289 MWh	
Natural Gas		
Building ^{c,d,e}	2,837,146 cf	
Total Natural Gas	2,837,146 cf	
Transportation ^f		
Gasoline	78,854 gallons	
Diesel	14,262 gallons	
Total Transportation	93,116 gallons	

cf = cubic feet

MWh = *megawatt* hours

- ^a Detailed calculations are provided in Appendix E of this Draft EIR.
- ^b GHG-PDF-2, discussed further in Section IV.E, Greenhouse Gas Emissions, states that the Project would provide at least 20 percent of parking spaces with the capability of supporting electric vehicle supply equipment (EVSE) and provides that a minimum of 10 percent of parking spaces would be further equipped with EV charging stations. Providing infrastructure for EV in itself does not result in additional electricity usage. These project design features were not included in the electricity calculation for the Project electricity usage.
- ^c Calculations assume compliance with Project Design Feature GHG-PDF-1 provided in Section IV.E, Greenhouse Gas Emissions, of this Draft EIR and Project Design Feature WAT-PDF-1 provided in Section IV.K, Utilities and Service System-Water Supply and Infrastructure.
- ^d Electricity and natural gas estimates assume compliance with applicable 2019 CALGreen requirements and implementation of GHG-PDF-1 (optimize energy performance and reduce building energy cost by 22 percent for new/remodeled construction compared to the LEED baseline of ASHRAE 90.1-2010), in Section IV.E, Greenhouse Gas Emissions, of this Draft EIR. This analysis conservatively assumes no reduction in energy in comparison to 2019 Title 24 Building Standards Code.
- GHG-PDF-3 would require the Project to provide a minimum of 105 kilowatts of photovoltaic panels on the Project Site.
- ^f Transportation fuel estimates include project characteristics consistent with CAPCOA guidance measures.

Source: Eyestone Environmental, 2020.

net increase in the on-site demand for electricity totaling approximately 1,289 MWh/year, which is equivalent to an average of 209 kW or a peak of 378 kW.⁴⁶

In addition to complying with CALGreen requirements, the Project Applicant would also implement Project Design Feature GHG-PDF-1 in Section IV.E. Greenhouse Gas Emissions, of this Draft EIR, which states that the Project would optimize energy performance and reduce building energy cost by 22 percent for new/remodeled construction compared to the LEED[®] baseline of ASHRAE 90.1-2010. This analysis conservatively assumes no reduction in energy in comparison to 2019 Title 24 Building Standards Code. In addition, the Project would use Energy Star-labeled products and appliances, and use light-emitting diode (LED) lighting where appropriate, to reduce electricity use. Additionally, Project Design Features GHG-PDF-2 were implemented to reduce Project-related GHG emissions by encouraging use of electric vehicles. Project Design Feature GHG-PDF-2 would result in at least 20 percent of the total parking spaces provided on the Project Site be capable of supporting electric vehicle supply equipment (EVSE) and states that the Project would provide 10 percent of the parking spaces with EV charging stations. It is anticipated that these measures would marginally increase usage of electricity, but that any additional electricity usage would be offset by energy savings of gasoline and diesel from the electric vehicles using the equipment. Electric vehicles typically have a higher MPGe (miles per gallon gasoline equivalent) compared to liquidfueled (gasoline, diesel) vehicles with an MPGe rating ranging from 48 to 136 MPGe.⁴⁷ When compared to the current average fuel economy of 21.6 MPG, energy usage from EV charging would be offset by energy savings of liquid-fueled vehicles.⁴⁸ Furthermore, Project Design Feature GHG-PDF-3 would require the Project to provide a minimum of 105 kilowatts of photovoltaic panels on the Project Site. As discussed in Section II, Project Description, of this Draft EIR, the Project would include measures to promote capture and reuse rainwater for irrigation and landscaping; reduce energy usage through a variety of measures including solar passive design, daylight harvesting, natural ventilation, and thoughtful building orientation. The Project would also implement Project Design Feature WAT-PDF-1, presented in Section IV.K.1, Utilities and Service Systems—Water Supply and Infrastructure, of this Draft EIR, which states that the Project would implement water conservation features (e.g., high-efficiency clothes washers and no-flush or waterless urinals) to reduce indoor water use by 35 percent and outdoor water use by 30 percent.

⁴⁶ California Public Utilities Commission. 2017 System Efficiency of California's Electric Grid. Peak Demand and Load Factors. Note, kW or MW is a measure of power or flow of electricity. A kWh or MWh is a measure of energy where one kWh is equal to one kW operating for one hour.

⁴⁷ United States Department of Energy, 2019 Fuel Economy, https://afdc.energy.gov/vehicles/search/ results.csv?current=true, accessed January 17, 2020.

⁴⁸ United States Environmental Protection Agency, Green Vehicle Guide, Technology, www3.epa.gov/otaq/ gvg/learn-more-technology.htm, accessed January 17, 2020.

Based on LADWP's 2017 Power Strategic Long-Term Resources Plan, LADWP forecasts that its total energy sales in the 2023–2024 fiscal year (the Project's full buildout year) will be 23,033 GWh of electricity.^{49,50} As such, the Project-related net annual electricity consumption of 1,289 MWh/year would represent approximately 0.01 percent of LADWP's projected sales in 2023 (the Project's full buildout year). In addition, as previously described, the Project would incorporate a variety of energy conservation measures to reduce energy usage.

Natural Gas

As provided in Table IV.C-2 on page IV.C-21, buildout of the Project is projected to generate a net increase in the on-site demand for natural gas totaling approximately 2,837,146 cf/year. In addition, the Project Applicant would implement Project Design Feature GHG-PDF-1 in Section IV.C, Greenhouse Gas Emissions, of this Draft EIR, which states that the Project would optimize energy performance and reduce building natural gas cost by 22 percent for new/remodeled construction compared to the LEED[®] baseline of ASHRAE 90.1-2010. This analysis conservatively assumes no reduction in natural gas in comparison to 2019 Title 24 Building Standards Code.

As stated above, the Project's estimated net annual demand for natural gas is 2,837,146 cf/year, or approximately 7,773 cf/day. Based on the 2018 California Gas Report, the California Energy and Electric Utilities estimates natural gas consumption within SoCalGas' planning area will be approximately 2.50 billion cf/day in 2023 (the Project's full buildout year).⁵¹ The Project would account for approximately 0.0003 percent of the 2023 (the Project's full buildout year) forecasted consumption in SoCalGas' service area.

Transportation Energy

During operation, Project-related traffic would result in the consumption of petroleum-based fuels related to vehicular travel to and from the Project Site. As discussed in Section IV.I, Transportation, of this Draft EIR, the Project Site is located in an area well-served by public transit. Specifically, the Project Site will be located approximately 0.25 mile from the Metro Red Line Hollywood/Vine Station as well as bus lines on Hollywood Boulevard that would encourage and support use of public transportation. Furthermore, the Project would provide 304 bicycle parking spaces, in

⁴⁹ LADWP defines its future electricity supplies in terms of sales that will be realized at the meter.

⁵⁰ LADWP, 2017 Power Strategic Long-Term Resources Plan, December 2017, Appendix A, Table A-1.

⁵¹ California Gas and Electric Utilities, 2018 California Gas Report p. 100. Interpolated between 2022 and 2025 estimates.

addition to bicycle-serving amenities, which would further encourage biking. Additionally, the Project Site was designed to encourage walkability.

The Project would also incorporate characteristics that would reduce trips and VMT as compared to standard Institute of Transportation Engineers (ITE) trip generation rates. Specifically, the Project characteristics listed below are consistent with the California Air Pollution Control Officers Association (CAPCOA) guidance document, *Quantifying Greenhouse Gas Mitigation Measures*,⁵² which identifies the VMT and vehicle trips reductions for the Project Site relative to the standard trip and VMT rates in CalEEMod, which corresponds to reduction relative GHG emissions. Measures applicable to the Project include the following; a brief description of the Project's relevance to the measure is also provided:

- CAPCOA Measure LUT-1—Increase Density: Increased density, measured in terms of persons, jobs, or dwelling units per unit area, reduces emissions associated with transportation as it reduces the distance people travel for work or services and provides a foundation for the implementation of other strategies, such as enhanced transit services. The Project would increase the Site density from zero dwelling units per acre to 186 dwelling units per acre. Job density would decrease slightly from 56 jobs per acre to 40 jobs per acre.
- CAPCOA Measure LUT-3—Increase Diversity of Urban and Suburban Developments (Mixed-Uses): The Project would introduce new uses on the Project Site, including new residential, retail, and office uses. The Project would locate complementary new residential, retail and office uses in proximity to other existing off-site residential, office, retail, restaurant, and hotel uses. The increases in land use diversity and mix of uses on the Project Site would reduce vehicle trips and VMT by encouraging walking and non-automotive forms of transportation (i.e., walking and biking), which would result in corresponding reductions in transportation-related emissions.
- CAPCOA Measure LUT-5—Increase Transit Accessibility: The Project Site will be located approximately 0.25 mile from the Metro Red Line Hollywood/Vine Station as well as 12 bus lines on Hollywood Boulevard that would encourage and support use of public transportation. The Project would also provide bicycle parking spaces for the proposed uses to encourage utilization of alternative modes of transportation.
- **CAPCOA Measure LUT-9—Improve Design of Development**: The Project would add community-serving retail and restaurant uses along Hollywood Boulevard. Additional retail and restaurant uses as well as residential amenities

⁵² CAPCOA, Quantifying Greenhouse Gas Mitigation Measures, 2010.

including a lobby area and lounge would be located along Wilcox Avenue. An outdoor courtyard, which could be used as an outdoor seating/dining area for a restaurant, would also be incorporated to the north of the commercial use at ground-level along Wilcox Avenue and would be publicly accessible during business hours. The Project would include a high level of street access, which improves street accessibility and connectivity.

- CAPCOA Measure SDT-1—Provide Pedestrian Network Improvements: Project design would provide pedestrian access that minimizes barriers and links the Project Site with existing or planned external streets to encourage people to walk instead of drive. The Project would provide several improvements, such as direct access to the existing off-site pedestrian network including existing off-site sidewalks along Hollywood Boulevard and Wilcox Avenue, to encourage and increase pedestrian activities in the area, which would further reduce VMT and associated transportation-related emissions.
- CAPCOA Measure SDT-2—Traffic Calming Measures: The Project would be located in an area with traffic calming measures to encourage people to walk or bike instead of using a vehicle. This mode shift results in a decrease in VMT. Streets within 0.5 mile of the Project Site are equipped with sidewalks.

A transportation demand management (TDM) program, as required by TR-PDF-2, provided in Section IV.I, Transportation, of this Draft EIR, would also be implemented to reduce the use of single occupant vehicles by increasing the number of trips by walking, bicycle, carpool, vanpool, and transit. The TDM program would include design features, transportation services, education, and incentives intended to reduce the amount of single occupant vehicles during commuter peak hours. The TDM program is discussed further in Section IV.I, Transportation, of this Draft EIR.

The combined effect of the various strategies implemented as part of the TDM program would result in a 15-percent reduction in daily trip generation by offering services, actions, specific facilities, etc., aimed at encouraging use of alternative transportation modes (e.g., transit, bus, walking, bicycling, carpool, etc.).⁵³

As summarized in Table IV.C-2 on page IV.C-21, when accounting for the measures that would be implemented to reduce VMT, the Project's estimated net petroleum-based fuel usage would be approximately 78,854 gallons of gasoline and 14,262 gallons of diesel per year, or a total of 93,116 gallons of petroleum-based fuels annually. This would be a

⁵³ LADOT reviewed and approved a 5 percent TDM program as part of the Project's Traffic Study on July 25, 2018. Subsequent to that approval, the TDM program was increased to 15 percent as part of the Project's Assembly Bill (AB) 900 application. Refer to Appendix O.2 of this Draft EIR for LADOT's approval of the Traffic Study and Appendix B of this Draft EIR for the Project's AB 900 certification.

67-percent reduction in petroleum-based fuel usage in comparison to a standard project as estimated by CalEEMod.

(iii) Summary of Energy Requirements and Energy Use Efficiencies

CEQA Guidelines Appendix F recommends quantification of a project's energy requirements and its energy use efficiencies by amount and fuel type for each stage of a project's life cycle including construction, operation, maintenance, and/or removal. If appropriate, the energy intensiveness of materials may be discussed. The Project's energy requirements were calculated based on the methodology contained in CalEEMod for electricity and natural gas usage. Project VMT data was calculated based on CAPCOA guidelines. The calculations also took into account energy efficiency measures such as Title 24, CalGreen, and vehicle fuel economy standards. Table IV.C-2 on page IV.C-21 provides a summary of Project construction and operational energy usage, respectively. During Project construction activities, a total of 48.7 MWh of electricity would be consumed along with 116,644 gallons of transportation fuel (gasoline and diesel). During Project operations, a total of 1,289 MWh of electricity, 2,837,146 cf of natural gas, and 93,116 gallons of transportation fuel would be consumed on an annual basis.

(b) The effects of the project on local and regional energy supplies and on requirements for additional capacity

(i) Construction

As discussed above, electricity would be intermittently consumed during the conveyance of the water used to control fugitive dust, as well as to provide electricity for temporary lighting and other general construction activities. The electricity demand at any given time would vary throughout the construction period based on the construction activities being performed and would cease upon completion of construction. When not in use, electric equipment would be powered off so as to avoid unnecessary energy consumption. The estimated construction electricity usage represents approximately 4 percent of the estimated net annual operational demand which, as discussed below, would be within the supply and infrastructure service capabilities of LADWP.⁵⁴ Furthermore, the electricity demand during construction would be somewhat offset with the removal of the existing on-site uses, which currently generate a demand for electricity. Construction activities, including the construction of new buildings and facilities, typically do not involve the consumption of natural gas. Accordingly, natural gas would not be supplied to support Project construction activities; thus there would be no demand generated by

⁵⁴ The percentage is derived by taking the total amount of electricity usage during construction (48,730 kWh) and dividing that number by the total amount of net electricity usage during operation (1,289,062 kWh) to arrive at four percent.

construction, resulting in a net decrease when compared to existing operations. Transportation fuel usage during Project construction activities would represent approximately 0.001 percent of gasoline usage and 0.009 percent of diesel usage within Los Angeles County, respectively. As energy consumption during Project construction activities would be relatively negligible, the Project would not likely affect regional energy consumption in years during the construction period. Construction impacts on energy usage would be less than significant.

(ii) Operation

Based on LADWP's 2017 Power Strategic Long-Term Resources Plan, LADWP forecasts that its total energy sales in the 2023–2024 fiscal year (the Project's full buildout year) will be 23,033 GWh of electricity.^{55,56} As such, the Project-related net annual electricity consumption of 1,503 MWh/year would represent less than 0.1 percent of LADWP's projected sales in 2023 (the Project's full buildout year). In addition, LADWP has confirmed that the Project's electricity demand can be served by the existing facilities in the Project area.⁵⁷ Furthermore, the Project would implement any necessary connections and upgrades required by LADWP to ensure that LADWP would be able to adequately serve the Project.

As energy consumption during Project operations would be relatively negligible and energy requirements are within LADWP's and SoCalGas' service provision, Project operational impacts on energy usage would be less than significant.

(c) The effects of the project on peak and base period demands for electricity and other forms of energy

As discussed above, electricity demand during construction and operation of the Project would have a negligible effect on the overall capacity of LADWP's power grid and base load conditions. With regard to peak load conditions, the LADWP power system experienced an all-time high peak of 6,432 MW on August 31, 2017.⁵⁸ LADWP also estimates a peak load based on two years of data known as base case peak demand to account for typical peak conditions. Based on LADWP estimates for 2018, the base case peak demand for the power grid is 5,820 MW.⁵⁹ As discussed above, the Project would consume 1,289 MWh on an annual basis which is equivalent to an average of 209 kW or a

⁵⁵ LADWP defines its future electricity supplies in terms of sales that will be realized at the meter.

⁵⁶ LADWP, 2017 Power Strategic Long-Term Resources Plan, December 2017, Appendix A, Table A-1.

⁵⁷ LADWP, Will serve letter from Antoine S. Raad, dated March 8, 2018.

⁵⁸ LADWP, 2018 Retail Electric Sales and Demand Forecast. p. 6.

⁵⁹ LADWP, 2018 Retail Electric Sales and Demand Forecast. p. 6.

peak of 378 kW.⁶⁰ In comparison to the LADWP power grid base peak load of 5,820 MW in 2018, the Project would represent approximately 0.007 percent of the LADWP base peak load conditions. In addition, LADWP's annual growth projection in peak demand of the electrical power grid of 0.4 percent would be sufficient to account for future electrical demand by the Project. Therefore, Project electricity consumption during operational activities would have a negligible effect on peak load conditions of the power grid. Project operational impacts with regard to baseline and peak load electricity usage would be less than significant.

(d) The degree to which the project complies with existing energy standards

Construction equipment would comply with energy efficiency requirements contained in the Federal Energy Independence and Security Act or previous Energy Policy Acts for electrical motors and equipment.⁶¹ Electricity and natural gas usage during Project operations presented in Table IV.C-2 on page IV.C-21 would comply with 2019 Title 24 standards and applicable 2019 CalGreen requirements. In addition, through implementation of Project Design Feature GHG-PDF-1, the Project would optimize energy performance and reduce building energy cost by 22 percent for new/remodeled construction compared to the LEED[®] baseline of ASHRAE 90.1-2010. This analysis conservatively assumes no reduction in energy in comparison to 2019 Title 24 Building Standards Code. Therefore, Project construction and operational activities would comply with existing energy standards with regards to electricity and natural gas usage.

With regard to transportation fuels, trucks and equipment used during proposed construction activities, the Project would comply with CARB's anti-idling regulations as well as the In-Use Off-Road Diesel-Fueled Fleets regulation. Although these regulations are intended to reduce criteria pollutant emissions, compliance with the anti-idling and emissions regulations would also result in efficient use of construction-related energy. During Project operations, vehicles traveling to and from the Project Site are assumed to comply with CAFE fuel economy standards, as required.

Based on the above, Project construction and operational activities would comply with existing energy standards with regards to electricity and natural gas usage, as well as transportation fuel consumption.

⁶⁰ California Public Utilities Commission, Report: System Efficiency of California's Electric Grid, 2017.

⁶¹ Energy Independence and Security Act of 2007. Pub.L. 110-140.

(e) Effects of the Project on Energy Resources

As discussed above, LADWP's electricity generation is derived from a mix of nonrenewable and renewable sources such as coal, natural gas, solar, geothermal, wind, and hydropower. The LADWP's most recently adopted 2017 Power Strategic Long-Term Resources Plan identifies adequate resources (i.e., natural gas, coal, and renewables) to support future generation capacity.

Natural gas supplied to Southern California is mainly sourced from out of state with a small portion originating in California. Sources of natural gas for the Southern California region are obtained from locations throughout the western United States as well as Canada.⁶² According to the U.S. Energy Information Administration (EIA), the United States currently has over 80 years of natural gas reserves based on 2015 consumption.⁶³ Compliance with energy standards is expected to result in more efficient use of natural gas (lower consumption) in future years. Therefore, Project construction and operation activities would have a negligible effect on natural gas supply.

Transportation fuels (gasoline and diesel) are produced from crude oil which is imported from various regions around the world. Based on current proven reserves, crude oil production would be sufficient to meet over 50 years of consumption.⁶⁴ The Project would also comply with CAFE fuel economy standards, which would result in more efficient use of transportation fuels (lower consumption). Therefore, Project construction and operation activities would have a negligible effect on the transportation fuel supply.

As discussed above in the Regulatory Framework, one of the objectives of SB 350 is to increase procurement of California's electricity from renewable sources from 33 percent to 50 percent by 2030. However, as of September 2018, SB 100 was signed, which would require retail sellers of electric services to increase procurement from eligible renewable energy resources to 50 percent renewable resources target by December 31, 2026, and 60 percent by December 31, 2030. Accordingly, LADWP is required to procure at least 60 percent of their energy portfolio from renewable sources by 2030. The current sources of renewable energy procured by LADWP include wind, solar, and geothermal sources. These sources account for 32 percent of LADWP's overall energy mix in 2018, the most

⁶² California Gas and Electric Utilities, 2018 California Gas Report.

⁶³ U.S. Energy Information Administration, Frequently Asked Questions, www.eia.gov/tools/faqs/faq.php?id= 58&t=8, accessed January 17, 2020.

⁶⁴ BP Global, Oil reserves, www.bp.com/en/global/corporate/energy-economics/statistical-review-of-worldenergy/oil.html#oil-reserves, accessed January 17, 2020.

recent year for which data are available.⁶⁵ This represents the available off-site renewable sources of energy that would meet the Project's energy demand.

With regard to on-site renewable energy sources, as discussed in Section II, Project Description, of this Draft EIR, the Project would include Project Design Feature GHG-PDF-3 which would require the Project to provide a minimum of 105 kilowatts of photovoltaic panels on the Project Site. However, due to the Project Site's location, other on-site renewable energy sources would not be feasible to install on-site as there are no local sources of energy from the following sources: biodiesel, biomass hydroelectric and small hydroelectric, digester gas, fuel cells, landfill gas, municipal solid waste, ocean thermal, ocean wave, and tidal current technologies, or multi-fuel facilities using renewable fuels. Furthermore, while methane is a renewable derived biogas and was found beneath the Project Site, it is not available on the Project Site in commercially viable quantities or form, and its extraction and treatment for energy purposes would result in secondary impacts. Additionally, wind-powered energy is not viable on the Project Site due to the lack of sufficient wind in the Los Angeles basin. Specifically, based on a map of California's wind resource potential, the Project Site is not identified as an area with wind resource potential.⁶⁶

(f) The project's projected transportation energy use requirements and its overall use of efficient transportation alternatives

As discussed above in Section 3.c, the Project would include project features to reduce VMT during operational activities. The Project's proximity to job centers and retail uses would allow for more residents to live closer to work and shopping areas, reducing VMT. The Project would be located approximately 0.25 mile from the Metro Red Line Hollywood/Vine Station as well as bus lines on Hollywood Boulevard that would encourage and support use of public transportation. The Project would also provide 269 long-term and 35 short-term bicycle parking spaces for the proposed uses to encourage utilization of alternative modes of transportation. As further discussed in Section IV.E, Greenhouse Gas Emissions, of this Draft EIR, these measures would reduce VMT by approximately 67 percent in comparison to a Project without Reduction Features as estimated by CalEEMod, with a corresponding reduction in the Project's petroleum-based fuel usage. In addition, TDM program, as required by TR-PDF-2, provided in Section IV.I, Transportation, of this Draft EIR, would also be implemented to reduce the use of single occupant vehicles by increasing the number of trips by walking, bicycle, carpool, vanpool, and transit. The TDM program would include design features, transportation services, education, and incentives intended to reduce the amount of single occupant vehicles during commuter

⁶⁵ CEC, Utility Annual Power Content Labels for 2018.

⁶⁶ CEC, California Wind Projects and Wind Resource Areas 2018 map.

peak hours. Therefore, the Project would encourage the use of efficient transportation alternatives.

(g) The degree to which the project design and/or operations incorporate energy-conservation measures, particularly those that go beyond City requirements

The current City of Los Angeles Green Building Code requires compliance with CalGreen and California's Building Energy Efficiency Standards (Title 24). In addition to compliance with the City's Green Building Code, the Project would optimize energy performance and reduce building energy cost by 22 percent for new/remodeled construction compared to the LEED[®] baseline of ASHRAE 90.1-2010. Therefore, the Project would incorporate measures that are above and beyond current State and City energy conservation requirements.

The City has also adopted several plans and regulations to promote the reduction, reuse, recycling, and conversion of solid waste going to disposal systems. These regulations include the City of Los Angeles Solid Waste Management Policy Plan, the RENEW LA Plan, and the Exclusive Franchise System Ordinance (Ordinance No. 182,986). These solid waste reduction programs and ordinances help to reduce the number of trips associated with hauling solid waste, thereby reducing the amount of petroleum-based fuel consumed. Furthermore, recycling efforts indirectly reduce the energy necessary to create new products made of raw material, which is an energy-intensive process. Thus, through compliance with the City's construction-related solid waste recycling programs, the Project would contribute to reduced fuel-related energy consumption.

With implementation of these features along with complying with state and local energy efficiency standards, the Project would meet and/or exceed all applicable energy conservation policies and regulations.

(h) Whether the Project conflicts with adopted energy conservation plans

As discussed in Section IV.E, Greenhouse Gas Emissions, the city has published the LA Green Plan/ClimateLA in 2007 which outlines goals and actions by the City to reduce GHG emissions. To facilitate implementation of the LA Green Plan/Climate LA, the City adopted the Green Building Code. The Project would comply with applicable regulatory requirements for the design of new buildings, including the provisions set forth in the 2019 CALGreen Code and California's Building Energy Efficiency Standards, which have been incorporated into the City's Green Building Code. With regard to transportation uses, the Project design would reduce VMT throughout the region and encourage use of alternative modes of transportation. The Project would be consistent with regional planning strategies that address energy conservation. As discussed above and in Section IV.F, Land Use, of this Draft EIR, SCAG's 2016–2040 RTP/SCS focuses on creating livable communities with an emphasis on sustainability and integrated planning, and identifies mobility, economy, and sustainability as the three principles most critical to the future of the region.

The 2016–2040 RTP/SCS focuses on reducing fossil fuel use by decreasing VMT. The Project would be consistent with the energy efficiency policies emphasized in the 2016–2040 RTP/SCS. Most notably, the Project represents an infill development within the City of Los Angeles that would concentrate new residential, community-serving retail, office, and restaurant uses within an HQTA as defined by the 2016–2040 RTP/SCS (see Section IV.F, Land Use, of this Draft EIR for further details). The Project would be located approximately 0.25 mile from the Metro Red Line Hollywood/Vine Station as well as bus lines on Hollywood Boulevard that would encourage and support use of public transportation. Development of the Project within an HQTA would encourage the use of transit and reduce the transportation fuel associated with VMT.

The introduction of new housing and job opportunities within an HQTA, as proposed by the Project, is consistent with numerous policies in the 2016–2040 RTP/SCS related to locating new housing and jobs near transit. The 2016–2040 RTP/SCS would result in an estimated 8-percent decrease in VMT by 2020, an 18-percent decrease in VMT by 2035, and a 21-percent decrease in VMT by 2040.⁶⁷ By meeting and exceeding the SB 375 targets for 2020 and 2035, as well as achieving an approximately 21-percent decrease in VMT by 2040 (an additional 3-percent reduction in the five years between 2035 [18 percent] and 2040 [21 percent]), the 2016–2040 RTP/SCS is expected to fulfill and exceed its portion of SB 375 compliance with respect to meeting the state's GHG emission reduction goals. Subsequent to adoption of the 2016–2040 RTP/SCS, CARB adopted in 2018 a new target requiring a 19-percent decrease in VMT for the SCAG region by 2035. It is expected that this new target will be incorporated into the next RTP/SCS. The 2016–2040 RTP/SCS and/or the next RTP/SCS are therefore expected to fulfill and exceed SB 375 compliance with respect to meeting the State's GHG emission reduction goals.

Thus, consistent with the 2016–2040 RTP/SCS, the Project would reduce VMT by 67 percent in comparison to a Project without Reduction Features as estimated by CalEEMod, and, consequently, the Project's petroleum-based fuel usage would be reduced by 67 percent, as discussed further in Section IV.E, Greenhouse Gas Emissions, of this

⁶⁷ SCAG, Final 2016–2040, RTP/SCS, April 2016.

Draft EIR. These VMT reducing measures are also consistent with the goals of the Sustainable City pLAn/L.A.'s Green New Deal which targets GHG emissions generated by City owned buildings and properties. Although the Sustainable City pLAn/LA's Green New Deal targets City generated GHG emissions, the Project would also comply with or not conflict with measures to reduce GHG emission. In addition, as previously discussed, the Project would exceed state energy efficiency requirements and would use electricity from LADWP, which has a current (2017) renewable energy mix of 30 percent. All of these features would serve to reduce the consumption of electricity, natural gas, and transportation fuel. Based on the above, the Project would be consistent with adopted energy conservation plans.

(i) Conclusion

As demonstrated in the analysis above, the Project would not result in potentially significant environmental impact due to wasteful, inefficient, and unnecessary consumption of energy during construction or operation. The Project's energy requirements would not significantly affect local and regional supplies or capacity. The Project's energy usage during base and peak periods would be consistent with electricity and natural gas future projections for the region. Electricity generation capacity and supplies of natural gas and transportation fuels would be sufficient to meet the needs of Project-related construction and operational activities. During operations, the Project's energy demands would not significantly affect available energy supplies and would comply with existing energy efficiency standards. Therefore, Project impacts related to energy use under Threshold (a) would be less than significant during construction and operation.

Threshold (b): Conflict with or obstruct a state or local plan for renewable energy or energy efficiency?

As discussed in Subsection 3.c(2)(h) above, the energy conservation policies and plans relevant to the Project include the California Title 24 energy standards, the 2019 CALGreen building code, and the City of Los Angeles Green Building Code. As these conservation policies are mandatory under the City of Los Angeles Building Code, the Project would not conflict with applicable plans for renewable energy or energy efficiency. In addition, the Project would implement measures to exceed Title 24 energy efficiency requirements.

With regard to transportation related energy usage, the Project would comply with goals of the SCAG's 2016–2040 RTP/SCS which incorporates VMT targets established by SB 375. The Project's mixed-use development and proximity to major job centers and public transportation would serve to reduce VMT and associated transportation fuel usage

within the region. In addition, vehicle trips generated during Project operations would comply with CAFE fuel economy standards. During construction activities, the Project would be required to comply with CARB anti-idling regulations and the In-Use Off-Road Diesel Fleet regulations.

Based on the above, the Project would not conflict with adopted energy conservation plans, or violate state or federal energy standards. Therefore, Project impacts associated with regulatory consistency under Threshold (b) would be less than significant.

(2) Mitigation Measures

Project-level impacts with regard to energy use would be less than significant. Therefore, no mitigation measures are required.

- (3) Level of Significance after Mitigation
 - (a) Energy Use

Project-level impacts related to energy use would be less than significant without mitigation.

(b) Consistency with State or Local Plans

Project-level impacts related to consistency with State or local plans would be less than significant without mitigation.

e. Cumulative Impacts

- (1) Impact Analysis
 - (a) Wasteful, Inefficient and Unnecessary Use of Energy

Cumulative impacts occur when impacts that are significant or less than significant from a proposed project combine with similar impacts from other past, present, or reasonably foreseeable projects in a similar geographic area. Based on the information presented in Section III, Environmental Setting, of this Draft EIR, there are 107 related projects located in the vicinity of the Project Site. The geographic context for the cumulative impact analysis on electricity is the service area of LADWP, and the geographic context for the cumulative impact analysis on natural gas is the service area of SoCalGas. While the geographic context for transportation-related energy use is more difficult to define, it is meaningful to consider the Project in the context of County-wide consumption. The Project in conjunction with forecasted 2023 growth in these geographies would cumulatively increase the consumption of energy, thus potentially resulting in cumulative impacts with respect to energy use. Cumulative growth in the greater Project area through 2023 includes known development projects, as well as general ambient growth projected to occur, as described in Section III, Environmental Setting, of this Draft EIR. These related projects primarily include retail/commercial, residential, and office uses.

(i) Electricity

Although Project development would result in the use of renewable and nonrenewable electricity resources during construction and operation, which could limit future availability, the use of such resources would be on a relatively small scale, would be reduced by measures rendering the Project more energy-efficient, and would be consistent with growth expectations for LADWP's service area. The Project would also incorporate additional energy efficiency measures to optimize the Project's energy performance and reduce building energy cost by 22 percent for new/remodeled construction compared to the LEED[®] baseline of ASHRAE 90.1-2010. Furthermore, during construction and operation, other future development projects would be expected to incorporate energy conservation features, comply with applicable regulations including CALGreen and state energy standards under Title 24, and incorporate mitigation measures, as necessary.

Additionally, as discussed above, LADWP is required to procure at least 60 percent of their energy portfolio from renewable sources by 2030. The current sources of renewable energy procured by LADWP include wind, solar, and geothermal sources. These sources accounted for 32 percent of LADWP's overall energy mix in 2018, the most recent year for which data are available.⁶⁸ This represents the available off-site renewable sources of energy that could meet the Project's and related projects energy demand. Therefore, the Project and related projects would comply with energy conservation plans and efficiency standards required to ensure that energy is used efficiently. As such, the Project's contribution to cumulative impacts related to wasteful, inefficient and unnecessary use of electricity would not be cumulatively considerable and, thus, would be less than significant.

(ii) Natural Gas

Although Project development would result in the use of natural gas resources, which could limit future availability, the use of such resources would be on a relatively small scale, would be reduced by measures rendering the Project more energy-efficient, and would be consistent with regional and local growth expectations for SoCalGas' service area. The Project would also optimize energy performance and reduce building energy

⁶⁸ California Energy Commission, Utility Annual Power Content Labels for 2018.

cost by 22 percent for new/remodeled construction compared to the LEED[®] baseline of ASHRAE 90.1-2010. Furthermore, future development projects would be expected to incorporate energy conservation features, comply with applicable regulations including CALGreen and state energy standards under Title 24, and incorporate mitigation measures, as necessary. Therefore, the Project and related projects would comply with energy conservation plans and efficiency standards required to ensure that energy is used efficiently. As such, cumulative impacts related to wasteful, inefficient and unnecessary use of natural gas would not be cumulatively considerable and, thus, would be less than significant.

(iii) Transportation Energy

Buildout of the Project, related projects, and additional forecasted growth would cumulatively increase the demand for transportation-related fuel in the state and region. At buildout, the Project's estimated petroleum-based fuel usage would be approximately 78,854 gallons of gasoline and 14,262 gallons of diesel per year, or a total of 93,116 gallons of petroleum-based fuels annually, as shown above in Table IV.C-2 on page IV.C-21. For comparison purposes, the transportation-related fuel usage for the Project would represent approximately 0.001 percent of the 2023 annual on-road gasoline-related energy consumption and 0.001 percent of the diesel-related energy consumption in Los Angeles County, as shown in Appendix E, of this Draft EIR.

Related projects in the Project vicinity would also be infill projects locating uses near other residential and commercial uses which would reduce distance travelled as well as consumption of transportation fuel. As analyzed above, Project transportation fuel usage would represent a small percentage of total fuel consumption within Los Angeles County. While it is speculative to assess transportation fuel usage from related projects, it is expected that cumulative transportation fuel usage resulting from the Project and related projects would be consistent with projections discussed above.

Additionally, as described above, petroleum currently accounts for 90 percent of California's transportation energy sources; however, over the last decade the state has implemented several policies, rules, and regulations to improve vehicle efficiency, increase the development and use of alternative fuels, reduce air pollutants and GHGs from the transportation sector, and reduce vehicle miles traveled which would reduce reliance on petroleum fuels. According to the CEC in the 2015 Integrated Energy Policy Report, gasoline consumption declined by 6 percent since 2008 at the time of the writing of the report, and the CEC predicts that the demand for gasoline will continue to decline over the next 10 years and that there will be an increase in the use of alternative fuels, such as

natural gas, biofuels, and electricity.⁶⁹ As with the Project, other future development projects would be expected to reduce VMT by encouraging the use of alternative modes of transportation and other design features that promote VMT reductions.

Furthermore, as described above, the Project would be consistent with the policies emphasized by the 2016–2040 RTP/SCS. Most notably, the Project represents an infill development within the City of Los Angeles that would concentrate new residential, community-serving retail, office, and restaurant uses within an HQTA, which is defined by the 2016–2040 RTP/SCS as generally walkable transit villages or corridors that are within 0.5 mile of a well-serviced transit stop or a transit corridor with 15-minute or less service frequency during peak commute hours (see Section IV.F, Land Use, of this Draft EIR for further details). The Project would be located approximately 0.25 mile from the Metro Red Line Hollywood/Vine Station as well as bus lines on Hollywood Boulevard that would encourage and support use of public transportation. Although there are no per capita GHG emission reduction targets for passenger vehicles set by CARB for 2040, the 2016-2040 RTP/SCS GHG emission reduction trajectory shows that more aggressive GHG emission reductions are projected for 2040.⁷⁰ Implementation of the 2016–2040 RTP/SCS would result in an estimated 8-percent decrease in per capita GHG emissions by 2020, 18-percent decrease in per capita GHG emissions by 2035, and 21-percent decrease in per capita GHG emissions by 2040. By meeting and exceeding the SB 375 targets for 2020 and 2035, as well as achieving an approximately 21-percent decrease in per capita GHG emissions by 2040 (an additional 3-percent reduction in the five years between 2035 [18 percent] and 2040 [21 percent]), implementation of the 2016-2040 RTP/SCS is expected to fulfill and exceed the region's obligations under SB 375 with respect to meeting the state's GHG emission reduction goals. As discussed in Section IV.C, Greenhouse Gas Emissions, of this Draft EIR, the Project results in a VMT reduction of approximately 67 percent in comparison to a Project without Reduction Features as estimated by CalEEMod, which would be consistent with the reduction in transportation emission per capita provided in the 2016–2040 RTP/SCS.

Although the 2016–2040 RTP/SCS is intended to reduce GHG emissions, the reduction in VMT would also result in reduced transportation fuel consumption. By its very nature, the 2016–2040 RTP/SCS is a regional planning tool that addresses cumulative growth and resulting environmental effects. In addition, it is assumed that related projects in the Project Site vicinity would reduce VMT, consistent with the goals of the 2016–2040 RTP/SCS. Since the Project is consistent with the 2016–2040 RTP/SCS, its contribution to

⁶⁹ CEC, 2015 Integrated Energy Policy Report.

⁷⁰ SCAG, Final 2016–2040, RTP/SCS, April 2016, p. 153.

cumulative transportation energy use is not cumulatively considerable, and therefore, would result in a less than significant cumulative impact.

(iv) Conclusion

Based on the analysis provided above, the Project's contribution to cumulative impacts related to energy consumption (i.e., electricity, natural gas, and petroleum-based fuel) would not result in a cumulatively considerable effect related to potentially significant environmental impacts due to the wasteful, inefficient, and unnecessary consumption of energy during construction or operation. As such, the Project's impacts would not be cumulatively considerable; therefore, cumulative energy impacts under Threshold (a) are concluded to be less than significant.

(b) Consistency with State or Local Plans

Related and future projects within the Project area would be required to comply with energy conservation and renewable energy plans and polices described above, including Title 24, CALGreen, and the City of Los Angeles Green Building Code. As related projects would be required to meet the same energy consumption standards, there would be no significant cumulative impacts with regard to consistency with energy conservation plans.

Furthermore, as described above, the Project would be consistent with the policies emphasized by the 2016–2040 RTP/SCS. The Project would be mixed-use and located near major job centers and public transit which would result in a VMT reduction. As discussed in Section IV.E, Greenhouse Gas Emissions, of this Draft EIR, the Project results in a VMT reduction of approximately 67 percent in comparison to a Project without Reduction Features as estimated by CalEEMod, which would be consistent with the reduction in transportation emission per capita provided in the 2016–2040 RTP/SCS and with CARB's updated 2035 target. Therefore, the Project is consistent with the 2016–2040 RTP/SCS and would not be cumulatively considerable with regard to consistency with energy conservation plans.

(2) Mitigation Measures

Cumulative impacts with regard to energy use would be less than significant. Therefore, no mitigation measures are required.

- (3) Level of Significance after Mitigation
 - (a) Energy Use

Cumulative impacts related to energy use would be less than significant without mitigation.

(b) Consistency with State or Local Plans

Cumulative impacts related to consistency with State or local plans would be less than significant without mitigation.